Objective: To examine rates and predictors of receiving a psychosocial service before initiating antipsychotic treatment among young people in the Medicaid program.

Method: A retrospective new-user cohort study of 8 state Medicaid programs focused on children and adolescents 0 to 20 years, initiating antipsychotic treatment ($N = 24,372$). The proportion receiving a psychosocial service in the 3 months before initiating antipsychotic treatment was calculated and stratified by socio-demographic and diagnostic characteristics arranged in 9 hierarchical groups, as follows: developmental, psychotic/bipolar, disruptive, attention-deficit/hyperactivity, obsessive-compulsive, stress, major depressive, anxiety, and other disorders.

Results: Less than one-half of youth received a psychosocial service before initiating antipsychotic treatment (48.8%). Compared to younger adolescents (12–17 years) initiating antipsychotic treatment (51.5%), corresponding younger children (0–5 years; 39.2%) and older adolescents (18–20 years; 40.1%), but not older children (6–11 years; 51.5%), were significantly less likely to have received a psychosocial service. In relation to youth diagnosed with psychotic or bipolar disorder (52.7%), those diagnosed with attention-deficit/hyperactivity disorder (43.3%), developmental (41.4%), depressive (46.5%), or anxiety (35.6%) disorder were significantly less likely to have received a psychosocial service during the 3 months before antipsychotic initiation. By contrast, youth diagnosed with stress disorders (61.2%) were significantly more likely than those diagnosed with psychotic or bipolar disorders (52.7%) to have received a psychosocial service before starting an antipsychotic.

Conclusion: A majority of Medicaid-insured youth initiating antipsychotic treatment have not received a psychosocial service in the preceding 3 months. This service pattern highlights a critical gap in access to psychosocial services.

Key words: psychotherapy, access to care, antipsychotic treatment, prescribing practices, children

studies of children and adolescents reported moderate reductions in teacher-reported aggression and improved social function with stronger effects associated with behavior therapy than with family therapy, although the literature is better developed for children than for adolescents. In children less than 8 years of age, a recent meta-analysis of 36 controlled trials further demonstrated large and sustained beneficial effects of parent–child interaction therapy, a positive parenting program, and other psychosocial treatments on disruptive behavior problems, with especially strong effects on externalizing problems and oppositionality.

Even in children with autism, a meta-analysis of 34 studies supports the effectiveness of early intensive behavioral interventions to improve adaptive and to reduce maladaptive behaviors.

The American Academy of Child and Adolescent Psychiatry (AACAP) Practice Parameter for the Use of Atypical Antipsychotic Medications in Children and Adolescents recommends that with the important exception of US Food and Drug Administration (FDA)–indicated conditions, clinicians should consider psychosocial or other pharmacological interventions with established safety and efficacy profiles before initiating an antipsychotic. There are few data available on the overall extent to which youth receive psychosocial interventions before starting an antipsychotic medication. Prior research in this area has been limited to characterizing the proportion of young people receiving antipsychotics who also receive psychosocial treatments rather than the percentage who receive a psychosocial intervention before starting an antipsychotic medication. In a study of a mid–Atlantic state Medicaid–managed care plan, for example, 68% of youth 6 to 17 years of age who were starting treatment with an antipsychotic in 2006 to 2009 received combined medication management and psychotherapy. Among very young privately insured children receiving an antipsychotic, the proportion receiving any psychotherapy decreased from 50% in 1999 to 2001 to 41.4% in 2007. This trend is consistent with a broader trend in US mental health service provision toward a declining percentage of treated individuals receiving psychotherapy, either alone or in combination with a psychotropic medication.

We assess patterns in access to psychosocial interventions before initiating treatment with an antipsychotic for children 0 to 20 years of age in 8 state Medicaid programs. Given concerns over access to psychosocial services, particularly for children and adolescents receiving antipsychotics who have ADHD or disruptive behavior disorders, we examine access to psychosocial services before antipsychotic initiation, stratified by patient characteristics and clinical diagnoses with and without FDA indications for antipsychotic use.

METHOD

Study Design and Data Source

This was a retrospective cohort study using 2008 Medicaid Analytic eXtract (MAX) claims and managed care encounter data from 8 states (GA, IN, KS, KY, MI, MO, NM, and RI). States were selected based on their Medicaid data quality, including completeness of managed care enrollees in states using managed care. The study was approved or deemed exempt from review by the institutional review boards of New York State Psychiatric Institute, Rutgers University, and the National Committee for Quality Assurance.

Study Population

Medicaid-enrolled children and adolescents, 0 to 20 years of age, with a new start of an antipsychotic, were included in the study. A new start was defined as the first antipsychotic prescription in 2008 preceded by 120 days without any antipsychotic (see Table S1, available online, for antipsychotics). Continuous enrollment criterion was 120 days before to 30 days after antipsychotic initiation. Medicare/Medicaid dually eligible youth were excluded. The unduplicated number of young persons meeting eligibility criteria was 24,372.

Definitions and Measures

Young people were grouped into 4 age categories: younger children (0–5 years), older children (6–12 years), younger adolescents (13–17 years), and older adolescents (18–20 years). Race/ethnicity categories were white non-Hispanic, African American non-Hispanic, Hispanic, and other. Managed care status was categorized as any versus no managed care. County of residence was categorized as metropolitan, non-metropolitan urban, and rural, by merging MAX county of residence with the Area Resource File Rural-Urban Continuum Code (2003). Eligibility categories were foster care, income based, Supplemental Security Income, and other. Behavioral health hospital use was defined as any hospitalization with a behavioral health diagnosis during 2008.

Young people were assigned to 1 of 16 hierarchical diagnoses based on an examination of all diagnoses associated with any claim or encounter in 2008 (see Table S2, available online). The hierarchical ordering is based on FDA indications and data on antipsychotic prescribing practices for young people to identify the diagnosis most likely to be the target for the antipsychotic treatment. These 16 diagnostic groups (indicated in parentheses) were subsequently aggregated into 9 diagnostic categories, as follows: developmental and tic disorders (#1–2); psychotic or bipolar disorders (#3–5); disruptive behavior disorders (#6–8); ADHD (#9); stress disorders (posttraumatic stress disorder [PTSD] #10, and adjustment disorder #14); obsessive-compulsive disorder (OCD, #11); major depressive disorder (MDD, #12); anxiety disorder (#13); and substance use disorder or other mental health disorders (#15–16).

An outpatient psychosocial service prior to a new start of an antipsychotic was the outcome measure. Youth with 1 or more psychosocial services within 90 days before starting an antipsychotic medication were identified using Current Procedural Terminology (CPT) codes, including individual, group, and family psychotherapy, intensive outpatient, and other psychosocial interventions (see Table S3, available online, for CPT codes used). We selected 90 days before antipsychotic initiation based in part on measure testing; extending the window to 120 days identified only 1.3% more additional children with psychosocial services.

Data Analysis

Analyses were performed using SAS, version 9.2 (SAS Institute, Cary, NC). Descriptive statistics were calculated for the cohort of young people with a new start of an antipsychotic. Prevalence of a psychosocial visit before a new start of an antipsychotic was calculated for children with 1 or more mental health diagnoses for each of the 16 diagnostic groups, 9 diagnostic categories, and all other covariates examined. Exact (Clopper–Pearson) confidence