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ORIGINAL ARTICLE

Association between maternal and child mental health among US Latinos: variation by nativity, ethnic subgroup, and time in the USA

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Abstract

Few studies have examined the association between maternal and youth mental health among US Latinos, or its variation by nativity, country of origin, ethnic subgroup, and time in the mainland US. Using 2007–2014 Medical Expenditure Panel Survey data linking Latino youth ($N = 15,686$ aged 5–17 years) and their mothers, we estimated multivariate models of the relationship between probable maternal mental illness (a composite of measures) and youth mental health impairment (Columbia Impairment Scale). Children of mothers with probable mental illness were more than three times as likely to have impairment as children of mothers without mental illness ($p < 0.01$). In adjusted models, there was an 8.5-point (95% CI 5.1, 11.8) increased prevalence of child impairment associated with mother's probable mental illness among mainland US–born youth and mothers and a 6.0-point (95% CI 3.7, 8.3) increased prevalence among US-born youth of foreign/island-born mothers. There was no significant difference in the prevalence of youth impairment associated with maternal mental illness when both youth and mother were born outside of the mainland US. For the Puerto Rican subgroup, the association between maternal and youth mental health was greatest among island-born mothers and mainland US–born youth; for the Mexican subgroup, the link was strongest among US-born mothers and youth. While there were large point differences between those groups, the difference was not statistically significant. This study suggests a protective effect of island/foreign-born nativity on symptom association between Latino mothers and children. Considerations for future research and practice stemming from this finding are discussed.

Keywords Maternal mental health · Intergenerational mental health · Latino · Immigration

Introduction

The deleterious impact of maternal mental health problems on child health is well acknowledged (Goodman et al. 2011). The intergenerational transmission of mental health problems is complex, with many contributing factors, including genetic liability (Stein et al. 2014), parenting practices, and socioeconomic status (Pearson et al. 2013). For immigrant families,

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this association is further complicated by unique factors related to the process of immigration and migration (Fortuna et al. 2016). Given that Latinos[1] make up nearly a quarter of the under-18 US population, more than half of Latino children are born to immigrant parents (Fry and Passel 2009), and US immigration policy is currently in flux, a more nuanced understanding of how maternal mental health affects youth outcomes in this population has public health significance.

While several studies suggest that the prevalence of mental illness among adult and child Latinos is lower than that of non-Latino whites, and that rates of mental illness are lower among immigrant Latinos compared with the US-born Latino population, initially (i.e., "healthy immigrant paradox"), (Breslau et al. 2007; Alegría et al. 2008; Alegria et al. 2007; Kessler et al. 2012) these advantages appear to diminish with time in the USA (i.e., "acculturation hypothesis") (Cook et al. 2009). This deterioration over time is thought to be driven by exposure to discrimination, acculturative stress (Alegria et al. 2007), and to erosion of protective factors (e.g., religiosity, familism) (Cook et al. 2009). By contrast, the stress associated with immigration may decrease over time, with the development of coping skills and increased supports over time, leading to potential improvements in youth mental health (Smokowski et al. 2014; Suárez-Orozco et al. 2010).

Immigration experiences vary on a range of factors that may impact family mental health, including acculturation (Guarnaccia et al. 2007), age of arrival to the USA, levels of perceived discrimination in the USA (Cook et al. 2009), rates of political violence in and frequency of visits to the country of origin (Fortuna et al. 2008; Alcántara et al. 2015), and location of settlement (Cook et al. 2016). Further, data from recent studies suggest that while the immigrant paradox may hold for adult Latinos in aggregate, it does not hold for all ethnic subgroups[2] of Latinos (e.g., those of Puerto Rican origin) (Alegría et al. 2008).

Nationally representative studies assessing mental health across generations in Latino families are rare. A study using the National Survey of Children's Health found a stronger association between parent and child mental health among non-Latino whites as compared with other ethnic groups (Bennett et al. 2012), and suggested possible differences in the association of parent and child symptoms comparing immigrant with non-immigrant Latinos. However, that study did not include child nativity, ethnic subgroup, or time in the USA. A longitudinal study of the Latino immigrant family mental health in North Carolina and Arizona found that parental anxiety and parent-child conflict, but not parental depression, predicted the development of adolescent internalizing symptomatology (Smokowski et al. 2014). However, this study did not account for time in the USA, nativity, or ethnic subgroup.

To address these gaps, the present study examined the association between maternal mental health and youth mental health impairment in a nationally representative sample of Latinos. We assessed the extent to which the association of youth impairment and maternal mental health varied by the nativity of the mother and child. We also explored the extent to which intergenerational mental health associations varied by Latino ethnic subgroup and, among mothers not born in the mainland US, years lived in the USA.

We hypothesized that there would be a significant association between probable maternal mental illness and youth impairment. Further, we hypothesized that the prevalence of youth impairment would be highest for children of mainland US–born mothers, consistent with the immigrant paradox (Cook et al. 2009). We expected that the association between mothers' probable mental illness and youth impairment would vary by nativity, with the increased likelihood of youth impairment associated with probable maternal mental illness being lower among mainland US–born mothers, due to greater family integration into potentially protective societal supports (e.g., health care and education systems) (Schneider et al. 2006).

Materials and methods

Participants We analyzed data from the Household Component of the Medical Expenditure Panel Survey (MEPS), a nationally representative survey developed by the Agency for Healthcare Research and Quality collecting data about health care use and spending from non-institutionalized individuals and providers (Medical Expenditure Panel Survey: Household Component n.d.). Adult MEPS respondents reported on their own mental health symptoms; parent respondents reported on their children's mental health. We constructed the analytic sample by pooling eight annual cross-sections of MEPS data, 2007–2014. We included all Latino youth, aged 5–17, whose mothers lived in the same household. Youth were treated as the unit of analysis (i.e., one observation per child) by matching each child with his/her mother using family and parent identifier variables and then attaching the mother-level measures to the child-level record.

Measures The study outcome was parent-reported youth mental health impairment measured by the Columbia Impairment Scale (CIS). The CIS is a 13-item measure of child and adolescent psychological symptoms and interpersonal functioning across several domains. The parent-reported CIS correlates with clinician-rated impairment for a wide range of youth ages and has demonstrated good internal consistency, construct validity, and test-retest reliability in both English and Spanish in both children and adolescents (Bird et al. 1990).

[1] We use the term "Latino" in accordance with the terminology utilized by the Medical Expenditure Panel Survey (MEPS), from which the data for this study are drawn.

[2] The term "ethnic subgroup" refers to participants' country of origin or family's country of origin, in accordance with the MEPS.

We note that one prior study found that CIS scores increased more in adolescents with depression than in children with depression; however, in both children and adolescents, elevations in CIS scores were correlated with diagnoses of depression, anxiety, and ADHD (Olfson et al. 2015; Nagar et al. 2010; Bird et al. 1996). We used the parent-reported CIS because it has demonstrated higher validity than the child-report version.(Attell et al. 2018) We defined youth mental health impairment as a CIS score of 16 or higher (Olfson et al. 2015). Our sample included one CIS measure per child.

In our main analysis, we tested the association between probable maternal mental illness and youth mental health impairment, adjusting for relevant covariates. We identified probable maternal mental illness with three mental health screening measures included in the MEPS: the Kessler Index (K6) (Kessler et al. 2002), a psychological distress scale; the Patient Health Questionnaire (PHQ-2) (Kroenke et al. 2003), a widely used 2-question screener for depression; and self-reported overall mental health status (5-point Likert scale ranging from excellent to poor). Our sample included one of each of these measures per mother. We assigned probable maternal mental illness when the mother had any of the following: serious psychological distress (a score of 13 or higher on the K6); positive depression screening (a score of 3 or higher on the PHQ-2); or self-reported fair or poor overall mental health status (Cook et al. 2014). We used this composite measure of mental health in an attempt to capture a broader range of symptoms than a single measure. Prior studies have found the K6 to detect both mood and anxiety disorders in a range of populations (Carrà et al. 2011; Andersen et al. 2011). Fair or poor self-rated mental health has been associated with mental health service utilization (Ahmad et al. 2014).

Nativity subgroups were defined as follows: (a) mother and child both born in the mainland US, (b) mother born outside of the mainland US and child born in the mainland US, and (c) both mother and child born outside of the mainland US.[3] We did not include the less than 1% of children who were born outside of mainland and mainland US–born mothers ($N = 65$) or children whose mothers self-identified as non-Latino ($N = 1166$).

Models were adjusted for (1) maternal (ethnic subgroup, age, language, marital status, education, employment status, and overall health), (2) child (age, sex, and overall health), and (3) household characteristics (father present in household, family income, census region). The mother's language was measured as the language in which the mother completed the MEPS: English, Spanish, or both. The mother's ethnic subgroup was defined as Mexican, Puerto Rican, Cuban, or other Latino, based on the question, "Which group best describes your ethnic background (e.g. Mexican, Mexican-American/Chicano, Puerto Rican, Cuban/Cuban American, Dominican, Central or South American, Other)?" We distinguished Puerto Rican–origin participants as either mainland- or island-born.

Statistical analysis First, we examined how mother, youth, and household demographic characteristics varied by the mother's mental health status using bivariate statistical tests (e.g., chi-squared and *t* tests). Second, we used a series of multivariate logistic regression models to estimate the association between probable maternal mental illness and youth mental health impairment, adjusting for covariates and testing the moderating effects of maternal and child nativity.

We conducted additional exploratory analyses to examine if the association between maternal and youth mental health varied by maternal ethnic subgroup or the amount of time the mothers born outside of the mainland US had lived in the mainland US. First, we tested for the interaction between maternal ethnic subgroup and probable maternal mental illness on the likelihood of youth mental health impairment. Next, we explored ethnic subgroup analyses including mothers of Mexican and Puerto Rican origin (the Cuban subgroup was too small to perform a stratified analysis and the "Other Latino" was too heterogeneous). Finally, we explored the interaction between probable maternal mental illness and mothers' time in the USA on youths' likelihood of mental health impairment, among mothers born outside of the mainland US. The raw variable in MEPS for a time in the USA includes < 1 year, 1–4 years, 5–9 years, 10–14 years, and 15+ years. Due to small cell sizes, we recorded the variable to be dichotomous: 0–9 years and 10 or more years.

In all analyses, we applied sampling weight and variance estimation variables to account for the complex survey design of MEPS and to produce estimates representative of the US population of Latino youth between 2007 and 2014. To ease interpretation and to account for challenges presented by including interaction terms in logistic regression models (Williams 2012; Ai and Norton 2003; Dimick and Ryan 2014), we also computed predicted probabilities associated with the primary explanatory variables for each model. We used casewise deletion for missing values. We conducted all statistical analyses in Stata/SE 14.2 (StataCorp) on publicly available data not requiring IRB approval.

Results

Our final analytic sample was 15,686 Latino youth between 5 and 17 years old. 70.4% of the final sample self-identified as Mexican, 7.4% Puerto Rican, 1.8% Cuban, and 20.3% "other Latino." Nearly all (95.8%) mother-youth dyads were from the same ethnic subgroup. Thirty-three percent of the dyads were both mainland US–born, 56.1% consisted of a mother born outside the mainland US and a US-born child, and 10.9% were both born outside the mainland US. Fourteen percent of

[3] For the Puerto Rican ethnic subgroup, we specified whether mothers and youth were island- or mainland US-born.

Table 1 Sample characteristics by maternal mental health status, 2007–2014, $N = 15{,}686$

	Probable maternal mental illness[1]			
	No	Yes	Total	*p* value
Total (unweighted sample sizes)	13,301	2385	15,686	
Mother/child nativity (%)				
Mother and child born in the mainland US	32.4	36.5	33.0	0.10
Mother born outside of the mainland US, child born in the mainland US	56.6	52.8	56.1	
Mother and child born outside of the mainland US	11.0	10.7	10.9	
Maternal characteristics				
Age (years; *M*)	37.3	38.2	37.5	< 0.01**
18–24 years	1.5	2.3	1.6	0.038*
25–29 years	11.6	10.9	11.5	
30–39 years	51.9	45.8	51.0	
40–49 years	29.7	33.7	30.3	
50 + years	5.2	7.2	5.5	
Interview language (%)				
English	46.0	44.0	45.7	0.49
Spanish	45.7	46.4	45.8	
Both	8.4	9.6	8.6	
Marital status (%)				
Married	67.8	52.5	65.6	< 0.01**
Widowed, divorced, or separated	14.8	23.0	16.0	
Never married	17.4	24.5	18.4	
Education (%)				
Less than high school	40.3	55.3	42.4	< 0.01**
High school graduate	27.4	24.6	27.0	
Some college	20.7	15.0	19.9	
College graduate	11.7	5.1	10.8	
Unemployed (%)	41.3	54.8	43.2	< 0.01**
Overall self-rated health (%)				
Excellent	24.2	8.1	22.0	< 0.01**
Very good	29.6	17.0	27.8	
Good	33.2	34.9	33.4	
Fair or poor	13.1	40.0	16.8	
Ethnic subgroup (any nativity; %)				
Mexican	70.6	69.2	70.4	< 0.01**
Puerto Rican	7.0	13.0	7.9	
Cuban	1.8	1.5	1.8	
Other Hispanic	20.6	16.2	20.0	
Mother's time in the mainland US, among those born outside the mainland US (%) ($N = 10{,}995$)				
0–9 years	18.0	15.4	17.7	0.21
10 + years	82.0	84.6	82.4	
Child characteristics				
Mental health impairment[2] (%)	5.0	15.7	6.5	< 0.01**
Age (%)				
5–9 years	40.5	35.7	39.9	< 0.01**
10–12 years	23.5	22.5	23.4	
13–17 years	36.0	41.8	36.8	
Male (%)	50.1	52.0	50.4	0.26
Overall health status (%)				
Excellent	49.6	36.0	47.7	< 0.01**
Very good	29.1	27.0	28.8	
Good	18.5	29.1	20.0	
Fair or poor	2.8	7.9	3.5	
Ethnic subgroup (any nativity; %)				
Mexican/Mexican-American/Chicano	70.7	69.4	70.5	< 0.01**
Puerto Rican	6.5	12.8	7.4	
Cuban	1.9	1.3	1.8	
Other Hispanic origin	20.9	16.5	20.3	
Household characteristics				
Father present in the household (%)	73.5	58.9	71.4	< 0.01**
Census region (%)				
West	10.8	16.9	11.7	< 0.01**
Northwest	8.6	7.8	8.5	
Midwest	38.0	29.7	36.9	

Table 1 (continued)

	Probable maternal mental illness[1]			
	No	Yes	Total	*p* value
South	42.6	45.5	43.0	
Household income (%)				
Poor or near poor (< 125% FPL)	40.7	58.0	43.1	< 0.01**
Low income (125% to < 200% FPL)	22.9	22.4	22.9	
Middle or high income (200% FPL+)	36.4	19.6	34.1	

Analysis of MEPS 2007–2014 data. Percentages are survey-weighted

[1] Probable maternal mental illness—mother has positive score on PHQ for depression and/or 13+ score on K6 and/or reported overall mental health as "fair" or "poor"

[2] Child mental health impairment—indicated by score of 16+ on CIS

Significance Level *=$p < .05$; **=$p < 0.01$

mothers reported mental health symptoms and 6.5% of children had mental health impairment.

Table 1 presents bivariate analyses of maternal, youth, and household characteristics, for mothers with and without probable mental illness. 15.7% of Latino youth whose mothers had probable mental illness experienced mental health impairment compared with 5.0% of children whose mothers did not have probable mental illness ($p < 0.01$). Compared with mothers without probable mental illness, mothers with probable mental illness were disproportionally US-born, single, and unemployed. A higher proportion of mothers with probable mental illness identified as Puerto Rican compared with those without. Overall, children of mothers with probable mental illness had a 10.7-point greater prevalence of impairment compared with children of mothers with no mental illness (95% CI 8.7–12.7).

Table 2 displays the adjusted prevalence of youth mental health impairment among mothers with and without mental health problems, by nativity and ethnicity. Adjusting for all covariates, children of mothers with probable mental illness had a 6.6-point greater prevalence (126% increase) of impairment compared with children of mothers without mental illness (95% CI 5.0–8.2). Among *mainland US–born children of mainland US–born mothers*, children of mothers with probable mental illness had an 8.4-point (or 142%) greater prevalence of mental health impairment compared with children of mothers with no mental illness (95% CI 5.1–11.8). Among US-born children of *mothers born outside the mainland US*, children of mothers with probable mental illness had a 6.0-point (128%) greater prevalence of mental health impairment compared with children of mothers with no mental illness (95% CI 3.7, 8.3). By contrast, for dyads where *both* mother and youth were born outside the mainland US, there was no significant difference in youth impairment associated with probable maternal mental illness. The between-group contrasts were statistically significant.

In unadjusted analyses, the increase in prevalence associated with the mother's probable mental illness was approximately 10 percentage points higher for children of mothers of Puerto Rican compared with Mexican origin (95% CI 0.2–19.8, results not shown). In stratified adjusted analyses (Table 2), in dyads with mothers of Mexican origin, when mother and child were both born outside the mainland US, the association between maternal probable mental illness and youth impairment was attenuated. Among families of Puerto Rican origin, when both mother and child were born in the mainland US, there was a 10.5-point (104%) increase in the prevalence of child impairment associated with the mother's probable mental illness (95% CI 1.7, 19.3). When the mother was island-born and the child was mainland US–born, there was a 16.8 point (342%) increase in the prevalence of child impairment associated with mother's probable mental illness (95% CI 2.4, 31.3). When the mother and child were both island-born, there was no significant increase in the prevalence of impairment associated with the mother's probable mental illness. While there were large point differences between Mexican and Puerto Rican subgroups in the separate within-group difference-in-differences (DD) analyses, those between-group differences did not reach statistical significance (difference-in-difference-in-differences (D-D-D) sensitivity analyses confirmed this finding; results not shown).

When non-mainland US–born mothers' time in the USA was explored in an adjusted model, there was no significant difference in prevalence of impairment associated with mothers having spent more time in the USA (less than 10 years vs. 10 or more) nor did the prevalence associated with mothers' mental illness differ by time spent in the USA (Table 2).

Discussion and conclusions

We examined factors affecting the association between probable maternal mental illness and youth impairment in a nationally representative sample of Latinos. As expected, mothers with probable mental illness were more likely to have children with impairment. Consistent with the "immigrant paradox," mental health impairment was lower among both mothers and

Table 2 Prevalence (predicted probability) of child mental health impairment associated with mother's mental health status, mother-child nativity, ethnic subgroup, and number of years living in the mainland US

	Prevalence of child mental health impairment							
	Predicted probabilities (PP)				Contrasts			
	Mother's probable mental illness (MPMI)				Within-group differences		Differences-in-differences: MPMI*moderator[2]	
	No		Yes					
	%	95% CI	%	95% CI	Points	95% CI	PP	95% CI
Total, $N = 15{,}686$	5.3	4.7, 5.9	11.9	10.3, 13.5	6.6***	5.0, 8.2		
Nativity (overall), $N = 15{,}686$								
Both mainland US–born	5.9	4.7, 7.0	14.3	10.9, 17.7	8.4***	5.1, 11.8		
Mother born outside of the mainland US, mainland US–born child	4.7	3.9, 5.5	10.7	8.3, 13.1	6.0***	3.7, 8.3	− 2.5	− 6.8, 1.9
Both born outside of the mainland US	5.8	3.8, 7.7	8.9	5.0, 12.9	3.2	− 0.8, 7.1	− 5.3*	− 10.5, − 0.1
Mexican subgroup, $N = 11{,}413$								
Both mainland US–born	5.6	4.5, 6.7	13.7	9.6, 17.8	8.1***	4.1, 12.0		
Mother born outside of the mainland US, mainland US–born child	4.7	3.9, 5.5	10.7	7.9, 13.5	6.0***	3.4, 8.7	− 2.1	− 7.3, 3.1
Both born outside of the mainland US	4.4	2.8, 6.1	8.6	3.4, 13.8	4.1	− 0.8, 9.1	− 3.9	− 10.3, 2.5
Puerto Rican (PR) subgroup, $N = 1109$								
Both mainland-born	10.1	7.0, 13.3	20.6	12.3, 28.9	10.5*	1.7, 19.3		
Mother PR-, mainland-born child	4.9	0.8, 9.1	21.8	8.0, 35.6	16.8*	2.4, 31.3	6.3	− 7.1, 19.8
Both PR-born	17.5	3.0, 31.9	13.8	3.0, 24.6	− 3.7	− 21.2, 13.9	− 14.1	− 35.2, 6.9
Mother's years in the mainland US,[1] $N = 10{,}995$								
0–9 years	4.4	2.9, 5.9	8.8	4.8, 12.9	4.4*	0.1, 8.7		
10+ years	4.2	3.6, 4.9	9.7	7.6, 11.7	5.5***	3.4, 7.6	1.1	− 3.9, 6.0

Notes: unweighted sample size, $N = 15{,}686$

Percentages (predicted probabilities) and percentage point differences (i.e., contrasts) are computed with a survey-weighted logistic regression model, controlling for maternal, child, and household characteristics

[1] Only among mothers born outside of the mainland US

[2] Moderator refers to ethnic subgroup interacted with maternal mental health

*$p < 0.05$; **$p < 0.01$; ***$p < 0.001$

youth born outside of the mainland US. Moreover, the association between maternal mental illness and youth impairment was attenuated when mothers were born outside the mainland US. This finding was contrary to our expectation that foreign-born status and less time in the USA would be associated with greater child impairment in the presence of maternal illness.

One explanation for the apparent buffering by the foreign nativity of mental health *transmission* may be that traditionally protective Latino cultural values (e.g., familism, religiosity) thought to be more prominent in less-acculturated families may be *particularly* protective against *intergenerational* symptom transmission. Nativity may also be related to risk factors for youth mental health problems (e.g., frequency of adverse childhood experiences), independent of intergenerational transmission.(Loria and Caughy 2018) It is also possible that we are not detecting a true effect but rather capturing a differential item functioning by acculturation level(European et al. 2005) or differential thresholds for concern about youth behaviors (European et al. 2005). Further research on the impact of nativity and acculturation on responses to measures such as the CIS is warranted (Attell et al. 2018).

While our subgroup analyses did not find a statistically significant difference in the pattern of associations between the Puerto Rican and Mexican subgroup, the point differences between subgroups warrant further study given known differences in rates and patterns of mental illness in those of Puerto Rican origin compared with Latinos as a whole (Alegría et al. 2008). Posited mechanisms for these differences include earlier age of arrival, higher likelihood of settling in ethnically diverse neighborhoods, higher family cultural conflict (Guarnaccia et al. 2007; Alcántara et al. 2015), and higher expectations for improvement in social status (Alcántara et al. 2014) relative to other subgroups. More study is needed to examine mechanisms of risk transmission among families of Puerto Rican heritage.

Contrary to the "acculturation hypothesis," we did not detect differences in mental health transmission among youth of mothers born outside of the mainland US by time lived in the USA (Cook et al. 2009). However, we were not able to perform a more nuanced evaluation of the effect of time in the USA due to limited sample sizes of respondents in the USA for shorter amounts of time. More research is needed to assess the effect of time in the USA with greater precision.

We note several limitations: First, the self-reported measures used for both maternal and youth mental health in MEPS are dependent upon the respondent perception of impairment and willingness to discuss the subject in a survey setting. Prior studies suggest that less acculturated Latinos may be less likely to perceive a need for services even in the setting of significant impairment, and that Latino parents may have a higher threshold for assessing youth impairment (Olfson et al. 2015; Breslau et al. 2017; Roberts et al. 2005). Second, in using the parent-reported CIS as an outcome measure, it is important to note that maternal report of child functioning may be influenced by maternal mental health (Goodman et al. 2011); clinical and multi-informant measures would provide a more holistic assessment of both parent and child symptoms and functioning. Third, we were unable to determine the proportion of dyads who were not biologically related, which has implications for mechanisms of intergenerational transmission. However, based on known national estimates of family structure among Latinos, we expect that this proportion is relatively small (Family Structure: Indicators of Child and Youth Well-Being 2015). And last, this is a cross-sectional study that demonstrates an intergenerational association between mother and youth mental health, not a causal relationship.

Despite these limitations, our findings suggest directions for future research. Efforts are needed to elucidate immigrant family protective factors and strengthen these factors in the USA/mainland-born families. Greater understanding of the potential mechanisms for subgroup differences has implications for the development of preventive and tailored interventions, which may be particularly relevant in the current political climate and given the influx of families from Puerto Rico in the wake of climate catastrophes.

Future studies should explore other relevant factors, including discrimination, trauma, documentation status, family separation, and family cultural conflict, which have been found to play a role in the association between time in the USA and psychiatric disorder in adults (Cook et al. 2009), all of which may increase youth risk for depressive symptoms (Gudiño et al. 2011). This is particularly important in a time of uncertainty regarding US immigration policy, with studies already showing an increased risk for psychiatric disorders in youth in the setting of uncertainty about immigration status of youth and their parents (Cavazos-Rehg et al. 2007) and conversely, a decrease in youth symptoms when parents are protected from deportation (Hainmueller et al. 2017).

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Compliance with ethical standards

Conflict of interest The authors declare that they have no conflict of interest.

Ethical approval This article does not contain any studies with human participants performed by any of the authors. The analyses in the manuscript were performed on publicly available data (https://meps.ahrq.gov/mepsweb/data_stats/download_data_files.jsp); no IRB approval was required.

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