Trends in Cannabis and Cigarette Use Among Parents With Children at Home: 2002 to 2015

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abstract

BACKGROUND: In this study, we investigated trends in cannabis use among parents with children at home in the United States and estimated changes in prevalence of any cannabis use and daily cannabis use among parents who identified as cigarette smokers and nonsmokers with children in the home from 2002 to 2015.

METHODS: The National Survey on Drug Use and Health is an annual, nationally representative, cross-sectional study conducted in the United States. Using logistic regression models, associations between cigarette smoking and any past-month and daily past-month cannabis use among parents with children in the home from 2002 to 2015 were estimated. Moderation of these associations by demographics and trends over time was examined.

RESULTS: Past-month cannabis use among parents with children in the home increased from 4.9% in 2002 to 6.8% in 2015, whereas cigarette smoking declined from 27.6% to 20.2%. Cannabis use increased from 11.0% in 2002 to 17.4% in 2015 among cigarette-smoking parents and from 2.4% to 4.0% among non–cigarette-smoking parents (*P* value for trends <.0001). Cannabis use was nearly 4 times more common among cigarette smokers versus nonsmokers (17.4% vs 4.0%; adjusted odds ratio = 3.88 [3.16–4.75]), as was daily cannabis use (4.6% vs 0.8%; adjusted odds ratio = 3.70 [2.46–5.55]). The overall percentage of parents who used either cigarettes and/or cannabis decreased from 29.7% in 2002 to 23.5% in 2015.

CONCLUSIONS: Efforts to decrease secondhand smoke exposure via cigarette smoking cessation may be complicated by increases in cannabis use. Educating parents about secondhand cannabis smoke exposure should be integrated into public education programs on secondhand tobacco smoke exposure.

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WHAT'S KNOWN ON THIS SUBJECT: Tobacco control efforts have been successful in reducing the extent to which children are exposed to secondhand cigarette smoke in the home. Little is known about current trends in the use of cannabis among parents with children in the home.

WHAT THIS STUDY ADDS: Parental cannabis use is increasing in homes with children. Cannabis use is substantially higher among parents who use cigarettes. Exposure to secondhand cigarette smoke continues to decline, yet exposure to cannabis smoke among children appears to be an increasing concern.

ARTICLE

Exposure to the mixture of sidestream and exhaled mainstream smoke from cigarettes (secondhand tobacco smoke [STS]) is associated with a range of health risks in children.[1] Residential parental smoking is the primary source of child STS exposure.[2,3] The effects of child exposure to secondhand cannabis smoke (SCS) may be harmful as well.[4,5] For example, laboratory studies of the chemical composition of mainstream and sidestream smoke from marijuana cigarettes confirm the presence of known carcinogens and other chemicals linked to respiratory disease.[6] Detectable levels of marijuana metabolites have been found in children exposed to SCS,[7,8] and some toxic chemicals found in both SCS and STS have higher concentrations in SCS than in STS.[9] There are emerging data on adverse effects of child exposure to both tobacco and cannabis, but little is known about the prevalence of exposure to both and/or which populations might be at greatest risk.

Child exposure to residential STS has decreased over the past several decades with the declining smoking prevalence and increased awareness of the heightened vulnerability of children to STS risks.[10,11] As tobacco use declines, 2 potentially relevant SHS-exposure trends are emerging. First, cannabis use in the overall US population is increasing.[12,13] Second, this increase (especially in daily cannabis use) appears concentrated among cigarette smokers relative to nonsmokers.[14] Thus, despite declining STS exposure rates, the degree to which these declines are occurring among children living with cigarette smoking parents remains unclear given the disproportionately high prevalence of cannabis use among cigarette smokers in general. Moreover, an overall population increase in cannabis use and child SCS exposure may thwart the public health gains achieved in reducing

child exposure to STS. Relatedly, cigarette use and children's STS exposure is disproportionately common in the most vulnerable demographic groups (eg, African American, low income, and those with lower levels of formal education).[15] For instance, Homa et al[11] showed in a review that bioverified STS exposure is highest among low-income individuals, African Americans, and children under age 11. Therefore, it is possible that trends in the co-occurring use of cigarettes and cannabis are concentrated in specific populations. Understanding these patterns and trends can facilitate the targeting of vulnerable populations and intervention resources.

To fill these gaps, we first examined the prevalence of current cigarette smoking and cannabis use among parents with children living in the same home in the United States. Second, we investigated the relationship between cigarette smoking and current cannabis use and current daily cannabis use among parents overall, and by demographic subgroups. Third, we estimated the annual prevalence of current cannabis use and daily cannabis use among current cigarette smoking and nonsmoking parents living in homes with children from 2002 to 2015 and assessed trends over time.

METHODS

Data and Population

Data were drawn from the public-use data files from the National Survey on Drug Use and Health (NSDUH) from the years 2002 to 2015. NSDUH provided annual cross-sectional national data on the use of tobacco, other substances, and mental health in the United States, as described elsewhere. The weighted overall response rates for NSDUH during these years ranged from 55.2% (2015) to 71.9% (2002). The median

response rate was 65.9%. Analyses were restricted to adult respondents (aged ≥18 years) with children aged <18 years living in the home (N = 173 082). Of these respondents, 2.2% were excluded because they could not be classified per our definitions of current smokers or current nonsmokers (see below), resulting in a total study population of N = 169 259.

Measures

Current Cigarette Smoking

Respondents were categorized as current cigarette smokers if they reported the following: (1) smoking all or part of a cigarette in the past 30 days and (2) lifetime use of ≥100 cigarettes. Otherwise, respondents were classified as nonsmokers. Respondents (n = 3573) who reported cigarette smoking in the past 30 days but <100 cigarettes used in their lifetime or who reported smoking in the past but were missing information on use of cigarettes in the past 30 days (n = 250) were excluded from analyses.

Current cigarette smokers were categorized as daily smokers if they reported using cigarettes 30 out of the past 30 days and as nondaily smokers otherwise.

Current Cannabis Use

Respondents were classified as current cannabis users if they reported using marijuana or hashish at least 1 out of the past 30 days; current daily users were defined as those who reported using cannabis on 30 of the past 30 days.

Covariates

The following demographic covariates were incorporated to address potential confounding and to explore moderation of the association between current smoking and current cannabis use among parents with children in the home: respondent sex, age, highest level of education, current marital status,

TABLE 1 The Association of Current and Current Daily Cannabis Use With Current Smoking Among Adult Parents With Children Age <18 in the Household, NSDUH 2015

Current Smoking Status	Cannabis Use (Any)			Cannabis Use (Daily)		
	% (SE)	Crude OR (95% CI)	aOR[a] (95% CI)	% (SE)	Crude OR (95% CI)	aOR[a] (95% CI)
No	4.01 (0.26)	1.00 (ref)	1.00 (ref)	0.76 (0.08)	1.00 (ref)	1.00 (ref)
Yes, nondaily	16.15 (1.33)	4.62 (3.67–5.81)	3.69 (2.90–4.70)	3.12 (0.70)	4.19 (2.69–6.52)	2.68 (1.63–4.40)
Yes, daily	18.09 (1.20)	5.29 (4.39–6.37)	3.99 (3.19–5.00)	5.44 (0.72)	7.48 (5.41–10.36)	4.28 (2.71–6.76)
Yes, overall	17.42 (0.96)	5.05 (4.27–5.98)	3.88 (3.16–4.75)	4.64 (0.59)	6.32 (4.68–8.54)	3.70 (2.46–5.55)

CI, confidence interval; OR, odds ratio; ref, reference.

[a] Adjusted for sex, age (18–25, 26–34, 35–49, 50+), marital status (married, widowed, divorced or separated, never married), education (<high school, high school graduate, some college, college graduate), income (<$20K, $20–49 999, $50–74 999, ≥$75K), race and/or ethnicity (white, African American, Hispanic, others), and calendar year (categorical).

current household income, and race. Categorical measures were used for each covariate as shown in the footnote to Table 1.

Statistical Analysis

The annual prevalence of current cigarette smoking and current and daily cannabis use among adult parents with children in the home was calculated for each year from 2002 to 2015. Separate logistic regression models were fit for each by using a continuous term for calendar year to assess overall linear time trends in prevalence over the study period. Models were unadjusted and adjusted for demographic covariates. This adjustment was repeated for each combination of cigarette and cannabis use.

Logistic regression models were fit to determine if current cigarette smoking was associated with current or current daily cannabis use, unadjusted and adjusted for demographic covariates and calendar year (categorical). We used additional models to examine current cigarette smokers as daily versus nondaily. Moderation of the association between current cannabis use with current cigarette smoking was assessed by adding smoking × demographic covariate product terms to the model. Stratum-specific adjusted risk differences (aRDs) for cannabis use in current smokers versus nonsmokers were calculated by using the average marginal predictions from logistic regression

models. Comparisons between strata were performed by using the difference in difference *P* values.

The annual prevalence of current cigarette smoking, current cannabis use, and current daily cannabis use among adult parents with children in the home was calculated for each year from 2002 to 2015. Separate logistic regression models were fit for each by using a continuous term for calendar year to assess overall linear time trends in prevalence over the study period. Models were unadjusted and adjusted for demographic covariates. This process was repeated for each combination of cigarette smoking and cannabis use.

Finally, the annual prevalence of current any cannabis use and current daily cannabis use was calculated by current cigarette smoking status. Variation in time trends in cannabis use by cigarette smoking status was assessed by using logistic regression models with a continuous term for calendar year and year × smoking interaction, unadjusted and adjusted for covariates. The aRDs for cannabis use between 2002 and 2015 were calculated by current smoking status by using the average marginal predictions from the logistic regression models.

All analyses were conducted by using SAS-callable SUDAAN version 11.0.1 (RTI International, Research Triangle Park, NC) and incorporated survey weights to account for the NSDUH complex sampling design. All results,

other than raw counts, were adjusted for sampling weights.

RESULTS

Prevalence of Current Cigarette Use, Cannabis Use, and Daily Cannabis Use Over Time

From 2002 to 2015, there was a significant decreasing trend in the prevalence of current smoking from 27.6% in 2002 to 20.2% in 2015 (*P* < .0001; see Fig 1). In contrast, there were significant increasing trends in the prevalence of current cannabis use from 4.9% to 6.8% (*P* < .0001) and daily cannabis use from 0.7% to 1.6% (*P* < .0001). Overall, there was a decrease in the prevalence of either cigarette or cannabis use in homes with children from 29.7% in 2002 to 23.5% in 2015. All trends were statistically significant when unadjusted and when adjusted for demographic covariates.

Association Between Cannabis Use and Cigarette Smoking Status

Current Cannabis Use

In 2015, the adjusted odds ratio (aOR) for current cannabis use among current cigarette smokers versus nonsmokers was 3.88 (3.16–4.75). The corresponding aORs for current cannabis use among daily cigarette smokers and nondaily cigarette smokers versus nonsmokers were 3.99 (3.19–5.00) and 3.69 (2.90–4.70) (see Table 1). Consistent patterns were observed in the data from all years combined (see Supplemental Table 4).
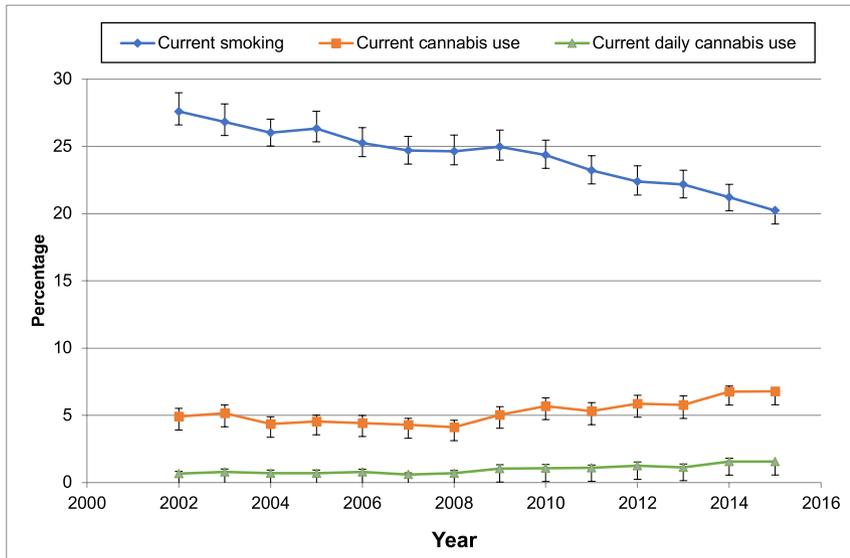
FIGURE 1
Prevalence of current smoking, current cannabis use, and current daily cannabis use among adult parents with children aged <18 years in the household, by year, NSDUH 2002–2015. Error bars represent 95% confidence intervals around prevalence estimates. All *P* values for trend, *P* < .0001 both unadjusted and adjusted for sex, age, marital status, education, income, and race and/or ethnicity.

Daily Cannabis Use

In 2015, the aOR for daily cannabis use in current smokers versus nonsmokers was 3.70 (2.46–5.55). Daily cannabis use was more common among nondaily (aOR = 2.68 [1.63–4.40]) and daily (aOR = 4.28 [2.71–6.76]) cigarette smokers relative to nonsmokers (Table 1). Similar associations were observed when data from all years were combined (see Supplemental Table 4).

The Prevalence of Cannabis Use and Association With Cigarette Smoking, Stratified by Demographic Characteristics

Between the years 2002 and 2015 combined, current cannabis use was significantly more common among cigarette smokers compared with nonsmokers with a child in the home (13.1% vs 2.6%, aRD = 7.9%; see Table 2). The stratum-specific aRD of current cannabis use between current cigarette smokers versus nonsmokers was statistically significant at the *P* < .0001

level within each demographic group.

The risk differences for current cannabis use associated with current cigarette smoking varied significantly across strata defined by sex, age, marital status, education, and race.

The increased current prevalence of cannabis use associated with smoking was greater among men (aRD = 10.2%) than women (aRD = 6.3%) and among the younger people with children in the home (aRD = 11.2%, 18–25-year-olds) compared with those 50 and older (aRD = 3.8%). In terms of education, the largest difference in risk for current cannabis use between current smokers and nonsmokers occurred among college graduates (aRD = 9.4%). In terms of race, the increase in risk of current cannabis use in current smokers versus nonsmokers was highest among African American respondents (aRD = 10.4%). Although the relationship between current cannabis use and smoking was

significant at each income stratum, the magnitude of the difference was similar for all levels of income.

Time Trends in the Prevalence of Current Cannabis Use and Daily Cannabis Use Among Adult Parents With Children Aged <18 in the Home, by Current Cigarette Smoking Status

In 2015, nearly 1 in 5 current cigarette smokers used cannabis in the past month (17.4%, up from 11.0% in 2002; see Table 3). Meanwhile, 4.0% of current nonsmokers used cannabis in the past month in 2015 versus 2.4% in 2002. Tests for trend revealed that the prevalence of current cannabis use increased both among current cigarette smokers (aOR = 1.04 [1.03–1.05]) and nonsmokers (aOR = 1.05 [1.04–1.07]) with children in the home from 2002 to 2015; there was no difference in the rate of this increase between the groups (*P* = .21). However, the aRD for current cannabis use in 2015 vs 2002 was higher among current smokers (aRD = 4.9%) than among current nonsmokers (aRD = 1.8%; *P* value for difference in differences < .0001).

The prevalence of daily cannabis use was higher in 2015 than in 2002 among current cigarette smokers (4.6% vs 1.7%) and among current nonsmokers (0.76% vs 0.28%; see Table 3). Tests for trend revealed that these increases were significant and did not differ by smoking status (see Table 3). However, the aRD for daily use in 2015 vs 2002 was higher among current smokers (aRD = 1.9%) than among current nonsmokers (aRD = 0.6%; *P* value for difference in differences < .0001). From 2002 to 2015, the percentage of parents with children under age 18 in the home who used neither cigarettes nor cannabis in the past month increased. The prevalence of smoking only decreased, whereas the prevalence of cannabis use alone or in combination with cigarette smoking increased (see Fig 2).

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TABLE 2 The Prevalence of Current Cannabis Use and aRD Associated With Current Smoking Among Adult Parents With Children in the Home, Stratified by Demographic Characteristics, NSDUH 2002–2015

	Unadjusted Prevalence of Current Cannabis Use		aRD[a] (%)	Difference in Differences P[b]
	Current Smokers ($N = 49\,880$)	Current Nonsmokers ($N = 119\,379$)		
	% (SE)	% (SE)		
Overall	13.1 (0.2)	2.6 (0.1)	7.9	—
Sex				
Male	15.5 (0.4)	3.5 (0.1)	10.2	Ref
Female	11.0 (0.3)	1.9 (0.1)	6.3	<.0001
Age				
18–25	20.4 (0.4)	5.2 (0.2)	11.2	<.0001
26–34	15.4 (0.5)	3.0 (0.1)	9.6	<.0001
35–49	10.5 (0.3)	2.3 (0.1)	7.2	<.0001
50+	7.0 (0.8)	2.2 (0.2)	3.8	Ref
Marital status				
Married	10.5 (0.3)	2.1 (0.1)	7.1	Ref
Widowed, divorced, or separated	12.5 (0.6)	3.1 (0.2)	9.0	.003
Never married	20.8 (0.5)	5.8 (0.2)	11.4	<.0001
Education				
Less than high school	14.7 (0.5)	2.6 (0.2)	8.1	.10
High school graduate	13.0 (0.4)	3.1 (0.1)	7.5	.02
Some college	12.5 (0.4)	3.0 (0.1)	7.8	.03
College graduate or more	11.5 (0.7)	2.0 (0.1)	9.4	Ref
Income				
≤$20 000	15.5 (0.4)	3.2 (0.2)	8.3	.15
$20–49 999	13.5 (0.4)	3.0 (0.1)	7.9	.41
$50–74 999	12.0 (0.6)	2.4 (0.2)	8.3	.26
≥$75 000	10.6 (0.5)	2.3 (0.1)	7.4	Ref
Race				
White	12.8 (0.3)	2.9 (0.1)	8.1	Ref
African American	18.9 (0.7)	3.8 (0.2)	10.4	.0004
Hispanic	9.7 (0.5)	1.6 (0.1)	5.6	<.0001
Other	12.6 (0.9)	1.2 (0.1)	8.8	.35

Ref, reference; —, not applicable.

[a] All models adjusted for other covariates in the table and year (categorical). All aRDs shown were different from 0 with $P < .0001$.

[b] Test for the difference in aRDs between strata.

DISCUSSION

Recent data suggest that children's exposure to SCS carries health risks similar to, or worse than, exposure to STS.[6] There is scant research on the effects of exposure to both cannabis and tobacco on children's health and development. However, recent studies suggest that children exposed to both SCS and STS may be at heightened risk for cognitive and emotional problems.[16,17] To understand the prevalence of joint exposure to SCS and STS, we estimated changes in the prevalence of cannabis use among current cigarette smokers and nonsmokers living in homes with children from 2002 to 2015, investigated the relationship between cigarette smoking and cannabis use among adults living in homes with children aged <18 in the United States, and identified high-risk groups. The results of this study support the public health gains in reducing overall child STS but raise other public health concerns about child exposure to SCS and especially high risk for combined exposures to SCS and STS in certain subpopulations.

Despite the declining prevalence of cigarette smoking in households with children over this period, an estimated 15.2 to 25.0 million children were living with a parent who was a current cigarette smoker in 2015.[18] Moreover, cannabis use increased among parents with children in the home from 2002 to 2015. This occurred among both cigarette smokers and nonsmokers. Although the net effect shows an overall decline in use of either cigarettes or cannabis in homes with children from 29.7% in 2002 to 23.5% in 2015, there was an increase in the percent of homes with both. Therefore, the increase in cannabis use appears to be compromising progress of tobacco control, especially for vulnerable groups. An estimated 5.3 to 8.0 million children in the United States were living with a parent who was a current cannabis user in 2015. In addition, the prevalence of cannabis use is nearly 4 times as high among cigarette smokers and is increasing rapidly in this group, suggesting that the potential for dual STS-SCS exposure may be even greater now than in the past due to children living with cigarette smokers.

Our findings that both any current cannabis use and daily cannabis use are more common among tobacco smokers compared with nonsmokers are consistent with previous studies.[19–21] This is a concern for 2 reasons. First, there is the potential for synergistic and/or at least additive effects of exposure to common toxins found in both tobacco and cannabis smoke, increasing risks associated with child exposure in the home. Second, the combination of unique toxins between tobacco and cannabis smoke exposure increases the number of potential risks and consequences for exposed children. Although there is still room for improving STS reduction efforts in homes, public health campaigns have had notable success in reducing

TABLE 3 Annual Prevalence of Current Cannabis Use and Current Daily Cannabis Use Among Adult Parents With Children Age <18 in the Home, by Current Smoking Status, NSDUH 2002–2015

	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	Test for Trend[a] Crude OR (95% CI)	Test for Trend[a] aOR[b] (95% CI)
Current cannabis use																
Current nonsmokers																
n	245	243	231	210	225	201	207	261	301	274	286	333	451	521	1.05 (1.04–1.06)	1.05 (1.04–1.07)
%	2.41	2.59	2.19	1.66	2.37	2.17	1.52	2.44	2.63	2.62	2.96	3.19	3.69	4.01	—	—
SE	0.24	0.26	0.29	0.18	0.27	0.25	0.15	0.28	0.24	0.29	0.33	0.27	0.23	0.26	—	—
Current smokers																
n	548	550	543	518	483	490	522	573	619	564	581	535	657	674	1.05 (1.04–1.06)	1.04 (1.03–1.05)
%	11.02	11.75	10.41	12.07	10.41	10.64	11.69	12.75	14.99	14.03	15.84	14.62	17.59	17.42	—	—
SE	0.76	0.77	0.78	0.70	0.69	0.65	0.92	0.71	0.82	0.83	1.06	0.94	0.75	0.96	—	—
Wald F test for difference between smoking categories (1 df)															P = .75	P = .21
Current daily cannabis use																
Current nonsmokers																
n	29	31	27	26	29	23	39	43	57	46	52	53	82	118	1.09 (1.05–1.13)	1.10 (1.06–1.13)
%	0.28	0.33	0.33	0.22	0.31	0.19	0.31	0.40	0.41	0.44	0.50	0.49	0.72	0.76	—	—
SE	0.07	0.10	0.11	0.08	0.08	0.05	0.07	0.11	0.09	0.10	0.10	0.10	0.11	0.08	—	—
Current smokers																
n	91	87	106	89	90	103	108	132	157	145	148	147	190	203	1.09 (1.07–1.11)	1.08 (1.06–1.13)
%	1.71	1.81	1.70	2.03	2.14	1.83	1.98	2.97	3.17	3.28	3.71	3.44	4.59	4.64	—	—
SE	0.27	0.28	0.36	0.37	0.36	0.28	0.29	0.42	0.42	0.35	0.54	0.41	0.45	0.59	—	—
Wald F test for difference between smoking categories (1 df)															P = .94	P = .63

CI, confidence interval; OR, odds ratio; —, not applicable.
[a] OR >1.0 indicates an increase in prevalence over the study period.
[b] Adjusted for sex, age (18–25, 26–34, 35–49, 50+), marital status (married, widowed, divorced or separated, never married), education (<high school, high school graduate, some college, college graduate), income (<$20K, $20–49 999, $50–74 999, ≥$75K), and race and/or ethnicity (white, African American, Hispanic, others).

smoking and the exposure of nonsmokers to STS in public and work places.[22] There also has been growing success of promoting smoke-free homes to protect children from exposure to STS.[23–25] Our results reveal a potential need to translate these efforts to address child exposure to SCS in the home. To the extent that cannabis use is an obstacle to smoking cessation,[26,27] going forward, protecting children from any type of secondhand smoke exposure may require assessment of both tobacco and cannabis smoking among parents and more intensive and innovative approaches to smoking cessation for those parents.

Several demographic differences were identified in the relationship between cannabis use and cigarette smoking among parents. The prevalence of cannabis use was highest among young parents who smoke cigarettes, with 1 in 5 ages 18 to 25 using cannabis versus 7% of those over 50, and relative to only 1 in 20 parents ages 18 to 25 who were non–cigarette smokers having used cannabis. This suggests that young children may be at particularly high risk for exposure because they spend more time in the home and in closer proximity to a parent than older children and teenagers who may be at school, out with friends, or working for much of the day. Cannabis use was most common in the lowest income group for both cigarette smokers and nonsmokers. This finding highlights another public health priority to address this disparity: ensuring that vulnerable groups have access and exposure to education and treatment designed to protect children from exposure.

We are unable with the current data to address completely the degree to which use among parents affects children's exposure in the home for at least 2 reasons: (1) we do not have information on location of smoking, whether it occurs in the house and/ or in the proximity of children; (2)
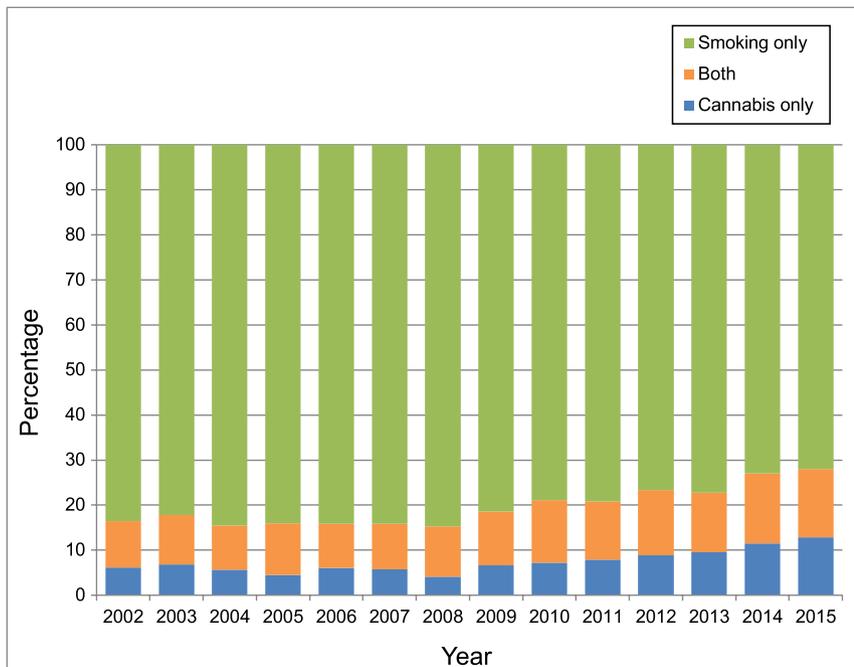
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FIGURE 2
Joint prevalence of current smoking and current cannabis use, among those using either substance, in parents with children aged <18 years in the household, by year, NSDUH 2002–2015.

we do not have information about the quantity of smoke (1 cannabis cigarette per day versus 2 packs of cigarettes), which is relevant because even daily cannabis use is likely to produce a different quantity than cigarettes. Unlike cigarettes, it remains illegal in most places to smoke cannabis outdoors and in a range of public areas. Therefore, there is reason to believe that cannabis use is even more likely to occur in the home than cigarette smoking given their differences in legal status. In addition, although we did not have information about the methods of cannabis use among parents, which would affect the level of possible SCS exposure, recent evidence indicates the vast majority of cannabis use occurs via smoking, whereas edible forms account for <10% of use among US adults.[28,29] Future researchers need to obtain specific estimates of the degree to which level of exposure is changing among children in the home. Researchers using biomarkers of cannabis and tobacco exposure in children of different ages and in households implementing varying degrees of protection (eg, household smoking bans) are needed to advance the field.

CONCLUSIONS

Despite the decline in cigarette use among parents with children in the home in the United States, we suggest that cannabis use is increasing among parents with children aged <18 years in the home, particularly among parents who also smoke cigarettes. Public health efforts that have shown success in decreasing exposure to STS in the home may be complicated by increased use of other smoked products, such as cannabis. Parents may benefit from education about protecting children from marijuana products, paraphernalia, waste, and smoke.

ABBREVIATIONS

aOR: adjusted odds ratio
aRD: adjusted risk difference
NSDUH: National Survey on Drug Use and Health
SCS: secondhand cannabis smoke
STS: secondhand tobacco smoke

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