



Updated November 15, 2018

### UNC National Parents Survey (2017)

This survey was designed by Noel Brewer and colleagues at the UNC Gillings School of Global Public Health. Data collection occurred via an online survey with a national sample of parents of adolescents ages 9 to 17 who had not yet completed HPV vaccine series (n=1,263; Response Rate 61%) during November 2017 – January 2018.

#### Preferred citation:

Shah, P.D., Calo, W.A., Gilkey, M.B., Boynton, M.H., Alton Dailey, S., Robichaud, M., Margolis, M.A., Brewer, NT. (In Press). Questions and concerns about HPV vaccine: A communication experiment. *Pediatrics*.

*[...] Brackets indicate text that participants did not see, including source of item, instructions to the programmer or response scale options not seen by participants.*

Section A: Vaccination History			
Item #	Construct	Item	Response scale
A10	Reconfirmed number of children ages 9-17 in household	How many 9-17 year-old children do you have?	[Open-ended]  [FORCE A RESPONSE TO THIS QUESTION]  [ALLOW ONLY NUMBERS BETWEEN 0 AND 20]
A20	Child Name	<p>[IF A10&gt;1] According to the answers you provided, you have [A10] children ages 9 to 17. Please think about the one who is the youngest when you answer the questions.</p> <p>To help the survey work better, please provide a name that you would like us to use when referring to your child. (This information is only for the survey. You can give initials or a nickname —whatever you will remember.)</p> <p>[IF A10=1] According to the answers you provided, you have one child between the ages 9 and 17. Please think about this child when you answer the questions.</p> <p>To help the survey work better, please provide a name that you would like us</p>	A20

		to use when referring to your child. (This information is only for the survey. You can give initials or a nickname —whatever you will remember.)	
A90	HPV vaccination	<p>The next questions are about the human papillomavirus (HPV) vaccine. It's also called Gardasil.</p> <p>How many shots of the HPV vaccine has [NAME] had?</p> <p><b>[IF A90 = 0, 1, 4, OR 5, PROCEED TO A91, IF A90 = 2 OR 3, END SURVEY]</b></p>	<p>0 = None 1 = 1 shot 2 = 2 shots 3 = 3 or more shots 4 = At least 1 shot, but I don't know how many 5 = I don't know if my child has received the HPV vaccine</p> <p><b>[FORCE A RESPONSE TO THIS QUESTION]</b></p>
A91	Child's age	How old is [NAME]?	<p>1 = 9 years old 2 = 10 years old 3 = 11 years old 4 = 12 years old 5 = 13 years old 6 = 14 years old 7 = 15 years old 8 = 16 years old 9 = 17 years old</p> <p><b>[FORCE A RESPONSE TO THIS QUESTION]</b></p>

A95	Age vaccine initiation	<p><b>[IF A90 = 0 OR 5 SKIP ITEM A95 AND CONTINUE TO B300]</b></p> <p>At what age did [NAME] get the first shot of the HPV vaccine?</p>	<p>1 = 9 years old or younger  2 = 10 years old  3 = 11 years old  4 = 12 years old  5 = 13 years old  6 = 14 years old  7 = 15 years old  8 = 16 years old  9 = 17 years old  [99 = Refused]</p> <p><b>[IF A91=1, DO NOT SHOW RESPONSES 2-9 ON A95  IF A91=2, DO NOT SHOW RESPONSES 3-9 ON A95  IF A91=3, DO NOT SHOW RESPONSES 4-9 ON A95  IF A91=4, DO NOT SHOW RESPONSES 5-9 ON A95  IF A91=5, DO NOT SHOW RESPONSES 6-9 ON A95  IF A91=6, DO NOT SHOW RESPONSES 7-9 ON A95  IF A91=7, DO NOT SHOW RESPONSES 8-9 ON A95  IF A91=8, DO NOT SHOW RESPONSE 9 ON A95]</b></p>
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#### SECTION B: GENERAL VACCINE ATTITUDES

Item #	Construct	Item	Response scale
B300	Vaccine confidence	<p>Say how much you agree or disagree with the next statements.</p> <p>Vaccines are necessary to protect the health of children [NAME]'s age.</p>	<p>1 = Strongly disagree  2 = Somewhat disagree  3 = Neither disagree or agree  4 = Somewhat agree  5 = Strongly agree  [9 = Refused]</p>
B310	Vaccine confidence	Vaccines do a good job in preventing the diseases they are intended to prevent.	<p>1 = Strongly disagree  2 = Somewhat disagree  3 = Neither disagree or agree  4 = Somewhat agree  5 = Strongly agree  [9 = Refused]</p>
B320	Vaccine confidence	Vaccines are safe.	<p>1 = Strongly disagree  2 = Somewhat disagree  3 = Neither disagree or agree  4 = Somewhat agree  5 = Strongly agree  [9 = Refused]</p>

B330	Vaccine confidence	If I do not vaccinate [NAME], [NAME] may get a disease such as meningitis and cause others to get the disease.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
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#### SECTION C: HPV VACCINE ATTITUDES

Item #	Construct	Item	Response scale
C400	HPV vaccination	Parents sometimes have questions they need answered before making a decision about the HPV vaccine.  How much would you want to talk to [NAME]'s doctor or health care provider about...  Diseases prevented by the HPV vaccine	1 = None 2 = A little 3 = A lot [9 = Refused]
C405	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  National recommendations for the HPV vaccine	1 = None 2 = A little 3 = A lot [9 = Refused]
C410	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  Age to start the HPV vaccine	1 = None 2 = A little 3 = A lot [9 = Refused]
C415	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  The HPV vaccine for children who are not sexually active	1 = None 2 = A little 3 = A lot [9 = Refused]
C420	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  The HPV vaccine for boys	1 = None 2 = A little 3 = A lot [9 = Refused]
C425	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  School requirements for the HPV vaccine	1 = None 2 = A little 3 = A lot [9 = Refused]
C430	HPV vaccination	How much would you want to talk to [NAME]'s doctor or health care provider about...  Safety or side effects of the HPV vaccine	1 = None 2 = A little 3 = A lot [9 = Refused]

C435	HPV vaccination	Would you most like information from [NAME]’s doctor or health care provider about...	1 = Diseases prevented by the HPV vaccine 2 = National recommendations for the HPV vaccine 3 = Age to start the HPV vaccine 4 = The HPV vaccine for children not sexually active 5 = The HPV vaccine for boys 6 = School requirements for the HPV vaccine 7 = Safety or side effects of the HPV vaccine
		<b>[RANDOMIZE THE ORDER OF ITEMS C440-C467]</b>	
C440	CHIAS-Harm	Say how much you agree or disagree with the next statements.  The HPV vaccine might cause lasting health problems.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
C450	CHIAS-Uncertainty	I don’t have enough information about the HPV vaccine to decide whether to give it to [NAME].	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
C460	CHIAS-Effectiveness	The HPV vaccine is effective in preventing several cancers.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
C465	CHIAS-Barriers	It would be hard to find a provider or clinic where I can afford the HPV vaccine for [NAME].	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
C466	Descriptive norm	Other parents in my community are getting their children the HPV vaccine.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]

C467	Injunctive norm	Most people who are important to me would support getting the HPV vaccine for [NAME].	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
<b>SECTION D: VACCINE PREFERENCES</b>			
Item #	Construct	Item	Response scale
D145	Number of vaccines	How many vaccines do you think would be safe for a <u>one-year old</u> to get at a single check-up?	0 = None 1 = 1 vaccine 2 = 2 vaccines 3 = 3 vaccines 4 = 4 vaccines 5 = 5 vaccines or more [9 = Refused]
D140	Number of vaccines	How many vaccines do you think would be safe for an <u>eleven-year old</u> to get at a single check-up?	0 = None 1 = 1 vaccine 2 = 2 vaccines 3 = 3 vaccines 4 = 4 vaccines 5 = 5 vaccines or more [9 = Refused]
D130	Number of visits	Imagine you agree to get [NAME] the three vaccines they are due for:  -Meningitis vaccine (1 dose) -HPV vaccine (the first of 2 doses) -Tdap vaccine (1 dose)  Would you prefer that [NAME] ...	1 = Get all 3 vaccines at one visit 2 = Spread vaccines across multiple visits 3 = Get whatever the doctor or healthcare provider recommends [9 = Refused]
D120	Next dose	Imagine [NAME] gets the first dose of HPV vaccine today.  When would you prefer to get [NAME] the <u>next</u> dose of HPV vaccine?	1 = As soon as is recommended 2 = At their next check-up [9 = Refused]
Randomization		1 = Panel A (D155) 2 = Panel B (D160) 3 = Panel C (D165) 4 = Panel D (D170)	

D155	Preferred age for HPV vaccine (Panel A)	At what age do <u>you</u> think children should get the first dose of the HPV vaccine?	1 = 8 years old or younger 2 = 9 or 10 3 = 11 or 12 4 = 13 or 14 5 = 15 or 16 6 = 17 or 18 7 = 19 or older 8 = Never [9 = Refused]
D160	Preferred age for HPV vaccine (Panel B)	National recommendations are for children to get the HPV vaccine at age 11 or 12.  At what age do <u>you</u> think children should get the first dose of the HPV vaccine?	1 = 8 years old or younger 2 = 9 or 10 3 = 11 or 12 4 = 13 or 14 5 = 15 or 16 6 = 17 or 18 7 = 19 or older 8 = Never [9 = Refused]
D165	Preferred age for HPV vaccine (Panel C)	According to national recommendations, children who start the HPV vaccine at age 11 or 12 only need two doses, instead of three.  At what age do <u>you</u> think children should get the first dose of the HPV vaccine?	1 = 8 years old or younger 2 = 9 or 10 3 = 11 or 12 4 = 13 or 14 5 = 15 or 16 6 = 17 or 18 7 = 19 or older 8 = Never [9 = Refused]
D170	Preferred age for HPV vaccine (Panel D)	According to national recommendations, children who start the HPV vaccine before age 15 only need two doses, instead of three.  At what age do <u>you</u> think children should get the first dose of the HPV vaccine?	1 = 8 years old or younger 2 = 9 or 10 3 = 11 or 12 4 = 13 or 14 5 = 15 or 16 6 = 17 or 18 7 = 19 or older 8 = Never [9 = Refused]
<b>SECTION E. REFUSAL/DELAY</b>			
<b>Item #</b>	<b>Construct</b>	<b>Item</b>	<b>Response scale</b>
E200	Raise topic/discussion	Has the HPV vaccine ever come up in conversations with [NAME]'s doctor or health care provider?	0 = No 1 = Yes  [IF E200 = 0, SKIP TO E275 IF E200 = 1, CONTINUE TO E205.]

E205	Discussion age	<p>The next questions are about the <u>first</u> time the HPV vaccine came up in a conversation with [NAME]'s doctor or health care provider.</p> <p>At that visit, about how old was [NAME]?</p>	<p>1 = 9 years old or younger  2 = 10 years old  3 = 11 years old  4 = 12 years old  5 = 13 years old  6 = 14 years old  7 = 15 years old  8 = 16 years old  9 = 17 years old  [99 = Refused]</p>
E220	Strength of endorsement - HPV	At that visit, how important did the doctor or health care provider say the HPV vaccine was for [NAME]?	<p>1 = Not important  2 = Slightly important  3 = Moderately important  4 = Very important  5 = Extremely important  [9 = Refused]</p>
E230_1 _2 _3 _4 _5 _6 _7 _8 _9	Prevention topics	<p>At that visit, what did the doctor or health care provider say the HPV vaccine could prevent?  (Check all that apply.)</p>	<p>1 = Cervical cancer  2 = Vaginal cancer  3 = Vulvar cancer  4 = Anal cancer  5 = Oral or throat cancer  6 = Cancer, didn't say what type  7 = Genital warts  8 = None of these  [9 = Refused]</p> <p><b>[IF E230=8, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b></p>
E240	rec	<p>Continue to think about the first time the HPV vaccine came up in conversation with [NAME]'s doctor or health care provider.</p> <p>At that visit, did the doctor or health care provider recommend the HPV vaccine for [NAME]?</p> <p><b>[IF E240 = 0, SKIP TO E260. OTHERWISE CONTINUE TO E250]</b></p>	<p>0 = No  1 = Yes  [9 = Refused]</p>
E250	urgency	<p><b>[IF E240=1]</b>  When did the doctor or health care provider tell you [NAME] should get the HPV vaccine?</p>	<p>1 = At <u>that</u> visit  2 = At a <u>later</u> visit  3 = At a visit of my choice  4 = Didn't say when to get it  [9 = Refused]</p>

E260	Primary decision	At that visit, what did you decide to do about getting the HPV vaccine for [NAME]? Did you decide to...	1 = Get it at <u>that</u> visit 2 = Get it at a <u>later</u> visit 3 = Think about it later 4 = Never get it [9 = Refused]
E265_1 _2 _3 _4 _5 _6 _7 _8 _9		At that visit, how did you feel about your HPV vaccine decision? (Check all that apply)	1 = Worried 2 = Unsure 3 = Annoyed 4 = Uncomfortable 5 = At ease 6 = Confident 7 = Relieved 8 = Optimistic 9 = None of these [99 = Refused]  <b>[IF E265=9, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
E268		At that visit, how much did [NAME]'s doctor or health care provider agree with your HPV vaccine decision? Did the doctor or health care provider...	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
E270_1 _2 _3 _4 _5 _6 _7 _9		<b>[IF E260 = 1 OR 9, SKIP TO E275. IF E260 = 2, 3, OR 4 CONTINUE]</b>  When you decided <u>not</u> to get the HPV vaccine, did [NAME]'s doctor or health care provider... (Check all that apply)	1 = Accept your decision 2 = Give you more information 3 = Offer to talk about the HPV vaccine again at a later visit 4 = Try to change your mind 5 = Ask you to sign a form confirming that you refuse to vaccinate 6 = Move on with the visit without much comment 7 = None of these [9 = Refused]  <b>[IF E270=7, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>

E275_1 _2 _3 _4 _5 _6 _7		How <u>should</u> doctors or health care providers respond when parents decide <u>not</u> to get the HPV vaccine for a child who is due for it? Should they... (Check all that apply)	1 = Accept your decision 2 = Give you more information 3 = Offer to talk about the HPV vaccine again at a later visit 4 = Try to change your mind 5 = Ask you to sign a form confirming that you refuse to vaccinate 6 = Move on with the visit without much comment 7 = None of these [9 = Refused]  <b>[IF E275=7, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
E280_1 _2 _3 _4		<b>[IF E200 = 0, SKIP TO E285]</b>  <b>[IF E260 = 1 OR 9, SKIP TO E285. IF E260 = 2, 3, OR 4 CONTINUE]</b>  When you decided not to get the HPV vaccine for [NAME], did the doctor or health care provider follow up by... (Check all that apply)	1 = Scheduling another visit to talk about it again 2 = Bringing it up again at the next check-up 3 = Sending a reminder (by phone, text, email, or mail) 4 = None of these [9 = Refused]  <b>[IF E280=4, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
E285_1 _2 _3 _4		How <u>should</u> doctors or health care providers follow-up when parents decide <u>not</u> to get the HPV vaccine? Should they... (Check all that apply)	1 = Schedule another visit to talk about it 2 = Bring it up again at the next check-up 3 = Send a reminder (by phone, text, email, or mail) 4 = None of these [9 = Refused]  <b>[IF E285=4, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
E290		<b>[IF E200 = 0, SKIP TO F500]</b> How did your conversation about the HPV vaccine affect <u>that visit</u> with [NAME]'s doctor or health care provider? Did it make the visit...	1 = Much less comfortable 2 = Somewhat less comfortable 3 = Neither more or less comfortable 4 = Somewhat more comfortable 5 = Much more comfortable [9 = Refused]

E295		Did your conversation about the HPV vaccine affect <u>your overall confidence</u> in [NAME]'s doctor or health care provider? Did it make you...	1 = Much less confident 2 = Somewhat less confident 3 = Neither more or less confident 4 = Somewhat more confident 5 = Much more confident [9 = Refused]
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#### SECTION F: SOCIAL INTERACTIONS

Item #	Construct	Item	Response scale
F500_1 _2 _3 _4 _5 _6 _7 _8	Conversations-people	Who have you talked to about the HPV vaccine? (Check all that apply)  <b>[IF F500 = 1-7 or F500=refused, CONTINUE TO F505; IF F500 = 8 SKIP TO G595]</b>	1 = My spouse or significant other 2 = My child 3 = Other family member 4 = Friend or other parent 5 = [NAME]'s doctor or health care provider 6 = Other doctor or health care provider 7 = Someone else 8 = I did not talk to anyone about the HPV vaccine [9 = Refused]  <b>[IF F500=8, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
F505_1 _2 _3 _4 _5 _6 _7	Conversations-people	Who did you talk to <u>the most</u> about the HPV vaccine?	1 = My spouse or significant other 2 = My child 3 = Other family member 4 = Friend or other parent 5 = [NAME]'s doctor or health care provider 6 = Other doctor or health care provider 7 = Someone else [9 = Refused]  <b>[LIST ONLY RESPONSES CHECKED IN F500.]</b>

F510_1 _2 _3 _4 _5 _6 _7 _8	Conversations- Information type	What came up during these conversations about the HPV vaccine? (Check all that apply.)	1 = Diseases prevented by the HPV vaccine 2 = National recommendations for the HPV vaccine 3 = Age to start the HPV vaccine 4 = The HPV vaccine for children not sexually active 5 = The HPV vaccine for boys 6 = School requirements for the HPV vaccine 7 = Safety or side effects of the HPV vaccine 8 = Something else [9 = Refused]
F515_1 _2 _3 _4 _5 _6 _7 _8 _9	Negative emotions	Did these conversations about the HPV vaccine make you feel... (Check all that apply.)	1 = Worried 2 = Unsure 3 = Annoyed 4 = Uncomfortable 5 = At ease 6 = Confident 7 = Relieved 8 = Optimistic 9 = None of these [99 = Refused]  <b>[IF F515=9, DO NOT ALLOW OTHER RESPONSE OPTIONS.]</b>
F520	Conversations- Sentiment	In general, these conversations about the HPV vaccine were...	1 = Mostly positive 2 = Mostly negative 3 = Somewhere in between [9 = Refused]

#### SECTION G: INFORMATION SEEKING

Item #	Construct	Item	Response scale
G595	Social media use	The next questions are about social media. Examples of social media include Facebook, Twitter, Instagram, Reddit, YouTube, and others.  How much time do you spend on social media in a typical day?	1 = None 2 = Less than 1 hour 3 = At least 1 hour but less than 2 hours 4 = At least 2 hours but less than 3 hours 5 = 3 hours or more [9 = Refused]
G610	Vaccines- social media exposure	Have you ever seen information on social media about <b><u>vaccines of any kind?</u></b>	0 = No 1 = Yes [9 = Refused]

G615_1 _2 _3 _4 _5 _6 _Other	Vaccines- sites where info seen	Where have you seen information about vaccines? (Check all that apply).	1. Facebook 2. Twitter 3. Instagram 4. Reddit 5. YouTube 6. Other social media (specify): _____
G620_1 _2 _3 _4 _5 _6 _7 _8 _9	Vaccines- topics seen on social media	What kind of information have you seen on social media about vaccines? (Check all that apply.)	1. Diseases prevented by vaccines 2. National recommendations for vaccines 3. School requirements for vaccines 4. Safety or side effects of vaccines 5. Parents' opinions about vaccines 6. Stories about celebrities 7. Advertisements from drug companies 8. Stories from local or national news 9. Something else [99=Refuse]
G630	Vaccines- seen supporting information	How much information did you see <u>supporting</u> vaccines on social media?	1. None 2. A little 3. Some 4. A lot [9=Refuse]
G631	Vaccines- seen questioning information	How much information did you see <u>questioning</u> vaccines on social media?	1. None 2. A little 3. Some 4. A lot [9=Refuse]
G635_1 _2 _3 _4 _5	Vaccines- posted information by type	Have you ever <b>posted</b> any of the following things about vaccines on social media? (check all that apply)	1. Information supporting them 2. Information questioning them 3. Request for information about them 4. Something else 5. I haven't posted anything about vaccines on social media  <b>[IF G635=5 DO NOT ALLOW OTHER RESPONSES]</b>
G636_1 _2 _3 _4 _5	Vaccines- liked a post by type	Have you ever <b>"liked"</b> a <b>post</b> about any of the following things about vaccines on social media? (check all that apply).	1. Information supporting them 2. Information questioning them 3. Request for information about them 4. Something else 5. I haven't liked any posts about vaccines on social media  <b>[IF G636=5 DO NOT ALLOW OTHER RESPONSES]</b>

G640	HPV- social media exposure	Have you seen information on social media about <b><u>the HPV vaccine specifically?</u></b>	0. No 1. Yes
G641_1 _2 _3 _4 _5 _6 _other	HPV- sites where HPV info seen	Where have you seen information about the HPV vaccine?	1. Facebook 2. Twitter 3. Instagram 4. Reddit 5. YouTube 6. Other social media (specify): _____ [O]
G645_1 _2 _3 _4 _5 _6 _7 _8 _9	HPV- topics seen on social media	What kind of information have you seen on social media about the HPV vaccine? (Check all that apply.)	1 = Diseases prevented by it 2 = National recommendations for it 3 = School requirements for it 4 = Safety or side effects 5 = Parents' opinions about it 6 = Stories about celebrities 7 = Advertisements from drug companies 8 = Stories from local or national news 9=something else [99 = Refused]
G650	HPV- seen supporting info	How much information did you see <u>supporting</u> the HPV vaccine on social media?	1 = None 2 = A little 3 = Some 4 = A lot [9 = Refused]
G651	HPV- seen questioning information	How much information did you find <u>questioning</u> the HPV vaccine on social media?	1 = None 2 = A little 3 = Some 4 = A lot [9 = Refused]
G655	HPV- most memorable thing seen	What is the most memorable thing that you have ever seen on social media about the HPV vaccine?	[Open-ended]
G660_1 _2 _3 _4 _5	HPV- posted info by type	Have you ever <b><u>posted</u></b> any of the following things about the HPV vaccine on social media? (Check all that apply.)	1 = Information supporting it 2 = Information questioning it 3 = Request for information about it 4 = Something else 5 = I haven't posted anything about the HPV vaccine on social media [9 = Refused] <b>[IF G660=5 DO NOT ALLOW OTHER RESPONSES]</b>

G661	HPV- liked a post by type	Have you ever <b>“liked” a post</b> about any of the following things about the HPV vaccine on social media? (check all that apply).	1. Information supporting it 2. Information questioning it 3. Request for information about it 4. Something else 5. I haven’t liked a post about the HPV vaccine on social media <b>[IF G661=5 DO NOT ALLOW OTHER RESPONSES]</b>
G662	HPV- willingness to join group	How willing would you be to join a social media group for parents who are deciding about the HPV vaccine?	1. Not at all 2. Possibly 3. Definitely
G665_1_2_3_4_5_6	Stories - harm	The next questions are about stories you may have heard -- in the media or in conversations with other people.  Have you heard of people being harmed by the HPV vaccine? Have you heard of people who have... (Check all that apply.)	1 = had mild side effects 2 = had serious temporary harms 3 = had serious long-lasting harms 4 = died 5 = I’ve heard of people being harmed, but you are not sure how 6 = I haven’t heard of anyone being harmed [9 = Refused]  <b>[IF G665 = 5 OR 6, DO NOT ALLOW OTHER RESPONSE OPTIONS]</b>  <b>[IF G665 = 6 SKIP TO G680]</b>
G670_1_1 to 1_5 (refused)  G670_2_1 to 2_5 (refused)  G670_3_1 to 3_5 (refused)  G670_4_1 to 4_5 (refused)  G670_5_1 to 5_5 (refused)	Media source - harm	<b>[IF G665 = 1, 2, 3 OR 4]</b> Where did you hear stories about people who <b>[INSERT RESPONSE FROM G665]</b> after getting the HPV vaccine? (Check all that apply.)  <b>[IF G665 = 5]</b> Where did you hear stories about people who were harmed by the HPV vaccine? (Check all that apply.)	1 = In social media 2 = In traditional media 3 = In conversations with other people 4 = Somewhere else [9 = Refused]

G675_1 _2 _3 _4 _5	Impact - harm	How did hearing this story affect the likelihood of you getting the HPV vaccine for [NAME]?	1 = Made it less likely 2 = No effect 3 = Made it more likely [9 = Refused]
G680_1 _2 _3 _4 _5 _6 _7	Stories - disease prevention	Have you ever heard of people having health problems the HPV vaccine could have prevented? Have you heard of people who... (Check all that apply)	1 = got genital warts 2 = got HPV 3 = had an abnormal Pap smear 4 = got an HPV-related cancer 5 = died from an HPV-related cancer 6 = had some other HPV-related health problem but you are not sure what 7= You haven't heard of anyone having health problems the HPV vaccine could have prevented [9 = Refused]  <b>[IF G680=7, DO NOT ALLOW OTHER RESPONSE OPTIONS AND SKIP TO H700.]</b>
G685_1_1 to 1_5 (refused)  G685_2_1 to 2_5 (refused)  G685_3_1 to 3_5 (refused)  G685_4_1 to 4_5 (refused)  G685_5_1 to 5_5 (refused)  G685_6_1 to 6_5 (refused)	Media source – benefit	<b>[IF G680 = 1, 2, 3, 4 OR 5]</b> Where did you hear stories about people who [INSERT RESPONSE FROM G665]?  <b>[IF G680 = 6]</b> Where did you hear stories about people who had some other HPV-related health problem?	1 = In social media 2 = In traditional media 3 = In conversations with other people 4 = Somewhere else [9 = Refused]

G690_1 _2 _3 _4 _5 _6	Impact - benefit	How did hearing these stories affect the likelihood of you getting the HPV vaccine for [NAME]?  [REPEAT G685 AND G690 FOR EACH RESPONSE SELECTED IN G680. SHOW ON SAME SCREEN AS G685, WITH A SEPARATE SCREEN FOR EACH PAIR]	1 = Made it less likely 2 = No effect 3 = Made it more likely [9 = Refused]
<b>SECTION H. Part 1. ANNOUNCE METHOD EXPERIMENT</b>			
Item #	Construct	Item	Response scale
H700		Next you will see 1-3 short videos with messages about the HPV vaccine. Then, you will answer some questions to help us make the messages better.	
H708		<b>Programmer: assign respondents to one of the 4 groups USING RANDOMIZE WITHOUT REPLACEMENT.</b> (e.g., if there are 4 conditions, the first person is in one of them, the next person is in one of the remaining three, the next person is in one of the remaining two, and the last person goes to the last condition. Then the process starts over)	<b>1 = Announce Video ONLY (H710)</b> <b>2 = Announce and Acknowledge/Ease Videos (H710, H720)</b> <b>3 = Announce and Acknowledge/Ease Videos and Recommend Videos (H710, H720, H721)</b> <b>4 = Announce and Recommend Videos (H710, H721)</b>
H705	Randomization to CONCERN	<b>[RANDOMIZE PARTICIPANT TO ONE OF THE SEVEN CONCERNS]</b> <b>STEP1:</b> <b>BASE: IF ANYC400 TO C430=2 OR 3; Assign respondents to one of the H705 groups where c400 to c430=2 or 3 USING RANDOMIZE WITHOUT REPLACEMENT.</b> <b>IF C400=2 OR 3 H705=1;</b> <b>IF C405=2 OR 3 H705=2;</b> <b>IF C410=2 OR 3 H705=3;</b> <b>IF C415=2 OR 3 H705=4;</b> <b>IF C420=2 OR 3 H705=5;</b> <b>IF C425=2 OR 3 H705=6;</b> <b>IF C425=2 OR 3 H705=7;</b>  <b>STEP2:</b> <b>IF ALL C400 TO C430=1 OR REFUSED: assign respondents to one of the H705 groups USING RANDOMIZE WITHOUT REPLACEMENT</b>	<b>[IN REST OF SURVEY: REPLACE “CONCERN” WITH CATEGORY RESPONDENT HAS BEEN PLACED IN WHERE</b> 1 = the diseases prevented by the HPV vaccine 2 = national recommendations for the HPV vaccine 3 = the age to start the HPV vaccine 4 = the HPV vaccine for children not sexually active 5 = the HPV vaccine for boys 6 = school requirements for the HPV vaccine 7 = safety or side effects of the HPV vaccine]

CHECK		<p><b>This is a practice video. Press play when you are ready.</b></p> <p><b>[INSERT VIDEO A01, DO NOT play automatically, enable/show the replay button]</b></p> <p><b>[sp, PROMPT ONCE]</b>  <b>CHECK. Were you able to see and hear the video?</b></p> <p>Please click here if you were not able to see or hear the video. <b>[hyper link to the corresponding video text “Hi. I am Dr. Karen Todd. I’d like you to imagine that you are at your child’s check-up, and I’ll play the role of your child’s doctor.”]</b></p>	<p>1 = Yes 2 = No</p>
H710	Announce video	<p><b>H710</b>  <b>[INSERT VIDEO A01, SHOULD START AUTOMATICALLY, enable replay]</b></p> <p><i>[Hi. I am Dr. Karen Todd. I’d like you to imagine that you are at your child’s check-up, and I’ll play the role of your child’s doctor. [PAUSE]</i>  <i>At your child’s age, children are due for vaccines against meningitis, HPV cancers and whooping cough. We will give the vaccines that your child is due for at the end of today’s visit.]</i></p> <p>After watching this video, please click <u>next</u>.</p> <p>Please click here if you were not able to see or hear the video. <b>[hyper link to A01 TEXT in appendix H. part 1. Announce Experiment]</b></p>	<p><b>[ALL 4 GROUPS FROM H708 RECEIVE ANNOUNCE VIDEO—A01]</b></p> <p><b>[GROUP 1 SKIP TO H724; GROUPS 2 &amp; 3 CONTINUE TO H720; GROUP 4 SKIPS TO H721]</b></p>

H720_video	Randomization to VIDEO WITHIN CONCERN	<b>[RANDOMIZE PARTICIPANT TO RECEIVE ONE OF FOUR POSSIBLE VIDEOS FROM WITHIN CONCERN ASSIGNED IN H705 IN H720] assign respondents to receive one of the 4 videos within concern assigned in H705 USING RANDOMIZE WITHOUT REPLACEMENT.</b> (e.g., if there are 4 videos, the first person is in one of them, the next person is in one of the remaining three, the next person is in one of the remaining two, and the last person goes to the last condition. Then the process starts over)	If H705 = 1, randomize to receive K61, K62, K63, OR K64; If H705 = 2, randomize to receive K41, K42, K43, OR K44; If H705 = 3, randomize to receive K02, K03, K06, OR K07; If H705 = 4, randomize to receive K11, K12, K14, OR K15; If H705 = 5, randomize to receive K52, K53, K55, OR K56; If H705 = 6, randomize to receive K21, K23, K25, OR K26; If H705 = 7, randomize to receive K32, K33, K34, OR, K36.
H720_video	Acknowledge + Ease video	<b>[INSERT VIDEO, SHOULD START AUTOMATICALLY, enable replay]</b>  After watching this video, click <u>next</u> . <b>[SHOW NEXT BUTTON]</b>  Please click here if you were not able to see or hear the video. <b>[hyper link to the corresponding video text in appendix H. part 1. Announce Experiment]</b>	[IF H708=2, skip to H724] [IF H708=3, continue to H721]
H721	Recommend video	<b>[INSERT VIDEO R72, SHOULD START AUTOMATICALLY, enable replay]</b>  After watching this video, click <u>next</u> .  Please click here if you were not able to see or hear the video. <b>[hyper link to R72 TEXT in appendix H. part 1. Announce Experiment]</b>	[IF H708=3 OR 4]
H724	Confidence	Say how much you agree or disagree with the following statements.  Overall, the HPV vaccine will benefit my child's health.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree <b>[PROMPT TWICE]</b>
H725	Intention (0 dose)	<b>[IF A90 = 1 OR 4, SKIP TO H726. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b> I am <u>likely</u> to get [NAME] the HPV vaccine in the next year.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree <b>[PROMPT TWICE]</b>

H726	Intention (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H730. IF A90=1 OR 4 CONTINUE WITH THIS ITEM]</b></p> <p>I am <u>likely</u> to get [NAME] the next dose of HPV vaccine in the next year.</p>	<p>1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree</p> <p><b>[PROMPT TWICE]</b></p>
H730	Intention (0 dose)	<p><b>[IF A90 = 1 OR 4, SKIP TO H731. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>I <u>want</u> to get the HPV vaccine for [NAME] in the next year.</p>	<p>1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree</p> <p><b>[PROMPT TWICE]</b></p>
H731	Intention (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H735]</b></p> <p>I <u>want</u> to get the next dose of the HPV vaccine for [NAME] in the next year.</p>	<p>1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree</p> <p><b>[PROMPT TWICE]</b></p>
H735	Intention (0 dose)	<p><b>[IF A90 = 1 OR 4, SKIP TO H736. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>I <u>plan</u> to get the HPV vaccine for [NAME] in the next year.</p>	<p>1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree</p> <p><b>[PROMPT TWICE]</b></p>
H736	Intention (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H740. IF A90=1 OR 4, CONTINUE WITH THIS ITEM]</b></p> <p>I <u>plan</u> to get the next dose of the HPV vaccine for [NAME] in the next year.”</p>	<p>1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree</p> <p><b>[PROMPT TWICE]</b></p>
H740	Endorsement	<p>How strongly do you think the doctor in the videos recommends the HPV vaccine for [NAME]?</p>	<p>1 = Not at all 2 = Slightly 3 = Moderately 4 = Very 5 = Extremely</p>

## SECTION H, PART 2. EASE CONCERNS EXPERIMENT

Item #	Construct	Item	Response scale
H770	Prompt	Next you will see 4 more short videos in which a doctor addresses questions about [INSERT H705].	<p>If H705 = 1, randomize to receive K61C, K62C, K63C, AND K64C;</p> <p>If H705 = 2, randomize to receive K41C, K42C, K43C, AND K44C;</p> <p>If H705 = 3, randomize to receive K02C, K03C, K06C, AND K07C;</p> <p>If H705 = 4, randomize to receive K11C, K12C, K14C, AND K15C;</p> <p>If H705 = 5, randomize to receive K52C, K53C, K55C, AND K56C;</p> <p>If H705 = 6, randomize to receive K21C, K23C, K25C, AND K26C;</p> <p>If H705 = 7, randomize to receive K32C, K33C, K34C, AND K36C.</p>
H775_video	Ease Video #1	<p>Here is the first video.</p> <p>After watching this video, click <u>next</u>.</p> <p>Please click here if you were not able to see or hear the video. [hyper link to the corresponding video text in appendix H. part 2. Ease Concerns Experiment]</p>	
H780	Perceived Effectiveness	<p>The doctor said: [insert video text in appendix H. part 2. Ease Concerns Experiment]</p> <p>How much would hearing your doctor or health care provider say this increase your confidence in the HPV vaccine?</p> <p>Click here if you want to replay the video. [SHOW REPLAY BUTTON for the first video]</p>	<p>1 = Not at all</p> <p>2 = A little</p> <p>3 = Moderately</p> <p>4 = A lot</p> <p>[9 = Refused]</p>

H785	Perceived Effectiveness	<p><b>[IF A90 = 1 OR 4, SKIP TO H786. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the first video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H786	Perceived Effectiveness (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H790]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the next dose of the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the first video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H787	Awareness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>Before today, had you heard the information the doctor shared in the video?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the first video]</b></p>	<p>1 = Yes 2 = No 3 = Not sure [9 = Refused]</p>
H790_video	Ease Video #2	<p>Here is the second video.</p> <p>After watching this video, click <u>next</u>.</p> <p>Please click here if you were not able to see or hear the video. <b>[hyper link to the corresponding video text in appendix H. part 2. Ease Concerns Experiment]</b></p>	

H795	Perceived Effectiveness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this increase your confidence in the HPV vaccine?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the SECOND video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H797	Perceived Effectiveness (0 dose)	<p><b>[IF A90 = 1 OR 4, SKIP TO H801. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE SECOND VIDEO]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H798	Perceived Effectiveness (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H805]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the next dose of the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE SECOND VIDEO]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>

H800	Awareness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>Before today, had you heard the information the doctor shared in the video?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE SECOND VIDEO]</b></p>	<p>1 = Yes 2 = No 3 = Not sure [9 = Refused]</p>
H805_video	Ease Video #3	<p>Here is the third video.</p> <p>After watching this video, click <u>next</u>.</p> <p>Please click here if you were not able to see or hear the video. <b>[hyper link to the corresponding video text in appendix H. part 2. Ease Concerns Experiment]</b></p>	
H810	Perceived Effectiveness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this increase your confidence in the HPV vaccine?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the third video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H815	Perceived Effectiveness	<p><b>[IF A90 = 1 OR 4, SKIP TO H816. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE THIRD VIDEO]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>

H816	Perceived Effectiveness (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H820]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the next dose of the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the third video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H817	Awareness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>Before today, had you heard the information the doctor shared in the video?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the third video]</b></p>	<p>1 = Yes 2 = No 3 = Not sure [9 = Refused]</p>
H820_video	Ease Video #4	<p>Here is the fourth video.</p> <p>After watching this video, click <u>next</u>.</p> <p>Please click here if you were not able to see or hear the video. <b>[hyper link to the corresponding video text in appendix H. part 2. Ease Concerns Experiment]</b></p>	
H825	Perceived Effectiveness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this increase your confidence in the HPV vaccine?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the Fourth video]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>

H830	Perceived Effectiveness	<p><b>[IF A90 = 1 OR 4, SKIP TO H831. IF A90 = 0 OR 5 CONTINUE WITH THIS ITEM]</b></p> <p>How much would hearing your doctor or health care provider say this make you want to get the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE FOURTH VIDEO]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H831	Perceived Effectiveness (1 dose)	<p><b>[IF A90 = 0 OR 5, SKIP TO H835]</b></p> <p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>How much would hearing your doctor or health care provider say this make you want to get the next dose of the HPV vaccine for your child?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON FOR THE FOURTH VIDEO]</b></p>	<p>1 = Not at all 2 = A little 3 = Moderately 4 = A lot [9 = Refused]</p>
H832	Awareness	<p>The doctor said: [insert <b>video text in appendix H. part 2. Ease Concerns Experiment</b>]</p> <p>Before today, had you heard the information the doctor shared in the video?</p> <p>Click here if you want to replay the video. <b>[SHOW REPLAY BUTTON for the Fourth video]</b></p>	<p>1 = Yes 2 = No 3 = Not sure [9 = Refused]</p>
H835	Perceived Effectiveness Rated	<p>Think about the messages you heard in the videos.</p> <p>Which message would <u>increase your confidence</u> in the HPV vaccine the most?</p>	<p><b>1 = [INSERT TEXT OF FIRST VIDEO VIEWED BY THIS RESPONDENT]</b> <b>2 = [INSERT TEXT OF SECOND VIDEO VIEWED BY THIS RESPONDENT]</b> <b>3 = [INSERT TEXT OF THIRD VIDEO VIEWED BY THIS RESPONDENT]</b> <b>4 = [INSERT TEXT OF FOURTH VIDEO VIEWED BY THIS RESPONDENT]</b> <b>[9 = Refused]</b></p>

H840	Perceived Effectiveness Rated	<p>Think about the messages you heard in the videos.</p> <p>Which message would <u>motivate you to get</u> the HPV vaccine for your child the most?</p>	<p><b>1 = [INSERT TEXT OF FIRST VIDEO VIEWED BY THIS RESPONDENT]</b></p> <p><b>2 = [INSERT TEXT OF SECOND VIDEO VIEWED BY THIS RESPONDENT]</b></p> <p><b>3 = [INSERT TEXT OF THIRD VIDEO VIEWED BY THIS RESPONDENT]</b></p> <p><b>4 = [INSERT TEXT OF FOURTH VIDEO VIEWED BY THIS RESPONDENT]</b></p> <p><b>[9 = Refused]</b></p>
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## SECTION I: TWITTER EXPERIMENT

Item #	Construct	Item	Response scale
I855	Randomization	<p>People and organizations use Twitter to share information about the HPV vaccine. We'd like to understand how tweets about the vaccine might affect parents.</p> <p><b>[RANDOMIZE PARTICIPANT TO TWEET IMAGE] Programmer: randomly assign respondents a value from the following numbers:11, 12, 13, 14 ,21 ,22 ,23 ,24 ,31, 32, 33, 34, 41, 42, 43 or 44. assign respondents to one of the 16 on p.33 USING RANDOMIZE WITHOUT REPLACEMENT. (e.g., if there are 16 conditions, the first person is in one of them, the next person is in one of the remaining 15, the next person is in one of the remaining 14,..., and the last person goes to the last condition. Then the process starts over)</b></p>	<p><b>IF I855=11 respondent will see Tweet 11, pro, story, safe, person.</b></p> <p><b>IF I855=12 respondent will see Tweet 12, pro, story, safe, org.</b></p> <p><b>IF I855=13 respondent will see Tweet 13, pro, story, effectiveness, person.</b></p> <p><b>IF I855=14 respondent will see Tweet 14, pro, story, effectiveness, org.</b></p> <p><b>IF I855=21 respondent will see Tweet 21, anti, story, safe, person.</b></p> <p><b>IF I855=22 respondent will see Tweet 22, anti, story, safe, org.</b></p> <p><b>IF I855=23 respondent will see Tweet 23, anti, story, effectiveness, person.</b></p> <p><b>IF I855=24 respondent will see Tweet 24, anti, story, effectiveness, org.</b></p> <p><b>IF I855=31 respondent will see Tweet 31, pro, data, safe, person.</b></p> <p><b>IF I855=32 respondent will see Tweet 32, pro, data, safe, org.</b></p> <p><b>IF I855=33 respondent will see Tweet 33, pro, data, effectiveness, person.</b></p> <p><b>IF I855=34 respondent will see Tweet 34, pro, data, effectiveness, org.</b></p> <p><b>IF I855=41 respondent will see Tweet 41, anti, data, safe, person.</b></p> <p><b>IF I855=42 respondent will see Tweet 42, anti, data, safe, org.</b></p> <p><b>IF I855=43 respondent will see Tweet 43, anti, data, effectiveness, person.</b></p> <p><b>IF I855=44 respondent will see Tweet 44, anti, data, effectiveness, org.</b></p>

I860	Trust	<p><b>[INSERT TWEET IMAGE ABOVE QUESTION TEXT]</b></p> <p>How much do you trust this tweet?</p>	<p>1 = Not at all  2 = A little  3 = A moderate amount  4 = Quite a lot  5 = Completely  [9 = Refused]</p>
I865	Risk appraisal	<p><b>Here is an example of a recent tweet.</b></p> <p><b>[INSERT TWEET IMAGE ABOVE QUESTION]</b></p> <p>Does this tweet make you...</p>	<p>1 = Much less concerned about diseases prevented by the HPV vaccine  2 = Somewhat less concerned  3 = Neither more or less concerned  4 = Somewhat more concerned  5 = Much more concerned about diseases prevented by the HPV vaccine  [9 = Refused]</p>
I870	Confidence - safety	<p><b>Here is an example of a recent tweet.</b></p> <p><b>[INSERT TWEET IMAGE ABOVE QUESTION]</b></p> <p>Does this tweet make you...</p>	<p>1 = Much less confident that the HPV vaccine is safe  2 = Somewhat less confident  3 = Neither more or less confident  4 = Somewhat more confident  5 = Much more confident that the HPV vaccine is safe  [9 = Refused]</p>
I875	Confidence - effectiveness	<p><b>Here is an example of a recent tweet.</b></p> <p><b>[INSERT TWEET IMAGE ABOVE QUESTION]</b></p> <p>Does this tweet make you...</p>	<p>1 = Much less confident that the HPV vaccine is effective  2 = Somewhat less confident  3 = Neither more or less confident  4 = Somewhat more confident  5 = Much more confident that the HPV vaccine is effective  [9 = Refused]</p>
I880	Motivation to vaccinate	<p><b>Here is an example of a recent tweet.</b></p> <p><b>[INSERT TWEET IMAGE ABOVE QUESTION]</b></p> <p>Does this tweet make you...</p>	<p>1 = Much less willing to get the HPV vaccine for your child  2 = Somewhat less willing  3 = Neither more or less willing  4 = Somewhat more willing  5 = Much more willing to get the HPV vaccine for your child  [9 = Refused]</p>

SECTION J. DEMOGRAPHICS			
Item #	Construct	Item	Response scale
J932	Child's sex	What was [NAME]'s sex at birth?	1 = Male 2 = Female  <b>[FORCE A RESPONSE TO THIS QUESTION]</b>
J940	Ethnicity	Is [NAME] Hispanic or [ETHNICITY]?	0 = No 1 = Yes [9 = Refused]  <b>[IF J932 = 1 "Male", THEN "ETHNICITY" = "Latino"]</b> <b>[IF J932 = 2 "Female", THEN "ETHNICITY" = "Latina"]</b>
J945_1 _2 _3 _4 _5 _6 _Other	Race	What is [NAME]'s race or ethnicity? (Check all that apply.)	1 = White 2 = Black or African American 3 = Asian 4 = Native Hawaiian or Pacific Islander 5 = American Indian or Alaska Native 6 = Other, please specify: <b>[OPEN ENDED]</b> [9 = Refused]
J950	Perceived health	In general, would you say [NAME]'s health is:	1 = Excellent 2 = Very good 3 = Good 4 = Fair 5 = Poor [9 = Refused]
J955	Decision-making	In your household, who is the main person who makes decisions about [NAME]'s health care?	1 = You 2 = Your spouse or partner 3 = [NAME] 4 = Someone else [9 = Refused]
J960	Reactance	Say how much you agree or disagree with the next statements.  I become frustrated when I am unable to make free and independent decisions.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
J962	Reactance	Regulations trigger a sense of resistance in me.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]

J964	Reactance	When someone forces me to do something, I feel like doing the opposite.	1 = Strongly disagree 2 = Somewhat disagree 3 = Neither disagree or agree 4 = Somewhat agree 5 = Strongly agree [9 = Refused]
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## Appendices

- 1) **H. part 1. Announce Experiment, list of videos and text**
- 2) **H. part 2. Ease Concerns Experiment, list of videos and text**
- 3) **I. Twitter Experiment, table of tweets for I855**

### 1) **H. part 1. Announce Experiment**

<b>No.</b>	<b>Announce Statement (H710)</b>
A01	At your child's age, children are due for vaccines against meningitis, HPV cancers and whooping cough. We will give the vaccines that your child is due for at the end of today's visit. Hi. I am Dr. Karen Todd. I'd like you to imagine that you are at your child's check-up, and I'll play the role of your child's doctor.
<b>CONCERNS</b>	
<b>No.</b>	<b>1 = the diseases prevented by the HPV vaccine</b>
K61	I hear you. You're wondering about the diseases that the HPV vaccine can prevent. HPV infection can cause cancer in both men and women. The HPV vaccine will protect your child from many of these cancers.
K62	I hear you. You're wondering about the diseases that the HPV vaccine can prevent. HPV is so common that almost everyone will get it at some point. Most people will never know they are infected. We can prevent it by starting HPV vaccination today.
K63	I hear you. You're wondering about the diseases that the HPV vaccine can prevent. Over 30,000 Americans get cancer from HPV every year. Most could be prevented with the HPV vaccine.
K64	I hear you. You're wondering about the diseases that the HPV vaccine can prevent. HPV is a common virus that millions of people get every year. The HPV vaccine will protect your child from some cancers and genital warts.
<b>No.</b>	<b>2 = national recommendations for the HPV vaccine</b>
K41	I hear you. You're wondering about recommendations for the HPV vaccine. The American Academy of Pediatrics recommends giving the HPV vaccine by age 11 or 12. In our practice, we recommend it too.
K42	I hear you. You're wondering about recommendations for the HPV vaccine. Guidelines recommend giving the HPV vaccine before age 13. I've given the HPV vaccine to my children, and I'd want the same protection for yours.
K43	I hear you. You're wondering about recommendations for the HPV vaccine. Preventive care is important to me. I keep up to date on HPV vaccine guidelines. They show your child is due for the HPV vaccine today.
K44	I hear you. You're wondering about recommendations for the HPV vaccine. Experts at the CDC agree that kids should get the HPV vaccine by age 11 or 12 to prevent several cancers.
<b>No.</b>	<b>3 = the age to start the HPV vaccine</b>
K02	I hear you. You're wondering if your kid is too young for the HPV vaccine. But kids respond more strongly to HPV vaccine when they are younger. This may give better protection against some cancers.
K03	I hear you. You're wondering if your kid is too young for the HPV vaccine. But your kid's immune system is super powerful at this age. So they will get great protection if we start the HPV vaccine series today.
K06	I hear you. You're wondering if your kid is too young for the HPV vaccine. But it is very important to give the HPV vaccine well before exposure to the virus.

K07	I hear you. You're wondering if your kid is too young for the HPV vaccine. But the younger the better. If we start HPV vaccination at 11 or 12, your kid only needs two doses, not three.
<b>No.</b>	<b>4 = the HPV vaccine for children not sexually active</b>
K11	I hear you, your child's not yet sexually active. The thing is this virus is so common that almost everyone is exposed at some point. We are giving the HPV vaccine today so your child will have the best possible protection.
K12	I hear you, your child's not yet sexually active. That's perfect many kids this age are not yet sexually active. Now let's get your child the HPV vaccine well before any exposure ever takes place.
K14	I hear you, your child's not yet sexually active. The thing is we vaccinate kids well before they are exposed to an infection, as with all vaccines.
K15	I hear you, your child's not yet sexually active. The thing is this really isn't about sexual activity. The HPV vaccine is about preventing cancer.
<b>No.</b>	<b>5 = the HPV vaccine for boys</b>
K52	I hear you. You're wondering why we recommend the HPV vaccine for boys. HPV is a very common virus that infects boys and girls. We can protect your child from the cancers caused by the virus by vaccinating today.
K53	I hear you. You're wondering why we recommend the HPV vaccine for boys It's true that only females can get cervical cancer. But the HPV vaccine protects boys and girls from some other cancers, as well as genital warts.
K55	I hear you. You're wondering why we recommend the HPV vaccine for boys. Men who have HPV probably don't know it. When boys get the HPV vaccine, they can protect themselves and future partners.
K56	I hear you. You're wondering why we recommend the HPV vaccine for boys. HPV infections don't care if you're a boy or girl. The virus can cause cancer and many other diseases.
<b>No.</b>	<b>6 = school requirements for the HPV vaccine</b>
K21	I hear you. You're wondering if the HPV vaccine is necessary because it's not required for school. But we can't wait for schools to know what's best for your child's health.
K23	I hear you. You're wondering if the HPV vaccine is necessary because it's not required for school. But school mandates are always incomplete. The HPV vaccine is a very important vaccine that can prevent many cancers.
K25	I hear you. You're wondering if the HPV vaccine is necessary because it's not required for school. But my job is to keep your child healthy. And medically, the HPV vaccine is very important.
K26	I hear you. You're wondering if the HPV vaccine is necessary because it's not required for school. But school requirements don't always keep up with medical science. The HPV vaccine is necessary to protect your child's health.
<b>No.</b>	<b>7 = safety or side effects of the HPV vaccine</b>
K32	I hear you. You're wondering about the safety or side effects of the HPV vaccine. It might help to know all vaccines can cause minor things like a sore arm. But I wouldn't expect to see anything serious.
K33	I hear you. You're wondering about the safety or side effects of the HPV vaccine. It might help to know we have given over 80 million doses of the HPV vaccine in the US since 2006. It's as safe as the other vaccines I'm recommending today.
K34	I hear you. You're wondering about the safety or side effects of the HPV vaccine. It might help to know my clinic has given thousands of doses of the HPV vaccine, and I'm confident it's very safe.

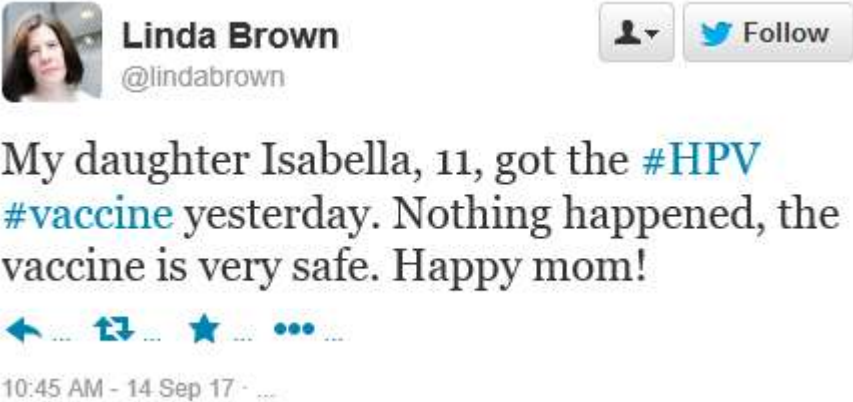
K36	I hear you. You're wondering about the safety or side effects of the HPV vaccine. It might help to know this vaccine is one of the most studied medications on the market. The HPV vaccine is safe, just like the other vaccines we give at this age.
<b>No.</b>	<b>Recommend Statement (H721)</b>
R72	I strongly believe in the importance of this cancer-preventing vaccine for your child. I recommend your child get the HPV vaccine today.



















## 2) H. part 2. Ease Concerns Experiment (H770)

<b>No.</b>	<b>1= the diseases prevented by the HPV vaccine</b>
K61C	HPV infection can cause cancer in both men and women. The HPV vaccine will protect your child from many of these cancers.
K62C	HPV is so common that almost everyone will get it at some point. Most people will never know they are infected. We can prevent it by starting HPV vaccination today.
K63C	Over 30,000 Americans get cancer from HPV every year. Most could be prevented with the HPV vaccine.
K64C	HPV is a common virus that millions of people get every year. The HPV vaccine will protect your child from some cancers and genital warts.
<b>No.</b>	<b>2 = national recommendations for the HPV vaccine</b>
K41C	The American Academy of Pediatrics recommends giving the HPV vaccine by age 11 or 12. In our practice, we recommend it too.
K42C	Guidelines recommend giving the HPV vaccine before age 13. I've given the HPV vaccine to my children, and I'd want the same protection for yours.
K43C	Preventive care is important to me. I keep up to date on HPV vaccine guidelines. They show your child is due for the HPV vaccine today.
K44C	Experts at the CDC agree that kids should get the HPV vaccine by age 11 or 12 to prevent several cancers.
<b>No.</b>	<b>3= the age to start the HPV vaccine</b>
K02C	Kids respond more strongly to HPV vaccine when they are younger. This may give better protection against some cancers.
K03C	Your kid's immune system is super powerful at this age. So they will get great protection if we start the HPV vaccine series today.
K06C	It is very important to give the HPV vaccine well before exposure to the virus.
K07C	The younger the better. If we start HPV vaccination at 11 or 12, your kid only needs two doses, not three.
<b>No.</b>	<b>4 = the HPV vaccine for children not sexually active</b>
K11C	This virus is so common that almost everyone is exposed at some point. We are giving the HPV vaccine today so your child will have the best possible protection.
K12C	Many kids this age are not yet sexually active. Now let's get your child the HPV vaccine well before any exposure ever takes place.
K14C	We vaccinate kids well before they are exposed to an infection, as with all vaccines.
K15C	This really isn't about sexual activity. The HPV vaccine is about preventing cancer.
<b>No.</b>	<b>5 = the HPV vaccine for boys</b>
K52C	HPV is a very common virus that infects boys and girls. We can protect your child from the cancers caused by the virus by vaccinating today.

K53C	Only females can get cervical cancer. But the HPV vaccine protects boys and girls from some other cancers, as well as genital warts.
K55C	Men who have HPV probably don't know it. When boys get the HPV vaccine, they can protect themselves and future partners.
K56C	HPV infections don't care if you're a boy or girl. The virus can cause cancer and many other diseases.
<b>No.</b>	<b>6 = school requirements for the HPV vaccine</b>
K21C	We can't wait for schools to know what's best for your child's health.
K23C	School mandates are always incomplete. The HPV vaccine is a very important vaccine that can prevent many cancers.
K25C	My job is to keep your child healthy. And medically, the HPV vaccine is very important.
K26C	School requirements don't always keep up with medical science. The HPV vaccine is necessary to protect your child's health.
<b>No.</b>	<b>7 = safety or side effects of the HPV vaccine</b>
K32C	All vaccines can cause minor things like a sore arm. But I wouldn't expect to see anything serious.
K33C	We have given over 80 million doses of the HPV vaccine in the US since 2006. It's as safe as the other vaccines I'm recommending today.
K34C	My clinic has given thousands of doses of the HPV vaccine, and I'm confident it's very safe.
K36C	This vaccine is one of the most studied medications on the market. The HPV vaccine is safe, just like the other vaccines we give at this age.















### 3) I. Twitter Experiment, Table of Tweets for item I855

Tweet No.	Tweet
11	 <p>My daughter Isabella, 11, got the #HPV #vaccine yesterday. Nothing happened, the vaccine is very safe. Happy mom!</p> <p>10:45 AM - 14 Sep 17 · ...</p>

12	<div data-bbox="305 184 560 283">  <b>CDC</b>  @CDCgov </div> <div data-bbox="901 184 1153 241">  Follow </div> <p data-bbox="305 315 1088 472">Mom of 2 boys: I got the <a href="#">#HPV</a> <a href="#">#vaccine</a> for my kids. It's the safest choice against HPV infections and cancer.</p> <div data-bbox="305 493 649 535">     </div> <p data-bbox="305 556 568 588">10:45 AM - 14 Sep 17 · ...</p>
13	<div data-bbox="305 619 649 714">  <b>Sarah Wilson</b>  @sarahwilson </div> <div data-bbox="901 619 1153 672">  Follow </div> <p data-bbox="305 745 1112 903">My spouse Robert died from a cancer that could have been prevented. Protect your children, get them the <a href="#">#HPV</a> <a href="#">#vaccine</a>.</p> <div data-bbox="305 924 649 966">     </div> <p data-bbox="305 987 568 1018">10:45 AM - 14 Sep 17 · ...</p>
14	<div data-bbox="305 1050 803 1144">  <b>American Cancer Soc</b>  @AmericanCancer </div> <div data-bbox="901 1050 1153 1102">  Follow </div> <p data-bbox="305 1176 1144 1396">Cancer survivor: I wish the <a href="#">#HPV</a> <a href="#">#vaccine</a> had been available when I was younger. It could have prevented the cancer that's killing me.</p> <div data-bbox="305 1417 649 1459">     </div> <p data-bbox="305 1480 568 1512">10:45 AM - 14 Sep 17 · ...</p>

21	<div data-bbox="300 174 402 275"></div> <div data-bbox="414 184 639 262"> <b>Linda Brown</b>  @lindabrown </div> <div data-bbox="894 174 971 233"></div> <div data-bbox="987 174 1149 233">  Follow </div> <p data-bbox="300 304 1101 464">My daughter Isabella, 11, got the <a href="#">#HPV</a> <a href="#">#vaccine</a> yesterday. She's having horrible side effects. I feel so guilty.</p> <div data-bbox="300 478 643 516">  ...   ...   ...   ... </div> <p data-bbox="300 541 574 573">10:45 AM - 14 Sep 17 · ...</p>
22	<div data-bbox="300 604 414 695"></div> <div data-bbox="425 611 855 688"> <b>Voices Against Vaccines</b>  @Voices </div> <div data-bbox="894 604 971 663"></div> <div data-bbox="987 604 1159 663">  Follow </div> <p data-bbox="300 730 1130 890">Mom of paralyzed boy: Tim was left in wheelchair after <a href="#">#HPV</a> <a href="#">#vaccine</a>. Vaccines were nothing but poison for my family.</p> <div data-bbox="300 905 654 942">  ...   ...   ...   ... </div> <p data-bbox="300 968 589 999">10:45 AM - 14 Sep 17 · ...</p>
23	<div data-bbox="300 1035 402 1136"></div> <div data-bbox="414 1045 651 1123"> <b>Sarah Wilson</b>  @sarahwilson </div> <div data-bbox="894 1035 971 1094"></div> <div data-bbox="987 1035 1149 1094">  Follow </div> <p data-bbox="300 1165 1073 1325">I developed cervical cancer after getting the <a href="#">#HPV</a> <a href="#">#vaccine</a>. I suffer the adverse reactions of this vaccine every day.</p> <div data-bbox="300 1339 643 1377">  ...   ...   ...   ... </div> <p data-bbox="300 1402 574 1434">10:45 AM - 14 Sep 17 · ...</p>

24	<div data-bbox="305 178 409 283"></div> <div data-bbox="423 195 873 233"><b>Vaccine Freedom Alliance</b></div> <div data-bbox="423 239 652 273">@VaccineAlliance</div> <div data-bbox="906 184 971 239"></div> <div data-bbox="997 184 1136 239"></div> <p data-bbox="305 310 1115 470">Sad that it takes losing a loved one to see the dangers &amp; lies of <a href="#">#HPV</a> <a href="#">#vaccine</a>. The only effective vaccine is the one not given.</p> <div data-bbox="305 487 647 525"> </div> <p data-bbox="305 550 586 579">10:45 AM - 14 Sep 17 · ...</p>
31	<div data-bbox="300 619 402 720"></div> <div data-bbox="417 634 638 672"><b>Linda Brown</b></div> <div data-bbox="417 678 583 711">@lindabrown</div> <div data-bbox="898 625 963 680"></div> <div data-bbox="989 625 1128 680"></div> <p data-bbox="295 749 1088 909">More than 80 million doses of the <a href="#">#HPV</a> <a href="#">#vaccine</a> have been given in the US. The vaccine is very safe.</p> <div data-bbox="295 926 638 963"> </div> <p data-bbox="295 989 574 1018">10:45 AM - 14 Sep 17 · ...</p>
32	<div data-bbox="305 1050 409 1155"></div> <div data-bbox="423 1066 505 1104"><b>CDC</b></div> <div data-bbox="423 1110 561 1144">@CDCgov</div> <div data-bbox="906 1056 971 1110"></div> <div data-bbox="997 1056 1135 1110"></div> <p data-bbox="305 1182 1125 1287">Studies show <a href="#">#HPV</a> <a href="#">#vaccine</a> is not linked to autoimmune problems.</p> <div data-bbox="305 1304 647 1341"> </div> <p data-bbox="305 1367 586 1396">10:45 AM - 14 Sep 17 · ...</p>
33	<div data-bbox="300 1438 402 1543"></div> <div data-bbox="417 1455 651 1493"><b>Sarah Wilson</b></div> <div data-bbox="417 1499 599 1533">@sarahwilson</div> <div data-bbox="898 1446 963 1501"></div> <div data-bbox="989 1446 1128 1501"></div> <p data-bbox="295 1579 1118 1684">Studies show <a href="#">#HPV</a> <a href="#">#vaccine</a> reduces oral HPV that cause head &amp; neck cancers.</p> <div data-bbox="295 1701 638 1738"> </div> <p data-bbox="295 1764 574 1793">10:45 AM - 14 Sep 17 · ...</p>

34	<div data-bbox="305 178 409 279">  </div> <div data-bbox="418 191 800 268"> <b>American Cancer Soc</b>  @AmericanCancer </div> <div data-bbox="901 178 1156 237">  Follow </div> <p data-bbox="305 310 1138 415">#HPV #vaccine could prevent over 30,000 HPV –related cancers every year in the US.</p> <div data-bbox="305 430 649 468">     </div> <p data-bbox="305 493 581 525">10:45 AM - 14 Sep 17 - ...</p>
41	<div data-bbox="300 590 404 690">  </div> <div data-bbox="414 602 639 680"> <b>Linda Brown</b>  @lindabrown </div> <div data-bbox="893 590 1148 648">  Follow </div> <p data-bbox="297 722 1135 877">Physicians in the US have reported more than 31,000 adverse events after giving the #HPV #vaccine. Very unsafe vaccine.</p> <div data-bbox="297 892 641 930">     </div> <p data-bbox="297 955 573 987">10:45 AM - 14 Sep 17 - ...</p>
42	<div data-bbox="305 1052 409 1152">  </div> <div data-bbox="418 1064 852 1142"> <b>Voices Against Vaccines</b>  @Voices </div> <div data-bbox="901 1052 1156 1110">  Follow </div> <p data-bbox="302 1184 1138 1339">National Vaccine Injury Compensation Program awarded \$5,877,710 to 49 victims in claims against the #HPV #vaccine.</p> <div data-bbox="302 1354 649 1392">     </div> <p data-bbox="302 1417 578 1449">10:45 AM - 14 Sep 17 - ...</p>

43	<div data-bbox="302 176 402 277"></div> <div data-bbox="418 191 649 268"> <b>Sarah Wilson</b>  @sarahwilson </div> <div data-bbox="898 176 971 235"></div> <div data-bbox="987 176 1149 235"> </div> <p data-bbox="302 310 1114 457">#HPV #vaccine is not approved to protect against head &amp; neck cancers. No clinical data exist.</p> <div data-bbox="302 485 643 520">  ...  ...  ...  ... </div> <p data-bbox="302 548 574 575">10:45 AM - 14 Sep 17 · ...</p>
44	<div data-bbox="302 653 409 758"></div> <div data-bbox="425 667 873 745"> <b>Vaccine Freedom Alliance</b>  @VaccineAlliance </div> <div data-bbox="906 653 979 711"></div> <div data-bbox="995 653 1157 711"> </div> <p data-bbox="302 793 1117 951">#HPV #vaccine scientist: There is no data showing the vaccine remains effective beyond 5 years.</p> <div data-bbox="302 978 651 1014">  ...  ...  ...  ... </div> <p data-bbox="302 1041 583 1068">10:45 AM - 14 Sep 17 · ...</p>