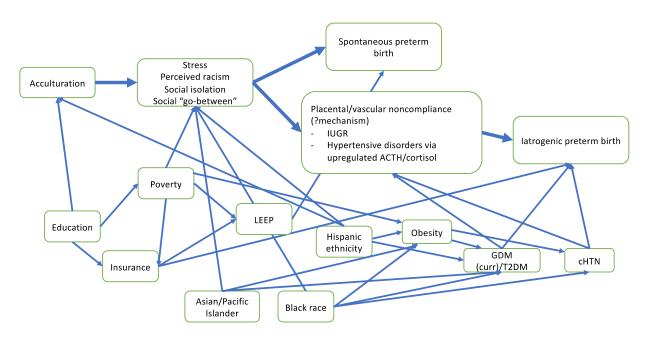
Appendix 1. Directed acyclic graph of proposed relationship between acculturation and adverse pregnancy outcomes.

Proposed (compressed) causal pathway: Acculturation and adverse pregnancy outcomes



Appendix 2. Demographics by Acculturation Status When Limited to Women With a Parent Born Outside of the United States^a

<u>Demographics</u>	More acculturated ^b	Less acculturated ^c	p value ^d	
	(n=1116)	(n=1238)		
Maternal Age		,	<u>, </u>	
13-21	287 (25.7)	199 (16.1)		
22-34	721 (64.6)	869 (70.2)	<0.001	
35-41	108 (9.7)	170 (13.7)		
Gravidity				
1	801 (71.8)	884 (71.4)	0.843	
2 or more	315 (28.2)	354 (28.6)	0.043	
Poverty				
>200% FPL	567 (68.3)	644 (67.6)		
100-200% FPL	118 (14.2)	143 (15.0)	0.894	
<100% FPL	145 (17.5)	166 (17.4)	7	
Race or ethnicity	•			
Non-Hispanic white	290 (26.0)	265 (21.4)		
Non-Hispanic black	65 (5.8)	64 (5.2)	0.004	
Hispanic	539 (48.3)	596 (48.1)	0.004	
Other	222 (19.9)	313 (25.3)		
Education				
Less than high school	90 (8.1)	98 (7.9)		
High school graduate	125 (11.2)	144 (11.7)		
Some college	285 (25.5)	227 (18.4)	-0.001	
Technical or Associate's	112 (10.0)	114 (9.2)	<0.001	
Completed College	271 (24.3)	293 (23.7)		
Advanced degree work	233 (20.9)	360 (29.1)		
Insurance				
Government-based	382 (34.4)	433 (35.1)		
Military or unspecified	15 (1.4)	36 (2.9)	0.064	
Commercial	539 (48.5)	572 (46.3)		
Personal or individual	176 (15.8)	194 (15.7)		
Pregestational diabetes	17 (1.6)	7 (0.6)	0.024	
Smokinge	33 (3.0)	13 (1.0)	0.001	
Chronic hypertension	22 (2.1)	15 (1.3)	0.137	
Obesity (Body Mass Index ≥ 30 kg per m²)	267 (23.9)	144 (11.6)	<0.01	

Abbreviations: FPL – Federal Poverty Level;

Premkumar A, Debbink MP, Silver RM, Haas DM, Simhan HN, Wing DA, et al. Association of acculturation with adverse pregnancy outcomes. Obstet Gynecol 2020;135.

The authors provided this information as a supplement to their article.

^a Data presented as n, % by column unless otherwise indicated. Not all columns add to total sample size due to missing values

- ^b Subjects born in the U.S. who reported proficiency in English
- $^{\rm c}$ Subjects born or not born in the U.S. who reported limited or poor proficiency in English or preferred study visits conducted in Spanish $^{\rm d}$ χ^2 or Fisher's exact tests

Appendix 3. Adverse Pregnancy Outcomes by Acculturation Status When Limited to Women With a Parent Born Outside of the United States^a

Adverse pregnancy outcomes	More acculturated ^b (n=1116)	Less acculturated ^c (n=1238)	p value ^d				
All preterm birth (PTB)							
Yes	90 (8.1)	77 (6.2)	0.000				
No	1026 (91.9)	1161 (93.8)	0.082				
Spontaneous PTB							
Yes	59 (5.3)	47 (3.8)	0.000				
No	1057 (94.7)	1191 (96.2)	0.082				
Indicated PTB							
Yes	31 (2.8)	30 (2.4)	0.500				
No	1085 (97.2)	1208 (97.6)	0.589				
Preeclampsia or eclampsia	7	,	•				
Yes	101 (9.0)	78 (6.3)	0.040				
No	1015 (91.0)	1160 (93.7)	0.012				
Preeclampsia with severe features or eclampsia							
Yes	52 (4.7)	36 (2.9)	0.025				
No	1064 (95.3)	1202 (97.1)	0.025				
Preeclampsia without severe features							
Yes	49 (4.4)	42 (3.4)	0.210				
No	1067 (95.6)	1196 (96.6)	0.210				
Gestational hypertension							
Yes	127 (11.6)	91 (7.4)	0.001				
No	967 (88.4)	1132 (92.6)					
Stillbirth							
Yes	8 (0.7)	5 (0.4)	0.406				
No	1108 (99.3)	1233 (99.6)	0.400				
Gestational diabetese							
Yes	48 (4.3)	82 (6.6)	0.014				
Noe	1068 (95.7)	1588 (93.4)					
Small for gestational age							
Yes	112 (10.0)	129 (10.4)	0.759				
No	1004 (90.0)	1109 (89.6)	0.759				
Large for gestational age							
Yes	79 (7.1)	87 (6.8)	0.819				
No	1037 (92.9)	1185 (93.2)					

Abbreviations: PTB = preterm birth

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- ^b Subjects born in the U.S. who reported proficiency in English
- ^c Subjects born or not born in the U.S. who reported limited or poor proficiency in English or preferred study visits conducted in Spanish
- ^d χ² or Fisher's exact tests
- ^e Excluding women with pre-gestational diabetes

Appendix 4. Association Between Acculturation and Adverse Pregnancy Outcomes when Limited to Women with a Parent Born Outside of the United States

Outcome	OR	95% CI	aORa	95% CI
All preterm birth (PTB)	1.32	0.96-1.81	1.58	1.06-2.35
Spontaneous PTB	1.41	0.96-2.09	1.61	0.99-2.63
Indicated PTB	1.15	0.69-1.91	1.40	0.73-2.69
Preeclampsia or eclampsia	1.47	1.09-2.01	1.49	1.02-2.16
Preeclampsia with severe features or eclampsia	1.63	1.05-2.51	1.64	0.96-2.78
Preeclampsia without severe features	1.30	0.85-1.99	1.33	0.80-2.22
Gestational hypertension ^b	1.63	1.23-2.17	1.65	1.19-2.28
Stillbirth	1.78	0.58-5.46	0.82	0.21-3.15
Gestational diabetes ^c	0.63	0.44-0.92	0.76	0.50-1.17
Small for gestational age	0.96	0.73-1.25	0.99	0.72-1.38
Large for gestational age	1.04	0.76-1.42	1.08	0.76-1.56

Abbreviations: PTB = preterm birth

^a Adjusting for age, gravidity, poverty, race/ethnicity, education, and insurance

^b Excluding women with chronic hypertension

^c Excluding women with pre-gestational diabetes