

# Services for Adolescents With Psychiatric Disorders: 12-Month Data From the National Comorbidity Survey–Adolescent

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**Objective:** This study examined 12-month rates of service use for mental, emotional, and behavioral disorders among adolescents. **Methods:** Data were from the National Comorbidity Survey Adolescent Supplement (NCS-A), a survey of *DSM-IV* mental, emotional, and behavioral disorders and service use. **Results:** In the past 12 months, 45.0% of adolescents with psychiatric disorders received some form of service. The most likely were those with ADHD (73.8%), conduct disorder (73.4%), or oppositional defiant disorder (71.0%). Least likely were those with specific phobias (40.7%) and any anxiety disorder (41.4%). Among those with any disorder, services were more likely to be received in a school setting (23.6%) or in a specialty mental health setting (22.8%) than in a general medical setting (10.1%). Youths with any disorder also received services in juvenile justice settings (4.5%), complementary and alternative medicine (5.3%), and human services settings (7.9%). Although general medical providers treated a larger proportion of youths with mood disorders than with behavior disorders, they were more likely to treat youths with behavior disorders because of the larger number of the latter (11.5% of 1,465 versus 13.9% of 820). Black youths were significantly less likely than white youths to receive specialty mental health or general medical services for mental disorders. **Conclusions:** Findings from this analysis of NCS-A data confirm those of earlier, smaller studies, that only a minority of youths with psychiatric disorders receive treatment of any sort. Much of this treatment was provided in service settings in which few providers were likely to have specialist mental health training. (*Psychiatric Services* 65:359–366, 2014; doi: 10.1176/appi.ps.201100518)

Starting in the 1980s, studies of representative samples of U.S. children and adolescents demonstrated that whereas a large proportion had mental disorders, few received mental health care (1–25).

Most studies reported that only about one in three children with demonstrated need for mental health care received any. They also showed that the time between the first appearance of symptoms and first

service use could extend to several years (26).

The availability of services is highly sensitive to changes in both supply and demand. On the supply side, the availability of evidence-based treatments (27,28) increases the cost-effectiveness of care. On the demand side, federal policies such as the State Children's Health Insurance Program (SCHIP), which began in 1997, may increase demand (29), whereas the recent increase in the number of uninsured Americans may reduce demand. Thus studies measuring supply of and demand for mental health services need to have a fairly short time line to capture the current service environment.

Unlike adults, children may receive mental health services from many agencies whose primary responsibilities do not include mental health care. In addition to specialty mental health providers and primary care providers, who may or may not have mental health training, schools, juvenile justice agencies, and human services agencies are frequently mandated to provide such services. A recent analysis of data from the National Comorbidity Survey Adolescent Supplement (NCS-A) presented lifetime rates of disorder-specific service use for a representative national sample of adolescents (30). The study reported here used the same data set to derive information on how various service sectors provided services for various types of disorder within a 12-month

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period. The goal of the analysis was to increase comparability with earlier studies, where lifetime data are scarce (31–34).

## Methods

### *Sample and procedure*

The NCS-A was a nationally representative face-to-face survey of 10,148 adolescents ages 13–17 years conducted in the continental United States from 2001 to 2004 (35,36). The survey was administered by the professional interview staff of the Institute for Social Research at the University of Michigan. The background, measures, design, and clinical validity of the NCS-A are described elsewhere (35,36). Briefly, the NCS-A sample was based on a nationally representative household sample (N=904 adolescents) and a school sample (N=9,244 adolescents), with response rates of 86.8% and 82.6%, respectively. An adult who was knowledgeable about the adolescent's health, usually the mother (referred to here as a parent) was mailed a self-administered questionnaire asking for information on the adolescent's developmental background, mental and physical health, service use, and other family- and community-level factors. The conditional response rate of the parent self-administered questionnaire was 82.5% and 83.7%, respectively, in the two samples.

Sociodemographic variables assessed in the NCS-A included age, sex, race-ethnicity, parent marital status, parent education, urbanicity, region, and number of siblings. The 2000 U.S. Census definitions were used to code urbanicity by distinguishing large metropolitan areas from smaller metropolitan areas and rural areas. About half of the sample was male (51.3%), and the mean  $\pm$  SE age was  $15.9 \pm .1$  years. Non-Hispanic whites comprised 65.5% of the sample, non-Hispanic blacks 15.1%, and Hispanic adolescents 14.4%.

### *Measures*

**Diagnostic assessment.** Details of the diagnostic measures are presented elsewhere (37). Briefly, information contributing to criteria for *DSM-IV* disorders was collected by using the World Mental Health Composite International Diagnostic Interview, version

3.0, a fully structured lay-administered diagnostic interview that generates diagnoses according to the definitions and criteria of both the *ICD-10* (38) and *DSM-IV* (39) diagnostic systems. Information on the diagnostic criteria for the full range of *DSM-IV* mental disorders was collected for lifetime, 12-month, and 30-day periods. Clinical validity of the diagnostic interview was found to be adequate when using the Schedule for Affective Disorders and Schizophrenia for School-Age Children as the gold standard (40).

A parent-administered questionnaire collected information on the five adolescent disorders (attention-deficit hyperactivity disorder [ADHD], conduct disorder, oppositional defiant disorder, major depressive episode, and dysthymic disorder) for which parental information enhances diagnostic validity (40). Information obtained from the adolescent or parent was used to determine diagnostic classification of these disorders.

**Service use.** Immediately following each disorder interview module, respondents were asked whether they had received disorder-specific treatment in the past 12 months. In a separate interview module focusing on services, all respondents were asked whether they had received services for emotional or behavioral problems and the settings in which they had received these services. Reports of service use were classified into the following six categories of setting: mental health specialty setting, a visit to a psychiatrist or psychologist in a setting such as a mental health clinic, community mental health center, drug or alcohol abuse clinic, or emergency room or admission to a psychiatric hospital or other facility; general medical setting, a service provided by a general practitioner, family physician, pediatrician, or any other physician; human services setting, a service provided by a social worker, a counselor, a religious or spiritual advisor, or a mental health crisis hotline; complementary and alternative medicine (CAM) setting, attendance at a support group or a self-help group or a service provided by any other healer; juvenile justice setting, a service provided by a probation officer or juvenile correction officer; and school setting, a service provided

in a special school or a special class for children with emotional or behavioral problems or by a mental health nurse or school counselor or medication delivered at school.

Parents also reported on treatment for their child's emotional and behavior problems on the basis of questions similar to those administered to the adolescent sample. The analysis of service use in this study was based on endorsement of receipt of any service by the parent or child (sample size N=6,483). Levels of agreement between the reports of the parent and the adolescent were statistically significant for any mental health treatment ( $\kappa=.58$ , SE=.0001) and for any service use ( $\kappa=.54$ , SE=.0001).

### *Analytic procedures*

The data were weighted to adjust for differential probabilities of selection of respondents within school and household samples, differential nonresponse, and residual differences between the sample and the U.S. population on the cross-classification of sociodemographic variables (35,36). Rates of service use were calculated as proportions of youths with one or more *DSM-IV* psychiatric disorders.

Multivariate logistic regression models were performed to examine demographic correlates of service use. Correlates included age, sex, race-ethnicity, number of biological parents in the household where the youth lives, birth order, number of siblings, region, urban residency, parent education, and household poverty index ratio. In addition, models also adjusted for number of disorders (two disorders versus three or more) simultaneously. For the model of any service, the sample was restricted to youths with a *DSM-IV* disorder (N=2,757) to examine predictors of treatment receipt from any service sector. When each specific service sector was modeled, correlates of service use were calculated for all those who had a *DSM-IV* disorder and who also received services from one or more providers (N=1,725). The logistic regression coefficients could be interpreted as predictors of where treatment was obtained among youths who received some sort of treatment for emotional and behavior problems. The coefficients

were transformed to odds ratios (ORs) for ease of interpretation. Ninety-five percent confidence intervals (CIs) were estimated by using the Taylor series linearization method implemented in SUDAAN, version 10. Multivariate significance tests were calculated with Wald chi square tests based on coefficient variance-covariance matrices that were adjusted for design effects by using the Taylor series method. Statistical significance was based on two-sided design-based tests evaluated at the .05 level of significance.

## Results

Table 1 presents data for youths who received any services for psychiatric disorders in the past 12 months, by service setting and diagnosis. Of those with any diagnosis, 45.0% reported receiving any treatment from any source. The probability of treatment was associated with number of disorders: 68.7% of those with three or more disorders received treatment, compared with 44.0% of those with two disorders, 31.9% of those with one disorder, and 14.4% of those with no diagnosis.

Among individuals with mental disorders, the most likely to have received any treatment in the past 12 months were those with ADHD (73.8%), conduct disorder (73.4%), or oppositional defiant disorder (71.0%). Least likely to have received treatment were individuals with specific phobias (40.7%) and any anxiety disorder (41.4%).

### Sources of services

Adolescents with any psychiatric disorder were most likely to receive services in schools (23.6%) and specialty mental health settings (22.8%). Youths with ADHD were more likely to get treatment in schools (54.5%) than in specialty mental health settings (37.3%), whereas the opposite was true for those with eating disorders (schools, 20.9%; specialty settings, 43.0%) and drug use disorders (schools, 32.9%; specialty settings, 44.4%).

A smaller proportion of youths with recent psychiatric disorders received services from general medical providers (primary care pediatricians and other primary care providers)

(10.1%). As Table 1 shows, the largest proportions of youths receiving services for psychiatric disorders from general medical providers had major depressive disorder (17.6%) or ADHD (17.3%). However, taking into account the numbers of youths with various disorders, general medical providers were almost twice as likely to see adolescents with an impulse control disorder (11.5% of 1,465, or 165 youths) as adolescents with major depressive disorder (17.6% of 544, or 95 youths) or ADHD (17.3% of 408, or 71 youths).

### Correlates of service use

Table 2 presents the sociodemographic correlates of service receipt in one or more of the service sectors by youths with a diagnosis. Males with a diagnosis were more likely than females to have received any services in the past 12 months, but the difference was significant only for juvenile justice and school services. The only other factor associated with increased use of any services was living in a household with other than two biological parents. These youths were more likely to receive specialty mental health services and juvenile justice services.

Services that might entail cost to families, such as specialty mental health services, general medical services, and CAM, were more sensitive to sociodemographic markers. For example, parents with some college were more likely to seek specialty mental health care for their children. On the other hand, youths from poorer families were more likely than those in the wealthiest segment to receive services from the juvenile justice system. In specialty mental health settings, non-Hispanic black adolescents were less likely than white youths to receive care for psychiatric disorders. Receipt of care for psychiatric disorders in school settings was highest in the states in the South, while use of CAM services was significantly lower there.

## Discussion

This analysis of service use for psychiatric disorders by adolescents in the past 12 months in a nationally representative sample confirms earlier findings

that only a subset of youths with psychiatric disorders receives treatment of any sort. Moreover, much of this treatment was provided in service settings in which few providers were likely to have specialist mental health training. Fewer than half of youths with any disorder in the past 12 months received any services, and fewer than one in four received specialty mental health services. Even among those with three or more disorders, fewer than half had recently received any specialty mental health care.

This rate is slightly but not dramatically higher than that found ten years earlier in the Great Smoky Mountains Study, in which 21.6% of youths with serious and impairing mental illnesses received specialty mental health care (10). The 2001–2004 National Health and Nutrition Examination Study found a much higher rate of 12-month mental health service use (52.8%), but that study did not clarify which service sector was used (37).

The findings are consistent with those of earlier and more geographically constrained studies (6,7,10), suggesting that nothing much has changed in the decades since the first U.S. studies of service use for psychiatric disorders, despite the spread of evidence-based treatments and the increase in the number of youths eligible for public health insurance through SCHIP. For example, Burns and colleagues (10) found that 21.6% of a slightly younger sample (9–13) with serious diagnoses had received specialty mental health care in the past three months, and Offord and colleagues (41) reported that 18.1% of boys and 13.5% of girls in Canada with a psychiatric diagnosis had received care from specialty mental health services or social services in the past six months.

The findings reported here, which have a 12-month time frame, provide a more appropriate comparison with these studies than does our previous report on lifetime service use (30). There are two reasons for this. First, there are no comparable studies of lifetime service use in this age range. Second, the lifetime prevalence of mental health specialty service use for any psychiatric disorder was 46.5%

**Table 1**

Data on 12-month service use from the National Comorbidity Survey Adolescent Supplement among youths with a *DSM-IV* disorder, by diagnosis and service setting

Diagnostic variable	N	Mental health specialty		General medical		Human services		CAM <sup>a</sup>		Juvenile justice		School		Any	
		%	SE	%	SE	%	SE	%	SE	%	SE	%	SE	%	SE
Anxiety disorder															
Panic disorder	120	26.1	5.5	14.2	3.7	14.0	4.0	13.1	4.7	2.2	.7	28.7	6.6	49.1	7.2
Agoraphobia without panic	100	28.8	6.6	8.3	3.0	13.7	8.1	7.4	3.9	2.8	1.5	37.3	9.4	52.0	8.7
Specific phobia	1,000	20.0	2.9	9.2	1.6	8.7	1.5	3.9	1.0	2.3	.5	20.7	2.0	40.7	2.6
Social phobia	778	24.9	3.1	10.0	2.0	6.9	1.3	5.0	1.2	3.2	1.4	22.5	3.0	42.2	3.2
Generalized anxiety disorder	106	35.0	8.3	9.6	3.4	9.2	3.3	13.7	3.5	3.3	1.6	36.2	9.0	56.7	7.4
Separation anxiety disorder	92	27.0	8.0	12.6	4.7	12.0	4.8	13.6	5.0	4.2	2.3	21.1	7.9	47.3	7.8
Posttraumatic stress disorder	210	37.0	4.1	11.4	3.1	11.5	2.8	11.8	2.8	4.1	2.0	32.8	6.0	60.2	5.8
Any anxiety disorder	1,506	22.3	2.4	9.3	.8	8.0	1.0	5.0	.8	2.7	.6	20.9	1.8	41.4	1.9
Mood disorder															
Major depressive disorder or dysthymia	544	36.9	3.6	17.6	2.8	14.8	2.3	8.6	1.7	3.7	1.3	29.5	3.1	62.1	3.7
Bipolar I or II disorder	329	33.6	3.7	7.4	2.6	14.7	3.0	6.0	1.2	8.7	2.4	35.2	3.3	58.4	3.6
Any mood disorder	820	35.4	3.0	13.9	2.3	14.1	1.7	7.7	1.4	5.7	1.3	30.5	2.2	60.1	2.9
Impulse control disorder															
Attention-deficit hyperactivity disorder	408	37.3	3.6	17.3	3.7	11.7	2.3	6.5	1.4	9.1	2.5	54.5	3.9	73.8	3.2
Oppositional defiant disorder	519	42.6	3.1	15.0	2.3	11.5	2.0	8.4	1.7	12.6	2.8	42.4	2.7	71.0	2.8
Eating disorder (anorexia, bulimia, or binge eating)	191	43.0	8.1	14.8	5.4	13.3	5.3	5.2	1.7	3.2	1.2	20.9	4.7	58.7	6.4
Intermittent explosive disorder	691	24.1	2.5	8.5	1.9	10.5	1.8	5.3	1.2	4.3	1.1	29.8	2.8	47.6	2.9
Conduct disorder	305	45.9	4.0	14.9	3.2	14.3	2.8	11.4	2.0	20.3	4.8	44.0	3.5	73.4	5.9
Any impulse control disorder	1,465	28.6	2.3	11.5	1.1	10.4	1.1	6.0	.9	6.7	1.3	32.3	1.8	55.1	2.2
Substance use disorder															
Alcohol abuse or dependence	289	31.4	5.0	7.7	2.9	5.9	1.5	13.8	3.3	15.1	4.1	31.3	3.7	52.8	5.4
Drug abuse or dependence	330	44.4	6.1	11.7	2.7	8.2	2.7	11.8	2.7	12.6	2.4	32.9	4.9	64.6	4.9
Alcohol or drug abuse or dependence	496	36.6	4.8	9.7	2.0	7.1	1.9	11.1	2.2	12.0	2.1	29.4	3.5	56.9	4.3
Composite															
Any disorder	2,757	22.8	1.5	10.1	.8	7.9	.8	5.3	.6	4.5	.8	23.6	1.4	45.0	1.5
No disorder	3,726	6.2	.7	1.7	.2	2.0	.4	1.9	.3	1.2	.4	6.3	.7	14.4	1.0
1 disorder	1,332	12.5	1.4	7.1	.9	4.8	1.1	3.4	.7	2.4	.8	14.0	1.4	31.9	1.9
2 disorders	672	20.6	2.1	11.2	2.1	7.0	1.2	4.3	.9	2.3	.6	22.9	3.5	44.0	3.2
≥3 disorders	753	42.7	3.4	14.5	2.2	14.2	2.2	9.6	1.7	10.2	2.1	40.9	2.5	68.7	2.9
Any anxiety or mood disorder	1,873	23.4	2.0	10.1	1.0	8.8	1.0	5.1	.7	3.4	.7	22.8	1.7	44.3	1.8
Any impulse control or substance use disorder	1,699	28.3	2.2	11.3	1.1	9.6	1.1	6.7	.9	7.0	1.3	30.4	1.8	53.6	2.2
Any anxiety, mood, impulse control, or substance use disorder	815	35.0	3.5	12.5	1.5	13.3	1.9	7.5	1.4	7.1	1.5	35.4	3.0	60.6	3.0
Total sample	6,483	13.5	.9	5.4	.4	4.6	.3	3.4	.3	2.6	.5	13.8	.8	27.8	1.1

<sup>a</sup> Complementary and alternative medicine

(30); comparison with the rate of 22.8% reported here suggests a considerable degree of forgetting or under-reporting in the previous study.

We noted some interesting distinctions among race, income, and parent education as correlates of service use. Youths with a disorder from white, more educated families were more likely to find their way into specialty mental health or CAM services, whereas poverty was associated with service receipt from schools and the juvenile justice system. Living in a family with

other than two biological parents, on the other hand, was associated with both juvenile justice and specialty mental health service use.

Among all adolescents with a psychiatric disorder, general medical practitioners saw about one in ten. General medical practitioners may well be competent to care for youths with some psychiatric disorders for which there are evidence-based treatments. However, more than half the youths in the study who had a diagnosis had two or even three disorders, and it is

disturbing that so many of these youths with complex conditions may lack access to specialty mental health care.

In the National Comorbidity Study–Replication, which examined data from a representative sample of persons age 18 and older, “the proportion of cases in treatment ranged from a high for dysthymia to a low for intermittent explosive disorder” (42). In contrast, in the study reported here the proportion of adolescents in treatment ranged from a high for ADHD



**Table 2**Demographic correlates of service receipt for a *DSM-IV* disorder among 1,725 youths in the National Comorbidity Survey Adolescent Supplement, by service setting<sup>a</sup>

Variable	Mental health specialty		General medical		Human services		CAM <sup>b</sup>		Juvenile justice		School		Any	
	AOR	95% CI	AOR	95% CI	AOR	95% CI	AOR	95% CI	AOR	95% CI	AOR	95% CI	AOR	95% CI
Female (reference: male)	1.42	.95–2.11	.92	.50–1.67	1.88*	1.09–3.24	1.16	.68–1.96	.39***	.24–.66	.49**	.32–.74	.73*	.57–.94
Race-ethnicity (reference: non-Hispanic white)														
Hispanic	1.04	.52–2.08	.81	.41–1.60	.66	.23–1.91	.43	.16–1.18	1.14	.49–2.61	.51	.25–1.03	.75	.51–1.12
Non-Hispanic black	.39**	.22–.70	.64	.31–1.31	1.39	.75–2.59	.36*	.17–.74	.67	.25–1.84	.95	.51–1.75	.63*	.43–.93
Other	.40**	.20–.79	1.55	.70–3.45	.51	.17–1.48	.50	.18–1.33	.69	.21–2.27	.88	.36–2.20	1.17	.49–2.78
Region (reference: West)														
Northeast	1.2	.62–2.33	.59	.30–1.15	.66	.29–1.53	1.38	.66–2.91	.98	.28–3.39	1.42	.74–2.76	1.01	.67–1.53
Midwest	1.12	.68–1.84	.65	.37–1.12	.89	.51–1.53	.78	.45–1.37	2.32	.88–6.13	1.34	.71–2.53	.86	.56–1.31
South	.74	.38–1.43	.57	.30–1.07	.90	.42–1.94	.40*	.19–.82	1.30	.45–3.78	2.68**	1.47–4.87	.85	.53–1.34
Urbanicity (reference: rural)														
Metro	1.08	.64–1.81	.85	.50–1.43	1.52	.73–3.19	1.51	.52–4.35	.43	.16–1.17	2.50***	1.54–4.08	1.32	.81–2.14
Other	1.48	.89–2.46	.79	.45–1.40	1.03	.58–1.81	1.57	.52–4.73	.91	.35–2.32	1.41	.82–2.45	1.4	.90–2.16
Parent education (reference: ≥4 years of college)														
Less than high school	.44***	.24–.82	.91	.33–2.52	2.07	.91–4.70	.40*	.17–.93	1.57	.78–3.16	.74	.42–1.28	.95	.63–1.45
High school	.44***	.27–.71	1.05	.52–2.11	1.14	.65–1.97	.48*	.25–.90	.87	.33–2.29	.95	.57–1.57	.88	.63–1.23
Some college	.50***	.32–.80	1.22	.57–2.60	1.04	.59–1.85	.48*	.24–.95	1.13	.53–2.38	1.01	.66–1.54	1.02	.72–1.43
Lives with biological parents (reference: 2 biological parents)														
None	2.27**	1.18–4.38	.80	.36–1.79	.63	.27–1.49	.66	.18–2.47	3.62**	1.61–8.14	.87	.50–1.50	2.77***	1.88–4.08
1 biological parent	1.61**	1.07–2.43	.83	.52–1.32	.88	.50–1.56	.85	.44–1.65	1.28	.86–1.92	1.14	.81–1.61	1.76***	1.28–2.43
Birth order (reference: oldest)														
Youngest	1.12	.67–1.87	.57*	.34–.96	.92	.47–1.79	.80	.33–1.96	1.26	.51–3.09	1.04	.68–1.59	.97	.61–1.51
Middle	.84	.47–1.50	.48*	.26–.90	1.06	.60–1.89	1.80	.90–3.59	1.16	.57–2.38	1.17	.79–1.72	.93	.63–1.37
Poverty index ratio (reference: >6) <sup>c</sup>														
≤1.5 (poor)	1.3	.76–2.22	.68	.28–1.66	.55	.27–1.14	.63	.24–1.64	3.51*	1.28–9.61	1.07	.59–1.96	.78	.47–1.27
≤3	.96	.56–1.66	1.40	.71–2.76	.88	.38–2.05	.97	.44–2.13	1.00	.39–2.54	1.76*	1.06–2.91	.96	.67–1.37
≤6	1.04	.59–1.84	1.10	.58–2.10	1.08	.60–1.93	.75	.42–1.35	1.95	.99–3.84	.98	.54–1.79	.99	.67–1.45
Age	.98	.86–1.12	1.00	.84–1.19	1.08	.88–1.32	1.02	.85–1.22	1.40***	1.21–1.61	.99	.87–1.13	.95	.87–1.03
N of siblings	1.03	.96–1.10	1.08	.98–1.18	1.09	.98–1.21	.95	.71–1.27	1.00	.88–1.15	1.02	.95–1.08	1.00	.94–1.06

<sup>a</sup> Analyses were adjusted for all demographic variables in the table and number of disorders.<sup>b</sup> Complementary and alternative medicine<sup>c</sup> Ratio of family income to the family's poverty threshold level based on family size\**p*<.05, \*\**p*<.01, \*\*\**p*<.001

and conduct disorders to a low for specific phobia. It appears that young people are more likely to have treatment imposed upon them by parents and others in authority for “externalizing,” trouble-making disorders, whereas adults are most likely to seek treatment themselves for “internalizing” conditions such as depression. This underlines the importance, when evaluating patterns of health care utilization, of considering not just available treatments but also how individuals get into care (43).

Another difference between adults and adolescents is that 85.5% of adults in treatment were seen in the health care sector—most in general medical settings (52.0% of those in treatment) (42). In contrast, among the 45.0% of adolescents with any disorder who received any care in this study, 10.1% obtained care in the general medical sector, compared with 23.6% in schools. Many of the persons listed by participants as providing help with adolescents’ emotional or behavioral problems were identified as pediatricians, school counselors, or probation officers. It is difficult to avoid the conclusion that 20 years after the early studies (1–25), many adolescents with disorders amenable to psychiatric treatments still do not have access to specialist care.

This study also identified socio-demographic correlates of service use, among youths with a *DSM-IV* disorder (Table 2). Males and youths closer to the poverty line were more likely to get treatment from juvenile justice or school providers. White youths and those with the most educated parents were more likely to receive either services in mental health specialty settings or CAM services. The fact that no significant differences were found in utilization of specialty mental health and general medical services as a function of income suggests that, as found in other studies, private health insurance gives little benefit when it comes to children’s access to needed mental health care; only public insurance significantly increases access (13,44,45).

Although this study had by far the most representative and largest sample of adolescents, comparisons with previous reports are difficult because of the restricted age range of the

NCS-A sample (13–17). The overall prevalence of disorders in the past 12 months in the NCS-A (25.5%) is just within the interquartile range of the studies reported in a recent review (14.8%–25.5%) (26). The other recent, nationally representative study, the National Health and Nutrition Examination Survey of 2001–2004, which used a slightly more limited range of diagnoses, found lower rates of reported service use for each psychiatric disorder (37). However, that survey asked the following question: “In the past year, have you been to see someone at a hospital or a clinic or at their office [for specific symptoms of disorders]?” This question implicitly excludes systems, such as CAM, juvenile justice, and human services, that provide a large proportion of adolescent mental health care.

It is possible that some of the participants had received services in the year before the study period but that the treatment had not resolved the problem; alternatively, many of those with a disorder may not have yet found their way to a service provider (26). However, other analyses of the same data set found that lifetime use of services, even among adolescents with severe disorders, was less than 50% (30).

As noted, it is difficult to interpret access to care in service sectors rationed by health insurance without information about insurance status, including SCHIP, which this study lacked. The NCS-A contains extensive measures of intensity and appropriateness of treatment that will be examined in other analyses. This was a cross-sectional study, and it was not possible to track adolescents’ service use over time or to test whether some services served as “gateways” to others (22).

## Conclusions

Despite efforts such as SCHIP to increase access to needed care, more than half of adolescents with a psychiatric disorder in the past 12 months did not receive any mental health care from any source within that time. Youths from racial-ethnic minority groups were significantly less likely than white youths to find their way to

specialty mental health and general medical care providers. One of the encouraging changes in the past decade has been the appearance of evidence-based treatments, both pharmacological and behavioral, for a range of child and adolescent mental disorders. Provision of these treatments need to be supervised by trained professionals. However, the number of child psychiatrists has scarcely increased in recent years, and their geographic distribution is inversely proportional to the percentage of children in a given community living in poverty (46). This study, with its large and representative sample, only serves to confirm the seriousness of the problems that need to be solved in order for young people to have access to needed mental health care.

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