Children's Healthcare of Atlanta Community Health Needs Assessment and Implementation Plan

Egleston hospital
Scottish Rite hospital

December 2022

Children's℠ Healthcare of Atlanta

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A letter from the chairman to the community

Children's Healthcare of Atlanta System Board of Trustees

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Dear Friends,

Every three years, Children's Healthcare of Atlanta conducts a Community Health Needs Assessment (CHNA) to get a better understanding of the most pressing health needs across metro Atlanta—and throughout the state of Georgia. This, however, is the first CHNA to be conducted during a years-long pandemic with long-lasting effects on the community. From experiencing illness or devastating loss to falling behind in school, Georgia's children need more help than ever before.

During these unprecedented times, Children's is even more committed to our mission to make kids better today and healthier tomorrow. With input from a wide variety of leaders throughout Georgia, Children's has identified and prioritized pediatric community health needs to help advance the health and wellness of children and adolescents within our state.

The Children's Board of Trustees has adopted the 2023 to 2025 Community Health Needs Implementation Plans for Egleston and Scottish Rite hospitals, and the board is committed to expanding and leveraging existing programs, services and resources. Children's will also work with organizations across our state to address the health need priorities of children residing in (and around) metro Atlanta and Georgia.

Please visit us at choa.org for more information and to follow our progress.

Warm regards,

Thomas M. Holder
Chairman
Children's Healthcare of Atlanta
Board of Trustees

About Children's Healthcare of Atlanta

Children's is Georgia's leading pediatric healthcare provider, with three hospitals and multiple neighborhood locations, ensuring children across Georgia have had access to the specialized care they need since 1915. In 1998, Egleston Children's Health Care System and Scottish Rite Medical Center came together to form Children's Healthcare of Atlanta—one of the largest pediatric healthcare systems in the country. In 2006, Children's assumed responsibility for the management of services at Hughes Spalding Children's Hospital. Today, our system includes three free-standing pediatric hospitals, multiple neighborhood locations, and access to 2,000 pediatric physicians and allied health practitioners across more than 60 pediatric programs. Our people, our clinical expertise, and our specialized equipment and environments allows us to provide leading pediatric care to all kids, including those from all 120 rural counties in our state. In 2021, we managed more than 1,091,000 patient visits and treated more than 414,000 unique patients from all 159 counties in Georgia.

Child Advocacy at Children's

Children's has a long history of advocating for children's health in the community by providing education and awareness to both families and key stakeholders. Children's is committed to improving child health and wellness through awareness, prevention and education efforts in our community through a defined Child Advocacy strategy with four pillars: obesity prevention, behavioral and mental health prevention, injury and illness prevention and child protection. Armed with a team of Children's doctors, registered dietitians, mental health professionals and other wellness experts, we focus on three key strategies: equipping parents with the resources they need at home, training healthcare clinicians and working with schools and communities to support kids where they learn and play. Our Child Advocacy team recognizes that raising a child is the hardest job there is, but we aim to make it easier to find the tips and advice parents need from trusted experts they can count on. Results from the CHNA will be used to help prioritize initiatives and measure progress.

Children living in rural areas face unique health and healthcare challenges. Our Child Advocacy team continues to bring prevention programming to all children in Georgia with a focus on expanding to more rural communities.

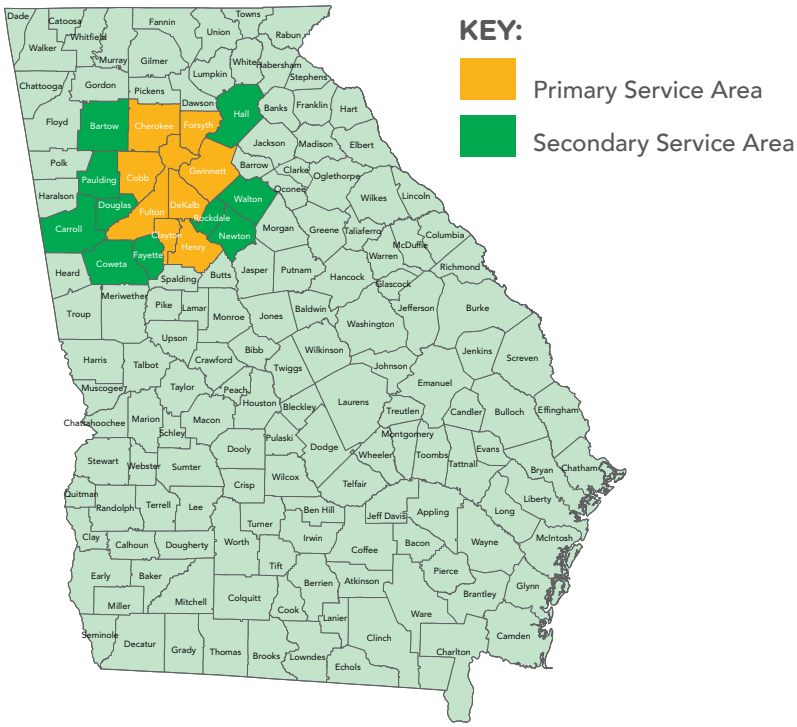
We know Georgians are counting on us to make a difference—both in the lives of kids and in the strength of our communities. Children's offers a number of programs and services to meet the health needs of children in Georgia. Children's saw more than 23,000 patients from rural counties and over 65,000 patient visits in 2021, providing care for emergencies, surgeries, neurology, orthopedics, hematology/oncology, and transplant. In 2020, Children's provided $300.3 million in community benefit, including approximately $158.2 million in unreimbursed clinical care, $80.6 million in lifesaving research, $25.2 million in subsidized services and $6.7 million in wellness programs.

Overview

Children's conducted its fourth CHNA in 2022 to identify and prioritize pediatric community health needs through input from a broad range of truly remarkable community members across the state who are passionate about the interests of children and adolescents. The assessment helps Children's better understand the needs of the pediatric healthcare community, informs our community benefit activities and influences our strategic planning efforts. We will repeat the CHNA process every three years and report the results of our assessment on the Children's website in accordance with IRS regulations.

Our Community of Focus

Our 2022 CHNA considers the pediatric health and healthcare needs throughout Georgia, including children living in both urban and rural communities. As required by the IRS as a condition of its non-profit healthcare status, Children's must define a community of focus. A majority of our patients live in the metropolitan Atlanta region, focusing specifically in the 18-county primary and secondary metro service areas that accounted for 87% of admissions, 92% of emergency department visits and 87% of outpatient visits to Children's during 2021. These 18 counties are Bartow, Carroll, Cherokee, Clayton, Cobb, Coweta, DeKalb, Douglas, Fayette, Forsyth, Fulton, Gwinnett, Hall, Henry, Newton, Paulding, Rockdale and Walton. However, we continue to assess the health and healthcare needs of all children in Georgia, especially the unique needs of children living in rural areas.



Understanding Our Community

Georgia has approximately 2.5 million children and adolescents aged 18 years and younger, with over half living in the Atlanta Metropolitan statistical area. The pediatric population is evenly split by age and gender for both Georgia and the 18-county metro service area. Race and ethnicity distribution is also similar when comparing Georgia to the 18-county metro service area and patient demographics from Children's Healthcare of Atlanta: approximately 53% White, 32% Black or African American, 7% two or more races, 4% Asian and 4% other. Ethnicity is slightly different with 14.5% of children in Georgia identifying as Hispanic or Latino, 15.2% in the 18-county metro service area and 16.9% at Children's. Approximately 14% of families in Georgia speak a language other than English at home.

Family characteristics in Georgia mirror the United States with a few key differences. Georgia has a lower median household income and higher percentage of persons living in poverty than the rest of the U.S. Comparing the 18-county metro service area to Georgia, there is a higher percentage of persons with less than a high school degree outside of the 18-county metro service area, although the remaining educational attainment categories are similar for each. Families living in the 18-county metro service area have a slightly higher median income than the median income across Georgia. Patients at Children's Healthcare of Atlanta largely represent the communities of both the 18-county metro service area, rural communities, and Georgia.

Methodology

Children's employed a multi-pronged approach to gathering information: focus groups, qualitative interviews, data analysis and a quantitative survey. The goal was to collect input from a wide variety of key stakeholders across domains, including healthcare, early care, schools, community organizations, state government, academics, nonprofit organizations, and parents and caregivers. These key stakeholders represent state-level, metro-area and rural communities in Georgia.

Parent and caregiver focus groups were conducted between March and April 2022, with 95 participants ranging in gender, education, income, ethnicity, race, geographic location, age of child(ren) and primary language spoken. Each focus group was conducted virtually with accessibility via a home computer or mobile device. Sessions were 75 minutes in length with a target of 10-12 participants in each session. Further information can be found in Appendix D. Theme analysis revealed six main areas of concern for pediatric health and healthcare: mental health, access, obesity, specialty care, dental care, and issues affecting Hispanic or Latino communities.

Participant Group Design

High income	Spanish-speaking	Caregivers with children aged 0-5 years	Caregivers with children aged 6-11 years	Caregivers with children aged 12-17 years
Low income	Spanish-speaking	Caregivers with children aged 0-5 years	Caregivers with children aged 6-11 years	Caregivers with children aged 12-17 years
Geographic location	Primary service area	Secondary service area		

We conducted 15 qualitative interviews between April and June 2022 with state-level key stakeholders whose work impacts children and adolescents across different sectors. The interview guide, list of participants and results can be found in Appendix E. Participants were asked to describe the population they serve; the overall health of the youth, communities or populations most vulnerable and at risk; the most utilized resources; and how to best meet the needs of the community. Interviews were 30 minutes in length. Results were analyzed via key themes by each question. Common themes throughout the interviews were vulnerable populations, behavioral and mental health, obesity and nutrition, chronic conditions, rural populations, and the environment.

The quantitative survey was sent in June 2022 to over 1,500 participants representing the interests of children and adolescents throughout metro Atlanta, rural communities and Georgia. The survey asked participants to rank pre-selected priority areas for both health and healthcare and social determinants of health topics. The pre-selected priority areas were based on parent and caregiver focus groups, qualitative interview themes, and data analysis. Survey reminders were sent every two weeks, with a maximum of two reminders. Due to a low response rate after the initial fielding, an additional reminder was sent through internal partners who work in each of the sectors. The survey was completed by 115 individuals representing diverse backgrounds, including community leaders, clinical professionals, school health professionals, early care professionals, research/academia, government/nonprofit and education. The survey instrument and results are available in Appendix F.

Internal and external data analysis utilized Children's hospital data and existing external data sources to compile health and well-being indicators for children and adolescents. Indicators fall into five domains: education, socioeconomic, health, environment, and housing and transportation. Primary data sources include American Community Survey, National Vital Statistics System, U.S. Census Bureau, National Survey of Children's Health, Georgia Department of Education College and Career Ready Performance Index, and others. Data was compiled at the lowest common geographical level, i.e., census tract, ZIP code and county. Analysis included disparities across geography, income, race, ethnicity and other demographic information. A complete list of data sources and indicators can be found in Appendix G.

Ranking of health issues and concerns was a synthesis of focus groups, qualitative interview themes and quantitative survey rankings. Internal and external data analysis were used to identify health issues and to describe how each health issue affects our community.

Our Community Health Need Priorities

The 2022 community health needs represent key elements from the 2013-2019 report but reflects a shift in how the community thinks about children's health and healthcare concerns through a reorganization of health topics. Caregivers, key informants and survey respondents consistently highlighted vulnerable populations and the effects of social determinants on health and healthcare access across each health need identified.

Through a wide range of input, the 2022 CHNA needs, in priority order, are as follows:

1. Collaboration to enhance access to **mental, behavioral and developmental health** services for children and adolescents
2. Programs to address **chronic disease** prevention and management
3. Programs to support **adolescent health issues**
4. Programs to reduce childhood **obesity**
5. Programs to address **infectious disease** prevention and management
6. Programs and collaboration to support **community outreach**
7. Programs to address **injury prevention**
8. Collaboration to address access to **primary care medical homes** for children and adolescents
9. Programs to address **health literacy**
10. Collaboration to address access to **oral health** services

2023–2025 Implementation Plan

Our Implementation Strategy

The health needs of the community were well known due to the long history of Children's working with the community. Each of the health needs is actively being addressed in some capacity by existing and ongoing Children's programs and services. See Appendix B for a resource inventory of Children's programs and services. Furthermore, there are many organizations in the community that are addressing these needs as well. The Children's community health needs implementation strategy is focused on leveraging existing programs, services and resources, when possible. Children's will continue to update our strategy and initiatives to meet the needs of the community.

No organization alone can address all the community health needs. In addition to fostering collaborations, Children's will take a supportive role in other pediatric community health need efforts in the greater metropolitan Atlanta region and throughout Georgia. Existing healthcare facilities and community resources currently addressing the prioritized community health needs are highlighted in this report. See Appendix C for the Community Resources available.

Unique implementation plans for Egleston and Scottish Rite hospitals are included because of their unique tax ID. The following serves as the implementation plan for both Egleston and Scottish Rite. Although Children's continues its priorities at Hughes Spalding, an implementation plan is not included, as Children's manages this hospital for Fulton-Dekalb Hospital Authority. Children's actively addresses the identified top health needs by current programs and services but will continue to align resources and initiatives to meet the needs of the community.

Impacting Social Determinants of Health

Social determinants of health are the "conditions in the environments where people are born, live, learn, work, play, worship and age that affect a wide range of health, functioning and quality-of-life outcomes and risks."[1] Child health is determined by both the current social determinants affecting how they live, learn and play and the intergenerational effects of their parents and caregivers.[2] Social determinants affect each need identified in this report. Caregivers, interview participants and survey respondents identified healthcare access as the top area of need within social determinants. Access to care includes availability of services, such as insurance coverage, timeliness and workforce. As one parent shared, "This is the number one barrier to healthcare for children." Another parent shared, "I try to just let her get over it when she's sick" to avoid the cost. Our implementation plan highlights how Children's is working to address social determinants within our community, with a focus on healthcare access.

Community need #1:

Collaboration to enhance access to mental, behavioral and developmental health services for children and adolescents

Description of Need

Children who are mentally healthy throughout childhood reach "developmental and emotional milestones and learn healthy social skills and how to cope when there are problems."[3] Common childhood mental and behavioral health conditions include anxiety, depression, obsessive-compulsive disorder, oppositional defiant disorder, conduct disorder, attention-deficit/hyperactivity disorder (ADHD), Tourette syndrome and post-traumatic stress disorder.[4] Other conditions and concerns that affect a child's health and well-being may include developmental disabilities, autism, substance abuse or self-harm. Caregivers, interview participants and survey respondents most commonly referred to anxiety and depression when discussing mental health concerns in the community.

A study by the Centers for Disease Control and Prevention (CDC) estimates a 24% and 31% increase between April and October 2020 in the proportion of emergency department visits due to mental health concerns for children ages 5-11 and 12-17 years, respectively.[5] In 2019-2020, 25.4% of children aged 3-17 years have one or more mental, emotional, developmental or behavioral problems, compared to 22% in 2018.[6] Nationwide, approximately 9.4% of children aged 3-17 years have diagnosed anxiety; 4.4% have diagnosed depression.[7] Suicide is the third leading cause of death in adolescents nationwide.[8] About 1 in 44 children is said to be on the autism spectrum; autism is more common among boys than girls.[9]

Caregivers, survey respondents and interview participants cite several barriers to care, including access to mental and behavioral health specialists. Caregivers in our focus groups shared that "it's so hard to navigate mental health help and insurance." Another caregiver shared that "only one area doctor accepts our insurance." Many families are driving long distances or are otherwise unable to access the care they need.

The pandemic has been a significant disruption to the lives of children and adolescents, particularly through isolation and school closures. A meta-analysis reveals that the pandemic caused increased stress, worry, helplessness, and social and risky behavior problems among children and adolescents. Because of this, children and adolescents are experiencing higher rates of anxiety and depression.[10] Through a flourishing scale monitored by the National Survey of Children's Health (NSCH), Georgia saw a decrease in the number of children meeting all three items for children aged 6-17 years: 68.8% in 2018 compared to 63.2% in 2019-2020.[6] Hispanic and Black, non-Hispanic children are less likely to meet all three flourishing items compared to White, non-Hispanic children. The CDC conducted the Adolescent Behaviors and Experiences Survey in 2021, which is a comprehensive look at the impact of COVID-19 on our nation's high school students.[11] Over one-third of students reported experiencing poor mental health during the pandemic, with nearly half reporting feeling persistently sad or hopeless. Many survey respondents cited the COVID-19 pandemic as a concern for children's mental health.

Percentage of children aged 6-17 years who are Flourishing*, United States and Georgia, 2019-2020

United States	63.3%
Georgia	63.2%
For children in GA who identify as:	
White, non-Hispanic	66.2%
Black, non-Hispanic	59.1%
Hispanic	63.7%

Source: 2019-2020 National Survey of Children's Health, Health Resources and Services Administration, Maternal and Child Health Bureau.

**Flourishing refers to children meeting 3 out of 4 items on a validated scale.*

Implementation Plan

Children's commits to helping to reduce stigma and enhance access to prevention, diagnosis and treatment services for children and adolescents. In 2020, Children's developed a five-year strategy to address thee mental, behavioral and developmental health needs of children and adolescents. We will sustain the current strategy while continuing to adjust resources to best meet the needs of youth in our community. Children's commits to being a leader and partner in building a pediatric behavioral and mental health ecosystem that improves outcomes; reduces stigma; and enhances access to prevention, diagnosis and treatment. Our focus continues to be:

- Innovate Behavioral and Mental Health Care
- Pioneer Prevention
- Transform Access
- Build a Strong Foundation

Innovate Behavioral and Mental Health Care

Children's will continue to provide inpatient and Emergency Department psychiatric consultations and select outpatient behavioral and developmental health services through specific medical clinics. We will equip our staff to deliver enhanced and effective care for our patients through training, education and resources.

Children's will continue to offer comprehensive services and evidence-based treatments for children with neuro-divergent conditions through Marcus Autism Center. Marcus Autism Center will continue to provide clinical services through the Diagnostic Assessments Clinic, Severe Behavior Program, Pediatric Feeding Disorders Program, and the Language and Learning Clinic as well as through educational programs, outreach clinics and support services. Marcus will continue conducting research into clinical practice and extending these findings into the community and naturalistic setting.

Transform Access

Children's will continue the behavioral and mental health educational initiative focused on supporting our primary care network to address the behavioral and mental health needs of the community.

- **Better access to behavioral and mental health expert advice:** Children's will continue service and awareness of the behavioral health expert advice line, facilitating connections between primary care providers and mental and behavioral health nurse practitioners. We will continue to support a referral database, which offers providers referral resources within their communities to families in need.
- **Increasing community provider knowledge and comfort with primary behavioral and mental healthcare:** Children's will continue educational offerings for providers to help them diagnose and treat patients with mental and behavioral health issues. Multiple behavioral health-focused lectures and seminars will be included in the Children's grand rounds series, CME series and evening community educational offerings. Focused symposia in behavioral health are now part of the major pediatric provider conference in Atlanta, with Children's support. Behavioral health topics will continue to be integrated into all 2023-2025 activities.
- **Access to online educational resources in one place:** Children's will continue the physician website to serve as an online resource center with behavioral health resources, links to related behavioral health organizations, questionnaires for assessing patient depression and anxiety, family education materials and upcoming educational opportunities.

Pioneer Prevention

Children's commits to bringing evidence-informed programs to healthcare providers, schools, community organizations, faith-based organizations, and early care and education centers to improve resiliency in children and reduce the stigma around mental and behavioral health. The programs will continue to address emotional wellness in children through training and education for key influencers of children while equipping influencers, parents and caregivers with the tools and resources to support resilience-building strategies in children.

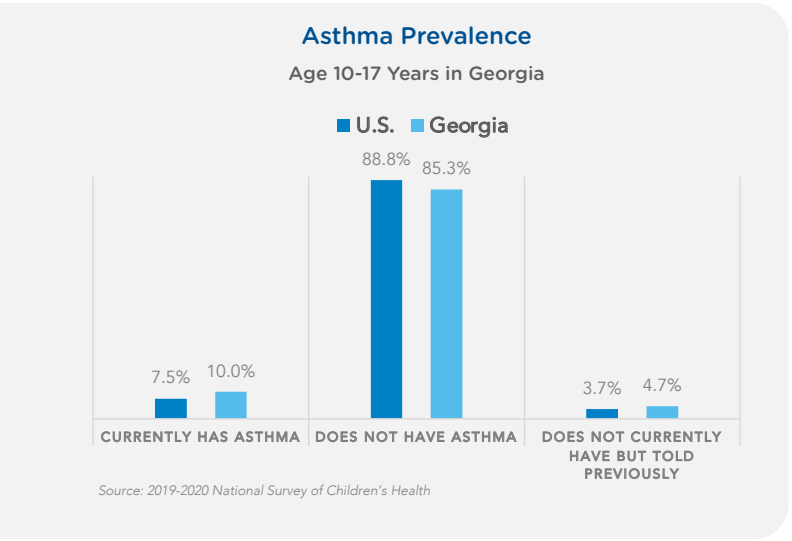
Build a Strong Foundation

Children's commits to building a strong foundation to champion long-term systemic changes needed to transform the pediatric Behavioral and Mental Health ecosystem.

Community need #2:
Programs to address chronic disease prevention and management

Description of Need

As one respondent wrote, "Chronic disease plagues our communities. Diabetes has become an epidemic […] and we are even seeing school-aged children on hypertensive medications." Over 40% of school-age children and adolescents have at least one chronic health condition, such as asthma, diabetes, epilepsy, allergies, obesity, other physical conditions, or behavior or learning concerns.[12] Over half of the respondents (51.2%) who identified chronic disease and management as a top health concern stated that a large portion of the community has at least one chronic condition and that there is an increase in the number of patients seen with chronic conditions like diabetes, obesity, asthma or heart disease. One survey respondent wrote, "Many of my patients have multiple chronic medical conditions." Of the many chronic conditions, we focus on asthma, diabetes and allergies due to high rates of prevalence, hospitalizations and emergency department visits. Survey respondents also included obesity and mental illness as chronic conditions, which are included as special health topics in this report.



Asthma is the leading chronic illness among youth and one of the leading causes of missing days of school.[13] In 2020, children aged 0-19 years in Georgia had 11,379 emergency room visits for asthma.[14] Georgia's children have a higher prevalence of asthma compared to the rest of the U.S., with 10% of children aged 0-17 currently having asthma and 4.7% having ever been told but not current. Each year, about 1 in 6 children with asthma visits the emergency department and 1 in 20 is hospitalized.[15] In 2021, Children's had over 13,000 visits related to asthma.

Type 1 diabetes is largely diagnosed in childhood and increasingly, the U.S. is seeing a rising incidence of Type 2 diabetes in youth. In 2019, about 283,000 children and adolescents had diagnosed diabetes; of those, 244,000 had Type 1.[16] While diabetes is not a leading chronic condition for prevalence, management of the disease is imperative. Children's had over 3,000 visits related to diabetes in 2021.

Nearly 30% of children and adolescents living in Georgia have allergies, including food, drug, insect or other types, which is higher than the national prevalence of just under 24.4%.[15] According to the CDC, an estimated 8% of children have a food allergy,[17] which is approximately two students per classroom. Two in five children with food allergies in the U.S. have been treated in the emergency department.[18] A recent study examining anaphylaxis-related hospitalizations found the highest hospitalization rate among children aged 5-14 years.[19]

Implementation Plan

Children's commits to reducing the prevalence of asthma and the number of emergency room visits caused by asthma. Children's will continue the High-Risk Asthma Program at Scottish Rite, Egleston, Hughes Spalding and patient clinics, as well as the Asthma Center at Hughes Spalding. In addition, Children's will continue to provide medical care to children through the Ronald McDonald Care Mobile. The Ronald McDonald Care Mobile now offers general and primary care services to school-age children. Children's will continue offering education to patients, caregivers and school staff about asthma triggers and management. In addition, physicians will be provided with standardized tools to improve asthma action plans so that they can better provide care to asthma patients and their families. The Children's Care Network (TCCN) has incorporated asthma as a quality improvement plan priority, equipping TCCN providers with ongoing support to better manage children with asthma.

We will continue offering diabetes care to children with Type 1, Type 2, cystic fibrosis-related and gestational diabetes, as well as diabetes caused by medication. Children's will continue offering specialty care through a coordinated, comprehensive approach, including diagnosis and determination, testing for related conditions, screening, management and education, preventative care, and insulin pumps and technology. Children's offers child and caregiver resources for education, including classes, videos, a teaching kitchen, at-home tools and a summer camp for children with diabetes.

Allergy and immunodeficiency disorders include allergic conjunctivitis, allergic rhinitis, anaphylaxis, asthma, atopic dermatitis, contact dermatitis, drug allergies, food allergies, hereditary angioedema, immune deficiencies, sinusitis and urticaria. Children's will continue to treat children and adolescents who have allergies and immunodeficiency disorders through a range of testing and treatment options. Children's commits to offering pediatric specialty care through multidisciplinary programs and clinics. We currently have a food allergy program, high-risk asthma program, procedure clinic, 22q11 Deletion Syndrome clinic and Eosinophilic Esophagitis clinic. We will continue research and high-quality care to improve the lives of children living with allergies.

Children's will continue to work with schools throughout Georgia and over 1,600 school health professionals to coordinate approaches for addressing primary and chronic health issues to reduce missed school days. The following programs and services will continue to be offered to keep kids healthy and reduce absenteeism:

- Children's regional school health coordinator will provide training, education, technical assistance, and communication on clinical pediatric topics and serve as a contact for school health professionals
- The Georgia School Health Resource Manual is available for free online or for purchase in hard copy
- Children's Asthma Management Education Program
- Scoliosis Screening Program
- Diabetes community education
- Educational Outreach Program at Marcus Autism Center
- Athletic injury prevention
- Project S.A.V.E. stands for Sudden cardiac Awareness Vision for prevention Education and offers training and support to prevent sudden cardiac arrest in children and adolescents

Community need #3:

Programs to address adolescent health issues

Description of Need

Adolescence, who are youth ages 12 to 19, experience substantial transitions in physical, mental, emotional, social, cognitive and intellectual growth. During a period of substantial growth and development, adolescents face unique health challenges.

Adolescents generally report being in good health; only 3.2% of adolescents ages 12-17 years reported being in fair or poor health in 2020, and 4.1% reported missing 11 or more days of school in the past 12 months because of illness or injury. Most adolescents have a usual source of care (97%) and health insurance coverage (94%).[20] Children in this age group face unique challenges with risky behaviors. In 2020, the leading causes of death among adolescents were unintentional injury, homicide and suicide.[21]

Leading Causes of Death, Children ages 12-17 years	
Unintentional injury	5,267
Homicide	2,777
Suicide	2,730
Malignant neoplasms	809
Heart disease	377
Congenital abnormalities	289
Chronic lower respiratory disease	144
COVID-19	141
Diabetes	124
Cerebrovascular disease	102

According to our survey respondents, the top three issues affecting adolescent health are depression and anxiety, drugs and alcohol, and bullying. Based on 2019 data from The CDC Youth Risk Behavior Surveillance Survey, 32.7% of high school students nationally currently use electronic vapor products, with 7.2% reporting daily use. In Georgia, 18.6% reported ever having tried smoking, compared to 24.1% nationally, and 15% nationally report having had their first drink of alcohol before age of 13. In addition, the Georgia Student Health Survey found that 7% of students grades 6 through 12 reported having at least one drink of alcohol in the previous 30 days, 7% reported use of an electronic vapor product, and 2.8% smoked cigarettes.[22] Disparities exist among adolescent risky behaviors. Black (14.8%) teens were more likely to report having four or more sexual partners during their lives than white (8.6%) and Hispanic (9.4%) teens. Hispanic youth (16.1%) were more likely to report ever using illicit drugs compared to Black (11.1%) and white (13.4%) youth. Male teens were more likely to report having had four or more partners in their lives and ever having had sex, while female teens reported more sexual dating violence than males. Adolescents have higher rates of risk behaviors overall, and disparities in those risk behaviors persist.

Implementation Plan

Children's commits to community programming to support adolescents through the Stephanie V. Blank Center for Safe and Healthy Children to address adolescent issues such as child abuse, sex trafficking, internet safety, adolescent sexual behavior and child neglect. The Children's Strong4Life team will engage adolescents and their families through our Raising Resilience programming and resources. Children's will also target marketing resources to address adolescent health issues such as vaping and water safety. Through Children's support of the Safe Kids Georgia state office, Safe Kids Georgia offers Teens in the Driver's Seat, which is a research-based peer-to-peer program focusing on traffic safety and all major risks for the teen age group.

Children's will continue to collaborate with Emory University, Grady Hospital and other adult hospitals to provide programs and services to coordinate the transition of care from adolescence to young adulthood for patients with:

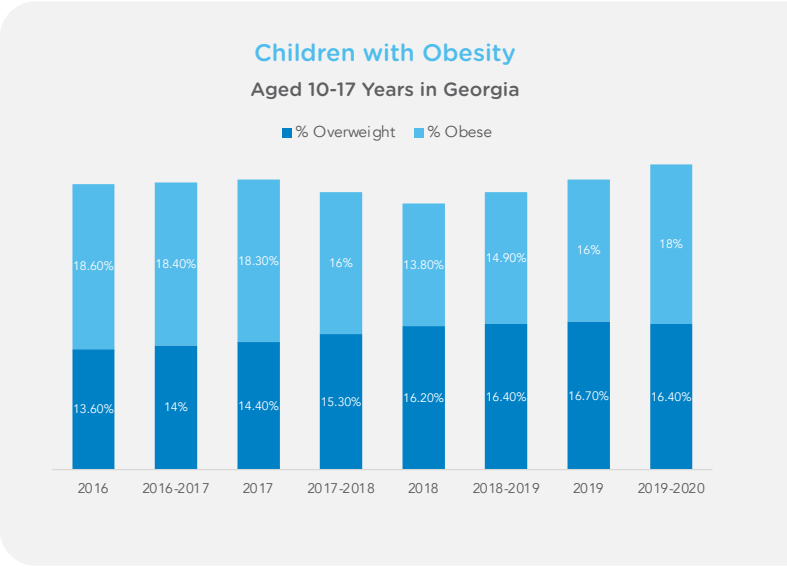
- Cystic fibrosis
- Congenital heart disease
- Cancer
- Sickle cell
- Transplants (liver, kidney, heart)

Children's will also continue its Taking Diabetes to College course for children with Type 1 diabetes transitioning into young adulthood. Children's will continue to operate an adolescent health clinic at Hughes Spalding, offering a psychologist, nurse practitioner, social worker and counselor dedicated to adolescent health issues. Teens can be referred to the clinic from across the Children's network. Our clinically integrated network, TCCN, commits to increasing screenings for depression and risky behaviors at pediatric primary care offices, piloting referral tracking after positive screens and addressing disparities.

Community need #4:
Programs to reduce childhood obesity

Description of Need

Rising obesity trends among children and adolescents remains a top health concern both nationally and in Georgia. Childhood obesity rates have more than tripled over the last few decades, increasing from 5% in 1978 to 18.5% in 2016.[23] According to the 2019-2020 National Survey of Children's Health, 16.4% of children ages 10-17 years in Georgia were in the overweight category and 18% in the obese category.[24] Georgia currently ranks 14th in the U.S. for the highest percentage of children with obesity. One survey respondent wrote, "Obesity is a problem in our community. Lack of education, learned habits, decreased activity and increased fast food intakes are concerns." With recent data showing increasing rates due to the COVID-19 pandemic[25] and significant interruption to the daily lives of children and adolescents,[26] the obesity epidemic remains a complex health issue facing our community.



Children with obesity are more likely to develop other serious health problems, like heart disease, Type 2 diabetes, anxiety, depression and low self-esteem. While some children are genetically predisposed to an increased risk of obesity, family and community risk factors increase a child's risk. These risk factors include a high-calorie, low-nutrient diet; lack of quality sleep; increased screen time; decreased physical activity; and stress or trauma.[27] Survey respondents echoed similar concerns, highlighting movement and physical activity education, feeding and nutrition education, and access to healthy foods as the top areas needing support to address obesity in the community. Caregivers, interview participants and survey respondents all expressed concern over the lack of specialty care available for children with obesity.

The COVID-19 pandemic significantly impacted children and adolescents through lock downs and school closures. Common sources of stress during the pandemic for youth include quarantine, isolation, less interaction with peers, food insecurity, disruption to routine and schedule, limited physical activity, online learning, instability in family finances and parental stress, which increasesthe risk for obesity.[28]

Racial and ethnic minority children also experience disparate rates of obesity. Black or African American children experience higher rates of obesity than their White or Asian counterparts. Hispanic children also face increased risk for obesity with a substantially higher prevalence at age 2 than non-Hispanic White, non-Hispanic Black and non-Hispanic Asian children; by age 11, obesity prevalence is similar between Hispanic and non-Hispanic Black children with estimates being more than 25%.[29]

Implementation Plan

Beginning in 2011, Children's committed to leading Georgia in the effort to reduce the prevalence of children and adolescents with obesity. The Strong4Life model was built on research demonstrating that a multilayered community approach utilizing channels of key influencers and environments is a successful strategy to reduce obesity. Strong4Life built and leveraged relationships with healthcare providers, schools, early care centers, community organizations, youth-serving organizations and parents. In addition, the Strong4Life Clinic offers clinical and bariatric intervention for children with obesity. Children's maintains its commitment to Strong4Life's obesity prevention and reduction efforts and will continue to focus community efforts on awareness, prevention and education through core programming and marketing.

The Strong4Life Raising Healthy Eaters program will continue over the next three years to equip clinicians and caregivers with evidenced-informed feeding techniques to prevent obesity. Our clinician strategy will include a continued focus on rural areas outside of metro Atlanta. We will explore additional resources to support caregivers and clinicians, such as short videos that reinforce feeding strategies that support the development of healthy eating behaviors. We will build on our relationship with Georgia Women, Infants, and Children (WIC) to deliver the same feeding techniques to nutritionists and families enrolled in WIC. In addition, Strong4Life will continue to support clinicians with training in the Foundations of Motivational Interviewing to support effective communication about health behavior change with all families.

Strong4Life will continue to expand partnerships with early care and education centers to deliver Raising Healthy Eaters and Building Intentional Play into the Day offerings. We will focus on supporting a tiered approach with broad-level training and intensive center-based programming to promote the development of healthy eating and physical activity habits from early in life. Strong4Life school programming will continue its work to create healthy school environments by partnering with district-level personnel, principals, school nutrition managers, school staff and children to engage in evidence-informed strategies of environmental and behavior change. The Strong4Life Challenge Program, the Strong4Life Wellness Pledge Program and the Strong4Life School Nutrition Program will continue to be offered in metro Atlanta and statewide. New efforts will be made to develop a model for virtual engagement of rural schools. Strong4Life will update training materials, resources and healthy habit information to reflect current evidence of obesity-prevention and whole-child wellness behaviors.

Strong4Life reaches children with obesity directly via our weeklong summer camp program Camp Strong4Life. Current plans include continuing to offer this experience for children aged 8-12 who are experiencing obesity. As Camp Strong4Life has evolved to include our updated healthy habits, the program focuses on assisting families with access to food via home delivery of fruit and vegetable subscription boxes. Strong4Life will continue to support this intensive summer experience for kids to receive experiential learning about healthy behaviors.

Strong4Life will explore a refreshed community partner strategy focused on supporting out-of-school-time environments in which kids spend time. Ongoing partnerships with parks and recreation departments, summer camp programs, YMCA, Boys & Girls Clubs of America and others will be revisited and a clear strategy for supporting healthy behaviors in the settings will be developed and deployed. Strong4Life will explore a new community-based programming approach to better meet the needs of families and caregivers at risk of developing obesity. Children's will continue to measure engagement each year with Strong4Life programming while also monitoring the state ranking and percentage of children with obesity reported through the National Survey of Children's Health administered by the U.S. Census Bureau.

Community need #5:

Programs to address infectious disease prevention and management

Description of Need

Amid the COVID-19 pandemic, the need for infectious disease prevention and management changed compared to previous CHNA cycles. Survey respondents largely cited access to primary and urgent care for acute, communicable diseases as a top area needing support, second to education on how to stop the spread of communicable diseases. Both interviewees and survey respondents identified the need for increased vaccine education, specifically mentioning the COVID-19 vaccines for children but also general vaccine education. For the general pediatric vaccine schedule, Georgia (79.5%) is above the national prevalence (75.8%) of children receiving all recommended doses of vaccines by age 35 months. Though parents have expressed increased vaccine hesitancy in recent years,[30] communities can slow or mitigate communicable diseases through high vaccination rates among children and adolescents. This, in turn, reduces emergency department utilization, morbidity and mortality. A survey respondent wrote that, "20% of the population is not immunized with proper immunizations due to the lack of vaccine education and/or access to care."

As of July 2022, Georgia has had 343,504 cases, 3,838 hospitalizations and 38 deaths with confirmed COVID-19 infections for children aged 0-17 years.[31] The pandemic changed infection prevention protocols for families, schools and youth organizations. Survey respondents cited a lack of knowledge about infection transmission, particularly in the 12–17-year-old age group, as well as vaccine and viral misinformation. Although interviewees focused on the secondary effects of the pandemic (e.g., mental health concerns, sedentary behavior), survey respondents highlighted the need for education on how to stop communicable diseases as a result of COVID-19.

Implementation Plan

To help curb outbreaks of vaccine-preventable diseases, it is important for children to stay on schedule with immunizations, including the flu vaccine. Understanding that the flu vaccine can prevent and decrease severity, hospitalizations and even deaths, Children's offered flu vaccines in the Emergency Department at Egleston in 2019. Approximately 87% of patients that came through the Emergency Department during December 2019 and January 2020 had not yet received a flu vaccine. Based on this need and the high Medicaid percentage of this population, we applied to be a 2020 and 2021 Vaccines for Children (VFC) provider, meaning we could give eligible patients flu vaccines free of charge. At the beginning of the 2021-2022 flu season, Children's expanded this program to the remaining Emergency Departments as this initiative has proven to be effective and impactful. Since September 2021, Children's has provided more than 3,000 flu vaccinations across all three Emergency Departments.

Children's will continue offering resources for vaccine education of infectious diseases with a focus on emergent respiratory viruses, like influenza and COVID-19. Children's has a COVID-19 hub for parents and caregivers offering up-to-date information about COVID-19 vaccines, booster recommendations, testing and prevention. Children's also offers annual flu vaccine and prevention information through multiple channels: the website, social media and resources for youth organizations such as schools. The Ronald McDonald Care Mobile now offers vaccines, including COVID-19 and flu vaccinations.

Children's offers education and training for community providers through continuing medical education about infectious diseases and motivational interviewing. Motivational interviewing is a style of goal-focused communication to help providers discuss difficult topics with their patients and families. These offerings equip providers with tools for vaccine education for parents and caregivers. Children's has three Emergency Departments, eight urgent care clinics and 19 neighborhood clinics throughout metro Atlanta, providing high quality care to children and adolescents with infectious disease testing, diagnosis and management.

Community need #6:

Programs and collaboration to support community outreach

Description of Need

Community outreach is essential to ensure members of a community have access to healthcare services and to improve the collective health and well-being of the community. Survey respondents outlined three areas needing increased support to meet communities where they are: education, healthcare service and food access events. One key stakeholder said, " [We must] create trusted relationships with stakeholders in the community […] getting the trust there to be able to provide information and resources." Survey respondents most often cited education events as the area needing the most support. The effectiveness of education events and programs is often dependent on many factors, including the content of the educational materials, the social determinants of health within a community and coinciding services to educational events. A survey respondent shared,"Community outreach is important for our underserved parts of the community. Education events would be helpful." As another survey respondent noted, "Our community benefits from these events because the families will attend an event that will get them access to multiple services at one time. It is a one-stop shop for the families and easy to attend. They also appreciate receiving any tools and resources that are handed out at these events. It is a great way for the community to network with others as well."

Implementation Plan

Children's commits to improving child health and wellness through awareness, prevention and education efforts in our community with a defined Child Advocacy strategy with four pillars: obesity prevention, behavioral and mental health prevention, injury and illness prevention, and child protection. We focus on three key strategies: equipping parents with the resources they need at home, training healthcare clinicians, and working with schools and communities to support kids where they learn and play. Our Child Advocacy team recognizes that raising a child is the hardest job there is, but we aim to make it easier to find the tips and advice parents need from trusted experts they can count on.

Children's will support nurse navigation services based in an early learning center serving children between the ages of six weeks and four years old. The nurse navigator helps families access care and obtain follow-up care with the medical home after urgent and emergency care visits. In addition, the nurse navigator helps to reduce families' barriers to accessing care by arranging transportation, requesting interpreters, connecting families with health insurance navigators or even accompanying them to visits. Children's will work to expand nurse navigation services to under-resourced communities in metro Atlanta.

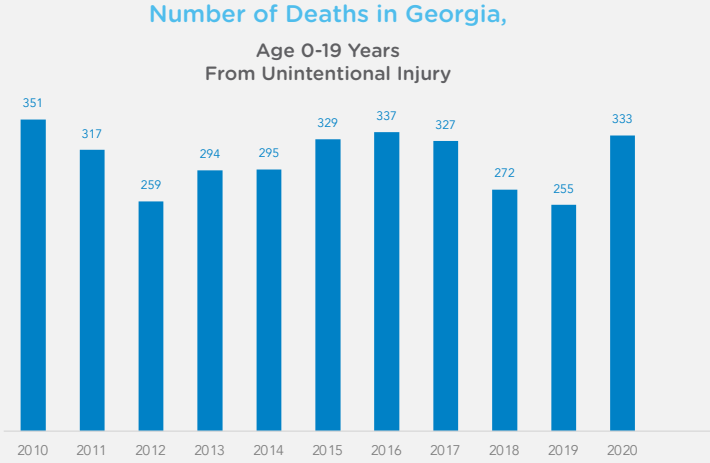
In addition, Children's will continue to provide medical care to children at metro Atlanta elementary schools through the Ronald McDonald Care Mobile, a fully functioning mobile medical clinic bringing primary care to children where they live, learn and play. The Care Mobile builds upon the expertise and existing partnerships established by the Asthma Center, leveraging its resources and adding others to deliver services directly to high-risk children in their own communities. The Care Mobile will offer primary care services, including health education, health checks, asthma care, and sports physicals to children.

Children's will continue to build key community partnerships throughout Georgia focused on reaching children and adolescents where they live, learn and play.

Community need #7:
Programs to address injury prevention

Description of Need

A survey respondent aptly wrote, "Avoidable child injuries are the leading cause of death among children across the nation. We must provide information and equipment to increase awareness and change behaviors to create safer communities where children can flourish." Based on data from the CDC, unintentional injuries are the leading cause of death for children aged 1-18 years old.[32] In 2020, 332 children aged 0-19 years in Georgia died due to unintentional injury, with approximately 116,773 emergency room visits.[33] The CDC cites injuries as one of the most under-recognized publichealth problems facing the United States,[34] with one child dying every hour from injury.[35]



Neither caregivers in our focus groups nor key stakeholders during qualitative interviews mentioned injury prevention as a top health concern; however, morbidity and mortality data consistently shows the impact of injury on children and adolescents. From 2019-2020, 23% of children living in Georgia missed four or more days of school due to injury and illness.[36] Nationally, death due to unintentional injury decreased between 2010 and 2019, but it remains the leading cause of death for children and teens.[37] In Georgia, unintentional injury deaths only slightly declined. Morbidity and mortality from injury is a key health concern for all children.

While the types of injuries do not greatly differ in urban versus rural areas, children living in rural areas face higher rates of unintentional injury than their urban counterparts; nationally, the rate of death per 100,000 is higher in rural areas (12.4) than urban areas (6.3). For children aged 5-13 years, death due to motor vehicle crashes is twice as high in rural areas compared to urban (3.1 and 1.5, respectively).[38] Additional injury disparities include higher rates of injury deaths among male children and babies under age one and teens aged 15-19 years. Black, American Indian and Alaska Native children also experience higher rates of death by injury. Black children experience higher rates of death due to drowning than their white counterparts: 2.6 times higher for Black children aged 5-9 years and 3.6 times higher for Black children aged 10-14 years.[39]

Recent data suggests that firearm-related injuries have surpassed motor vehicle crashes as the leading cause of death for persons aged 1-19 years. Firearm-related injuries include suicide and homicide as well as unintentional and undetermined injuries.[40] Suicide and homicide remain in the top five leading causes of injury deaths for children aged 5-19 years.

Implementation Plan

Children's will continue its community work in injury and illness prevention while streamlining offerings to maximize impact. Children's will continue working with Safe Kids Georgia to support injury prevention education, enforcement and safety equipment for Georgia's children. Children's supports the Safe Kids Georgia state office, which drives strategy for coalitions across Georgia. Children's will continue to support Children's Injury Prevention Program (CHIPP)'s mission to provide a multidisciplinary approach to reduce childhood injury, both unintentional and intentional, in the greater Atlanta area through evidence-based injury prevention programs, research, education and community outreach. CHIPP focuses on the leading causes of death due to injury, including motor vehicle crashes, sudden unexpected infant death, drowning and safe firearm storage. Children's will continue to support Project S.A.V.E. to offer CPR and AED training. Children's will continue to expand campaigns addressing water safety, motor vehicle crashes and safe sleep. These programs will combine with targeted marketing efforts to increase awareness.

Egleston is a state-designated Level 1 pediatric trauma center, and Scottish Rite is a Level 2. Children's will maintain trauma center designations to continue offering premier care and research to support advanced trauma care in the community.

The Stephanie V. Blank Center for Safe and Healthy Children provides specialized services to suspected victims of child abuse in metro Atlanta and across Georgia. The Center for Safe and Healthy Children continues to work closely with state and local partners to provide ongoing prevention training to schools, providers, youth-serving organizations, law enforcement, state and local personnel, foster parents and Georgia Division of Family & Children Services staff.

Community need #8:
Address access to primary care medical homes for children and adolescents

Description of Need

The American Academy of Pediatrics first introduced the concept of a "medical home" in 1967, when it envisioned one central source for a child's pediatric records and emphasized the importance of centralized medical records for children with special healthcare needs. Since then, the AAP has developed the medical home model for delivering primary care that is accessible, continuous, comprehensive, family-centered, coordinated, compassionate and culturally effective to all children and youth, including youth with special health needs. Based on 2019-2020 data from the National Survey of Children's Health, 46% of children in Georgia receive coordinated, ongoing and comprehensive care within a medical home. This is comparable to the nationwide rate of 46.8%.[24]

Currently, the medical home model is considered an important part of adequate primary care. Georgia and the U.S. have an equivalent percentage of children with a medical home. Even though the percentages are similar between Georgia and the U.S., when stratified by race/ethnicity, Hispanic children in Georgia are 1.95 times less likely to receive care within a medical home compared to White, non-Hispanic children. Similarly, Black non-Hispanic children are 1.33 times less likely to receive such care compared to White, non-Hispanic children. This illustrates disparities in medical home access and the need for efforts to promote medical homes to minorities.

Regular preventive, primary care is important for the health and well-being of children and adolescents; accessing high-quality primary care services significantly reduces non-urgent emergency room visits among children.[41] From 2019 to 2020 in Georgia, 16.9% children did not visit a doctor, nurse or other healthcare professional in the previous 12 months to receive preventive care, regardless of insurance type.[24] Black, non-Hispanic and Hispanic children are also less likely to receive preventive care than their White counterparts (80% and 76.4% compared to 87.7%, respectively).

Implementation Plan

Children's will sustain our "Practice of the Future" strategy, focusing on partnerships with federally qualified health centers (FQHCs) and preserving primary pediatric care through The Children's Care Network. By advancing toward the "Practice of the Future," a sustainable model designed for the modern-day parent, Children's hopes to protect pediatrics from changing market conditions while preserving access to pediatric primary care physicians for children in Atlanta. Children's will continue to affiliate with local FQHC, such as Mercy Care, to assess possible expansion of our joint successes serving underserved children in Atlanta, particularly in school-based health clinics. We will also continue to operate the Primary Care Clinic at Hughes Spalding.

Children's will continue to build key partnerships to promote and improve access to medical homes in under-resourced and minority communities. Children's will continue to optimize and operate our call center, 404-785-KIDS. Caregivers accessed scheduling, billing, clinical question support and general information, such as connecting to a patient or finding a doctor. Children's will also optimize and operate our physician call center, 404-785-DOCS, to support clincians by accessing Children's services, collaborate on patient care, schedule patient appointments or ancillary tests, refer to Children's Physician Group or speak to a Children's Physician Group provider.

Children's will continue to support nurse navigators who coordinate care through early learning centers in southwest Atlanta, supporting highly underserved families whose children experience higher rates of health and learning disparities than children living in other Atlanta neighborhoods. Children's currently offers nurse navigation services through the Sheltering Arms early care and education centers and will expand services through a partnership with the YMCA of Metro Atlanta.

The Children's Care Network

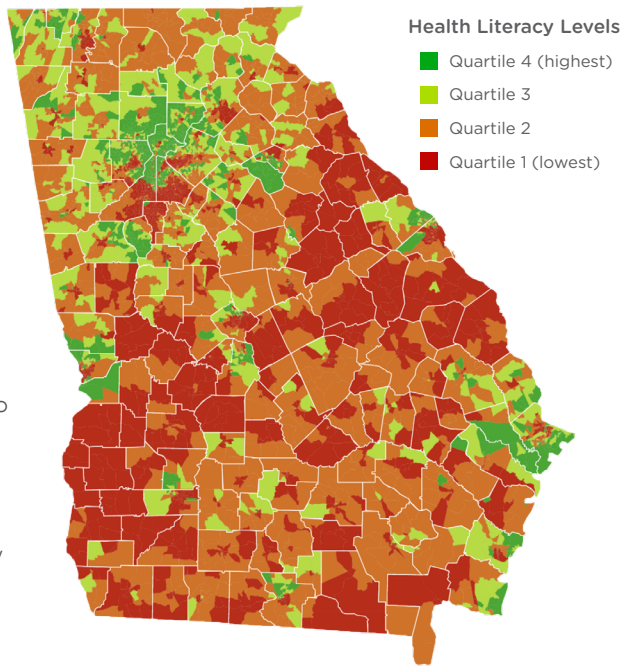
The Children's Care Network (TCCN) will advance its clinical integration status by expanding its care coordination capabilities to more effectively manage the population served by TCCN member physicians. TCCN will further existing quality improvement programs, including those targeting asthma, behavioral health and well visits, by utilizing enhanced data collection and reporting capabilities for practices. Success will be measured through continued improvement in equitable health outcomes through the implementation of care management processes and the provision of a quality improvement support structure. In addition, primary care services will continue to be provided through 162 TCCN community practices who serve over 800,000 pediatric patients in the metro Atlanta area.

Through TCCN, Children's will support trainings for community physicians on health concerns that are better managed within the primary care setting. Children's will identify critical needs of community pediatric primary care providers to better support care and access.

Community need #9:
Programs to address health literacy

Description of Need

According to the AAP, one in four parents have low health literacy, which affects their ability to use health information to make health decisions for their child. The effects of low health literacy include poor nutrition knowledge and behaviors; higher obesity rates; increased medication errors; increased emergency department usage; and poor asthma knowledge, behaviors; and outcomes.[42] In the U.S., an estimated annual cost of $106 billion to $238 billion is due to low health literacy, which represents 7% to 17% of personal healthcare expenses.[43] In addition, caregivers with low health literacy and educational attainment are less likely to use patient portals, which has implications for quality of care and patient self-efficacy as many healthcare systems and providers support patient portals for engaging in healthcare.[44]



Low health literacy spans the state.[45] The map breaks down estimated health literacy scores of adults into four categories: below basic, basic, intermediate and proficient. Below basic scores represent adults who can locate information in simple text, like appointment times, but would struggle with information in more complex documents. Proficient adults, for example, can use a table to calculate an employee's share of health insurance costs. The map is a predictive model of health literacy using gender, age, race, ethnicity, language spoken at home, income, education, marital status, time spent in the U.S. and metropolitan statistical area, which are all highly correlated with health literacy levels.

One parent shared, "I can't always understand what the doctor is saying." Caregiver perceptions of healthcare include use of medical jargon and providers not listening to parent concerns. Caregivers also shared cultural issues affecting Spanish-speaking bilingual households. Caregivers cited that children prefer English and parents prefer Spanish, which can create discrepancies in sharing information with a provider. One caregiver discussed difficulty finding bilingual and interpreter services in the community. Language and cultural barriers prove difficult for parents and caregivers when advocating for their child's health.

Implementation Plan

Children's will continue to support health literacy initiatives for patients and families through employee training and learning opportunities, patient experience, patient safety, and teaching materials.

Children's will continue supporting the patient education process through assessments of patient and caregiver needs, planning and implementation of individualized education, and evaluation of patient and caregiver understanding using teach back. Children's offers multiple system-level training opportunities to support the patient education process, including patient care provider orientation for new employees, pediatric transition program for new graduate clinicians and adult care clinicians training to pediatric care and pediatric affiliations. Children's also offers an immersive Patient and Family Education Workshop that focuses on the patient education process and development and production of teaching materials. For children with complex diagnoses and home care, Children's will continue to support patient and family education through asthma educators, child passenger safety specialists, diabetes educators, discharge coordinators, patient teaching coordinators and pulmonary education specialists.

Children's will continue to assess patient resources for health literacy concerns. Children's utilizes readability formulas to ensure materials are written at the lowest reading level possible, including pictures, illustrations, large headings and information chunking. Families are offered interpretation and translation services when applicable, and teaching sheets are available in multiple languages.

Children's will continue to support our Family Experience Liaisons who provide support to our Emergency Department and inpatient families by helping families understand the hospital, the resources available and their child's plan of care; by facilitating conversations with providers; and by ensuring families' concerns are addressed. Children's will facilitate, coach and support quality improvement initiatives with providers to improve patient experience outcomes and to improve the family's understanding of the plan of care. The team uses interventions such as verbalizing the diagnostic journey to validate caregivers' chief complaint, discuss actions in diagnosing the child and avoiding the overuse of medical jargon to let caregivers better understand the diagnosis and the recommended plan of care. Another evidence-based intervention used by care providers in multiple care areas is a technique referred to as Commit to Sit during encounters. This technique is where providers sit face-to-face with families to help families feel engaged and heard. Evidence has shown that when care providers sit down with the families when discussing care, it alters family perception of the amount of time a caregiver spent with the patient in a positive manner. The patient experience quality improvement team also coaches caregivers to use the whiteboard for teaching or explaining the diagnosis (or to use an app like Simply Sayin', which was developed by a pediatric peer hospital). The quality improvement program of the patient experience team uses a evidence-based methodology called "Model for Improvement" to conduct these projects. The use of these interventions is measured rigorously against the patient experience survey and results are shared with the participating providers regularly.

Patient safety measurement includes health literacy through teaching materials and resources. Children's will prioritize education efforts to reduce healthcare-acquired conditions and rehospitalizations through patient-facing teaching materials addressing health literacy conditions. Children's utilizes family advisory and youth advisory councils during resource development to not only ensure understanding of safety-related materials but also to provide feedback on a variety of patient-facing teaching materials.

Children's will also continue to offer nurse navigation in the Atlanta community to families with predominantly low socioeconomic status. Nurse navigation services support parent and caregiver self-efficacy to both navigate the healthcare system and manage chronic conditions for their child(ren.) Nurse navigators regularly interact with families to help them understand medical diagnoses, make appointments and follow up on preventive care. The Ronald McDonald Care Mobile offers primary care services including health education, health checks, asthma care and sports physicals to children.

Community need #10:

Collaborate to address access to oral health services

Description of Need

Tooth decay and gum diseases are the most prevalent oral complications. In the U.S., tooth decay is four times more common than childhood asthma and seven times more common than hay fever.[49] If not treated, oral disease often causes pain and missed work or school days. One survey respondent wrote, "Poor oral health impacts overall health and school attendance." In Georgia, poor oral health is one of the leading causes of school absenteeism—20.3% of children in Georgia have not had a dental checkup in the past 12 months.[46] In 2016, 51.1% of third grade students had tooth decay, treated or untreated, and 19.1% of third grade students had untreated tooth decay in Georgia.[47] According to the National Survey of Children's Health, nearly 20% of children aged 1-17 years did not receive dental or oral health services in the previous 12 months from survey completion; 23.8% did not receive preventive dental care in the previous 12 months from survey completion.[48]

Availability and access to dental care in Georgia is limited. There is only 1 dentist per 2,064 Georgians and 1 dental hygienist per 1,656 Georgians, and there are 21 counties in the state that have no dentists.[2] A survey respondent shared, "I hear a lot of parents come in and say that their child has to go to Macon or Atlanta for special services or sometimes basic services." Another challenge that oral health faces in Georgia is the lack and insufficiency of insurance coverage. According to a survey conducted by the Georgia Health Policy Center in 2009, 41.5% of Georgians lacked dental insurance coverage.[49] Public insurance, such as Medicaid and PeachCare, is the primary resource for dental care in low-income households, but only 28% of Georgia dentists accept public insurance. Survey respondents most often identify access to providers as the main issue to address oral health in the community.

Oral health disparities exist within different subpopulations in Georgia. Children with low socioeconomic status have a 50% higher prevalence of tooth decay than children with higher socioeconomic status. Black non-Hispanic, Hispanic, and American Indian and Alaska Native populations generally have the poorest oral health of any racial or ethnic groups in Georgia. In the 2019-2020 National Survey of Children's Health, 15% of Hispanics and 18.6% of Black non-Hispanics had one or more oral health problems, such as toothaches, bleeding gums, or decayed teeth or cavities, compared to 9.3% of whites.[24]

Implementation Plan

Children's will continue to extend comprehensive dental services to patients ages 21 and younger with craniofacial disorders or other special medical needs. These services include preventive dental care, orthodontics, pit and fissure sealants, dental health education, restorative and surgical procedures, and sedation and general anesthesia services. Children's provides dental specialty services to children with cancer and blood disorders, craniofacial disorders, heart conditions, solid organ transplant recipients, facial cellulitis and trauma, select neuroscience conditions and select pulmonary conditions.

Through our community-based nurse navigation services in select early care centers, the nurse navigator helps coordinate preventive and specialty dental and oral health services for the families they serve. Because of limited resources, Children's does not plan to provide routine dental services for healthy children at this time. We will continue to pursue access to dental care services through community partnerships.


Children's
Healthcare of Atlanta

2020 – 2022 Implementation Update

Children's conducted its first CHNA is 2013, leveraging 67 community leaders in focus groups to identify the 10 most pressing needs for the Children's 18-county primary and secondary service area: including Fulton, Cobb, DeKalb, Gwinnett, Forsyth, Cherokee, Douglas, Clayton, Henry, Fayette, Hall, Paulding, Walton, Bartow, Newton, Rockdale, Carroll and Coweta. Children's conducted subsequent assessments in 2016 and 2019, surveying leaders from a diverse range of professionals to rank the pediatric health needs identified in 2013 while identifying new emerging issues. Children's actively addressed the identified top health needs through programs and services. The Egleston and Scottish Rite implementation plans placed special emphasis on the top four needs that align with our strategy:

- Ensure access to primary care medical homes for children and adolescents.
- Enhance access to behavioral and developmental health services for children and adolescents.
- Address childhood obesity.
- Ensure access to specialty care for children and adolescents.

Address access to primary care medical homes for children and adolescents

Children's 2020-2022 Implementation Plan

Children's will continue to provide primary care services at the primary care centers at Chamblee and Hughes Spalding and operate 404-785-KIDS (5437) to assist caregivers in determining appropriate levels of care for their children. Children's will also continue to support the Healthy Beginnings nurse navigator, who coordinates care through early learning centers across metro Atlanta.

The Children's Care Network (TCCN) will maintain its clinical integration status, which was achieved in 2016. TCCN will implement multiple new quality improvement programs and enhance data collection and reporting capabilities for practices within The Children's Care Network. Success will be measured through the number of Children's Care Network primary care provider members and the expansion of quality improvement. In addition, primary care services will continue to be provided through 143 community practices within The Children's Care Network.

Through TCCN, Children's will support trainings for community physicians on health concerns that are better managed within the primary care setting. Children's will identify critical needs of community pediatric primary care providers to better support care management.

Progress and Accomplishments

In 2019, Children's entered into an agreement with Mercy Care, a federally qualified health center, whereby Children's is responsible for staffing pediatric providers and ensuring appropriate protocols are followed to provide quality pediatric health services for infants, children and adolescents. Mercy Care currently offers integrated primary care and behavioral health services, child and adolescent psychiatry, on-site X-ray and ultrasound, dental and vision care, health education, and bilingual providers.

Hughes Spalding is a hospital managed by Children's for Fulton-Dekalb Hospital Authority. In addition to being an acute care hospital with a full-service Emergency Department and inpatient beds, Hughes Spalding provides primary care services. Between 2020 and July 2022, the Hughes Spalding primary care clinic managed 47,173 visits and 15,453 patients. Hughes Spalding serves as the medical home for children in foster care and in custody of the Georgia Division of Family & Children Services.

785-KIDS is a 24-hour service that helps caregivers determine appropriate levels of care for their children and helps bridge the gap for patients without access to a pediatrician. It is staffed by specially trained pediatric nurses with an average of more than 15 years of telephone triage experience. The nurse advice line provides patients with access to skilled pediatric nurses, who give home care advice or advise patients to seek a higher level of care when needed. The team also provides care management services, including registered nurses dedicated to patients with concussions and diabetes. Children's fielded 68,633 calls in 2021 from parents across Georgia.

Children's supports a nurse navigator based in an early learning center serving children between the ages of six weeks and four years old. The essential pillars of the work include health navigation and care coordination, health education, community partnerships, multidisciplinary care, behavioral health and social-emotional development, data collection and evaluation. The nurse navigator helps families access care and obtain follow-up care with the medical home after urgent and emergency care visits. In addition, the nurse navigator helps to reduce families' barriers to accessing care by arranging transportation, requesting interpreters, connecting families with health insurance navigators or even accompanying them to visits. Between 2020 and 2022, the nurse navigator supported over 500 children and their families, engaged in over 4,200 health navigation visits, and organized health education sessions for nearly 750 parent attendees. Children's expanded the nurse navigation program in 2022 to offer services through the YMCA of Metropolitan Atlanta at two early learning centers based in Atlanta's westside community.

In response to COVID-19, Children's assessed the pandemic's impact on the pediatrician landscape, identified the most immediate challenges and deployed targeted solutions to help pediatricians in their time of need. Together with TCCN, Children's hosted webinars and developed guidelines and tip sheets on several relevant topics for pediatricians during these unprecedented times:

- Navigating the Coronavirus Aid, Relief, and Economic Security (CARES) Act and applying for Paycheck Protection Program (PPP) funds.
- Sharing care management guidelines and best practices to ensure patient and provider safety.
- Developing telemedicine best practices and reimbursement guidelines.
- Answering common questions related to HR concerns.
- Employing marketing strategies focused on reminding parents of the importance of maintaining their child's well visits, vaccination schedules and sports physicals.
- Developing "reopening" strategies for pediatricians: outlining best practices; identifying how to make sure families feel confident coming back to their offices; and how to manage staffing, scheduling and PPE as their volumes begin to increase.

In addition, TCCN and Children's partnered to identify a telemedicine vendor that could be rolled out across the whole network. This provided immediate relief to most practices who are new to telemedicine while also opening the door to future opportunities for TCCN to collaborate on one platform.

TCCN maintained its clinical integration status, which was achieved in 2016. The Children's Care Network implemented new quality improvement programs and enhanced data collection and reporting capabilities for practices within The Children's Care Network. TCCN focused on five key areas of quality initiatives: asthma, adolescent well visits, concussion, behavioral health and sub-specialty care. As part of the asthma quality improvement initiative, primary care pediatricians increased Asthma Action Plan utilization from 19% at year-end 2018 to 25% at year-end 2019, reduced median in-patient admit rates for TCCN-attributed asthmatics by 17.1% between 2017 and 2019, and lowered Emergency Department utilization for asthmatics by 42% between 2017 and 2019 by highly engaged TCCN providers. TCCN supported adolescent well visits by meeting targets for five contracted metrics set in 2019, as well as by using well visits as the a major focus for COVID-19 practice recovery strategy. Through the concussion quality initiatives, TCCN saw a reduction in the number of children and adolescents who returned to an Emergency Department or Urgent Care Center for a second visit for concussion.

Behavioral health quality initiatives primarily focused on improvements in depression screenings. TCCN members improved their depression screening rate from 61% in 2018 to 81% in 2020. TCCN supported 429 primary care pediatric providers, with an additional 884 pediatric specialty providers.

Collaboration to enhance access to behavioral and developmental health services for children and adolescents

Children's 2020-2022 Implementation Plan

Children's commits to helping to reduce stigma and enhance access to prevention, diagnosis and treatment services for children and adolescents. Children's will continue to provide inpatient and Emergency Department psychiatric consultations and select outpatient behavioral and developmental health services through various service lines.

Building on the success of Strong4Life, Children's expanded community programming to include behavioral and mental health prevention work. The aim is twofold: Improve resiliency in children and reduce the stigma of mental and behavioral health. Children's commits to bringing evidence-informed programs to healthcare providers, schools, community organizations, and early care and education centers. The programs will address emotional wellness in children through training and education for key influencers of children while equipping influencers, parents and caregivers with the tools and resources to support resilience-building strategies in children.

Children's will continue to offer comprehensive services and evidence-based treatments for children said to be on the autism spectrum through Marcus Autism Center. Marcus Autism Center will continue to provide clinical services through the Diagnostic Assessments Clinic, Severe Behavior Program, Pediatric Feeding Disorders Program, and Language and Learning Clinic, as well as through educational programs, outreach clinics and support services. Additionally, Marcus Autism Center will further incorporate research findings into clinical practice and extend these findings into the community and naturalistic setting.

Children's will continue the behavioral health educational initiative focused on building a primary care network to address behavioral health needs. The effort includes a three-pronged approach:

- **Better access to behavioral health expert advice:** Children's will continue service and awareness of the behavioral health expert advice line.
- **Increasing community provider knowledge and comfort with primary behavioral healthcare:** Children's will continue the Behavioral Health Education Boot Camp to ramp up educational offerings for providers to help them diagnose and treat patients with mental and behavioral health issues. Multiple behavioral health-focused lectures and seminars will be included in the Children's Grand Rounds series, CME series and evening community educational offerings. Focused symposia in behavioral health are now part of the major pediatric provider conference in Atlanta, with Children's support. Behavioral health topics will continue to be integrated into all 2020-2022 activities.
- **Access to online educational resources in one place:** Children's will continue supporting the physician website to serve as an online resource center with behavioral health resources, links to related behavioral health organizations, questionnaires for assessing patient depression and anxiety, family education materials, and upcoming educational opportunities.

Children's will continue to provide psychoeducational testing for children with learning, attention, and emotional/behavioral problems through a program that is part of Emory's Partners for Equity in Adolescent and Child Health (PEACH) program within the department of pediatrics. PEACH has a behavioral health coordinator who provides behavioral health screening and referral services at Hughes Spalding. Children's will place a special emphasis on building partnerships to better treat children who suffer from behavioral health issues when they are receiving care in our system.

Progress and Accomplishments

Children's committed to being a leader and partner in building a pediatric behavioral and mental health ecosystem that improves outcomes, reduces stigma, and enhances access to prevention, diagnosis and treatment. Our focus was on four areas:

- Innovate behavioral and mental health care
- Transform access
- Pioneer prevention
- Build a strong foundation

Innovate Behavioral and Mental Health Care

Children's continued to provide inpatient and Emergency Department psychiatric consultations and select outpatient behavioral and developmental health services through specific medical clinics. In our Emergency Departments, we equipped our staff to deliver enhanced and effective care for our patients through de-escalation training, and our leaders continued efforts with our partners in the community to streamline admissions processes to more efficiently connect kids with the care they need. Over 3,700 users completed the de-escalation training, and nearly 800 learners completed suicide prevention training by year-end 2020. Children's also hired Behavioral and Mental Health (BMH) Nurses, Tech and leaders to provide additional BMH expertise and support.

Children's continued to offer comprehensive services and evidence-based treatments for children with ASD through Marcus Autism Center. Marcus Autism Center provided clinical services through the Diagnostic Assessment Clinic, Medical Clinic, Severe Behavior Program, Pediatric Feeding Program, and Language and Learning Clinic as well as through educational programs, outreach clinics and support services. In addition, Children's implemented a crisis admission liaison program in the Emergency Department.

Transform Access

Children's continued the behavioral and mental health educational initiative focused on supporting our primary care network to address the behavioral and mental health needs of the community. The effort includes a three-pronged approach:

- **Better access to behavioral and mental health expert advice:** Children's continued service and awareness of the behavioral and mental health expert advice line. Providers reached out primarily for medication management and referral advice. Children's continued to facilitate connections between community behavioral and mental health providers and primary care practices through a referral database, which offered providers referral resources within their communities to families in need. The referral database housed over 700 providers with information about location, specialties, certifications, therapeutic approaches,insurance, telehealth, language, etc.
- **Increasing community provider knowledge and comfort with primary behavioral and mental healthcare:** Children's offered training directly to the primary care community through Project ECHO, which is a virtual hub-and-spoke training model that delivers teaching and learning through lectures, peer reviews, case studies and discussion. We used this tool to reach and support our pediatricians while building their skills and confidence and fostering a community for information sharing and discussion. These interactive webinars covered topics including screening for depression, discussing depression with parents and families and pediatric suicide.

  Children's piloted a referral packet to provide connections between a child's primary care pediatrician and behavioral and mental health provider. The referral packet collects treatment recommendations from the behavioral and mental health provider to better equip primary care pediatricians to co-manage behavioral and mental health concerns.
- **Access to online educational resources in one place:** Children's continued to build a physician website to serve as an online resource center with behavioral and mental health resources, links to related behavioral and mental health organizations,questionnaires for assessing patient depression and anxiety, family education materials, and upcoming educational opportunities.

Pioneer Prevention

Child Advocacy's behavioral health prevention model addresses risk exposure through increasing parental awareness of resilience-building strategies in children, as well as education around evidence-informed coping strategies. In 2020, Children's Strong4Life introduced evidence-informed programming to healthcare providers, schools, and early care and education centers. Each program focused on equipping key influencers and caregivers with resilience-building strategies for children; normalizing conversation around emotional wellness; and recognizing how awareness, identification, expression and management of feelings influence emotional development. To reinforce and build on skills from initial provider trainings, Strong4Life offered a series of additional skill-building trainings, taking a deeper dive on coping skills and effective communication strategies to equip providers with the knowledge needed to reinforce coping techniques with the families they treat.

In 2020, Child Advocacy adjusted behavioral and mental health offerings to virtual formats and added deep-dive webinars to support clinicians, reaching nearly 300 clinicians to date. These trainings have been successful, with nearly 94% of providers reporting high confidence in the ability to help parents build emotional wellness and resilience in their children, up from 28% before the training. Additionally, to meet the needs of families during the pandemic, Children's updated our behavioral and mental health provider lists to reflect those 612 providers offering telehealth services.

In an effort to reach children earlier in life, Children's piloted and expanded resilience trainings in early learning centers throughout metro-Atlanta. In 2021, we aimed to identify opportunities for community expansion and implemented our resiliency training in the faith-based community. We launched our faith-based pilot at two Methodist churches, one mosque and one synagogue.

In partnership with Kohl's, Children's created 6 videos aimed at helping parents raise resilient children, recently posted on Strong4Life.com. After watching the videos, 94% of parents surveyed reported having a new way to support their child's emotional wellness; knowledge of resilience-building strategies increased after watching the video series. Approximately 88% of parents reported being likely to visit Strong4Life.com to watch additional videos and learn more about resilience. Strong4Life launched a multiyear campaign, Raising Resilience, in the first quarter of 2022.

Build a Strong Foundation

A strong foundation enabled our leadership to champion the long-term systemic changes needed to transform the pediatric Behavioral and Mental Health ecosystem. In 2020, Children's implemented technology solutions to support BMH data collection, access and distribution, to support improved whole-child care. This initiative created impactful enhancements to the electronic medical record (EMR) that increased discreet data capture and improved access to BMH information across the system. In the first month after implementing these new tools, calming techniques, which aim to provide a preferred environment for the patient such as dim lights, music or soft voices, were documented for over 7,000 patients. We also created over 60 new "coping plans," which are summaries of a child's behavioral concerns, communication abilities, stressors and calming techniques. Children's also hired a Behavioral and Mental Health Chief in 2022, responsible for refining and delivering upon the strategy and vision, balancing all three aspects of the mission: Clinical, Academic & Research. The Chief will be:

- A strong clinical leader who optimizes clinical care results for children and families, drives quality, patient safety and operational excellence
- A strong academic leader who understands and prioritizes the value of training the next generation of clinicians and researchers to focus on whole-child wellness
- A strong research leader who collaborates with other leaders in the field and advances the understanding and treatment of behavioral and mental health conditions for the pediatric population

Programs to reduce childhood obesity

Children's 2020-2022 Implementation Plan

Children's continued its commitment to lead Georgia in the effort to reduce the number of children and adolescents with excess weight and obesity. Through clinical care, education and community outreach, Children's committed to investing and expanding evidence-based programs and services to children in Georgia with the goal of changing obesity trends in the state.

Progress and Accomplishments

For the past 11 years, Strong4Life has been focused on reducing the prevalence of childhood obesity through prevention and treatment initiatives for kids and those who influence their lives. Strong4Life impacts children and families through programs and community partnerships designed to deliver consistent messaging and support that bring about sustainable lifestyle change.

To date, Strong4Life has trained over 4,000 healthcare providers throughout Georgia. Over the past three years, over 4,200 key influencers, including healthcare providers, individuals in the community, early care professionals, educators, school nurses, clinic assistants, cafeteria employees and school nutrition managers, have attended Strong4Life trainings to gain evidence-based, actionable information to support their local communities. Strong4Life worked with over 350 clinicians and 691 schools and early care centers from 2020-2022. Ultimately, Strong4Life has reached over 1.5 million children through its programs and initiatives.

In 2020, due to COVID-19, we adjusted our obesity prevention training curriculum to a virtual format. Virtual trainings such as Early Feeding in Early Care, Healthy Habits: Communication is Key and Creating a Healthy Environment in ECE have been conducted in schools and early care centers, with Motivational Interviewing and Early Feeding being conducted for clinicians. With increased concern over access to nutritious foods during quarantine and challenges with the new school year, Strong4Life hosted two webinars: Child Hunger: How Clinicians Can Help, and Early Feeding and Increased Risk of Child Hunger in Georgia: How Schools Can Help. These webinars were designed to assist clinicians and other key partners such as school nurses, school social work staff, school counselors and educators to increase awareness and provide resources to assist with accessing food for students in need. Additionally, we continued to promote healthy habits by training multiple community organizations, including youth-serving organizations and camps.

Children's continued to work to reduce the prevalence of children with obesity through Strong4Life's many programs:

- The Strong4Life Clinic, created specifically for patients in the 95th percentile and above, is composed of a specialized, multidisciplinary team dedicated to providing families with achievable, personalized physical activity and nutrition goals. In 2020, the clinic transitioned a new surgeon for pediatric bariatric surgery. Between 2020 and 2022, the clinic reached over 900 unique patients, conducted a total of 2,771 visits and performed 49 bariatric surgeries. The Strong4Life Clinic has reached over 4,500 patients since inception.

- Children's has also hosted Camp Strong4Life, where kids 8 to 12 years old with a body mass index (BMI) greater than the 85th percentile spend a week with physicians, nutritionists and exercise physiologists learning to set healthy goals and incorporate them at home. A total of 193 children have attended Camp Strong4Life across the summers of 2020, 2021 and 2022, learning about goal setting and healthy habits to share with their families. In response to COVID-19, the first ever Virtual Camp Strong4Life launched in 2020 with 80 registered participants. Virtual Camp Strong4Life consisted of both live and on-demand content. Parents engaged with daily emails and a Facebook group to share Strong4Life content related to their children's daily activities.

- The Strong4Life provider programs focus on motivational interviewing techniques for healthcare providers that promote behavior change and early feeding to equip parents and caregivers with tools to keep their children healthy from the start. The Early Feeding Program was revised with new content, materials and resources for both providers and parents with evidence-informed feeding techniques for children. We also developed a board book series reinforcing healthy behaviors for children through our Early Feeding program. In 2021 alone, Strong4Life distributed 51,300 board books and 15,500 newborn kits to community pediatricians.

- Children's expanded our efforts to early care and education centers. In early 2021, we developed and launched an online, on-demand training in English and Spanish for early care and education providers, Feeding Infants: Developmentally Appropriate Foods and Feeding Practices, and encouraged dissemination of our on-demand training through our ECE partners. Throughout 2021 and 2022, we developed both a broad-scale training and an intensive program in early care centers to support ECE professionals with strategies to Raise Healthy Eaters. In 2022, we piloted a new offering, Building Intentional Play into the Day. Children's continued to partner with the Georgia Department of Early Care and Learning, Georgia Farm to School and Early Care,and other key stakeholders throughout Georgia to support obesity prevention efforts in early care.

- Strong4Life remains closely connected with our school partners and has engaged with over 1,800 schools since inception. Although schools closed their doors in March 2020 due to the COVID-19 pandemic, our School Nutrition program remained essential. School meal programs across the state were an important resource for kids and their families. Meal pickup and delivery programs reached students in areas of greatest need and at the most risk for food insecurity. In partnership with school nutrition state leadership, including the State Director of Nutrition and academic nutritionists, we continued to promote access to nutritious foods for Georgia's children. Strong4Life Challenge, a school-based program that teaches elementary school children about the importance of good nutrition and physical activity, operated virtually throughout the 2020-2021 school year. For the 2021-2022 school year, we offered a hybrid program with both in-person and virtual visits.

- Strong4Life collaborates with organizations, such as the YMCA of Metro Atlanta, Children's Museum of Atlanta, Big Brothers Big Sisters of Metro Atlanta, and Georgia Recreation and Parks Association, to develop grassroots efforts and solutions that are tailored to the needs of local communities. Most community events halted in 2020-2021 due to COVID, but more recently, Strong4Life has reengaged partners to participate in community events reaching over 700 participants.
- Strong4Life continued partnerships in the out-of-school time space, including a multi year collaboration with the Georgia Statewide Afterschool Network to support the quality standard of health and well-being. In 2021 and 2022, Strong4Life served as the technical expert for the health and well-being coaching cohort to support selected organizations with improving wellness in their programs. In addition, in 2022, Children's developed a 5-part webinar series and initiated a health and well-being toolkit to be shared statewide.

Ensure access to specialty care for children and adolescents

Children's 2020-2022 Implementation Plan

Children's Physician Group has grown to include more than 475 doctors and 270 advanced practice providers providing care in more than 35 specialties across metro Atlanta. Children's will continue to look for opportunities to provide care closer to patients—with additional sites of service—develop partnerships and employ physicians to better meet the specialty care needs of children and adolescents.

Progress and Accomplishments

- **Access:** enhancements to 785-KIDS and 785-DOCS are in progress, working to decrease wait times for identified CPG practices
- **Behavioral and Mental Health:** Children's has named John N. Constantino, MD, the new Chief, Behavioral and Mental Health, effective August 1, 2022. In his new role, Dr. Constantino will lead the Children's effort to change the landscape of Behavioral and Mental Health for Georgia's children and adolescents in the face of this growing epidemic.
- **Arthur M. Blank Hospital:** We're building a new hospital campus that will provide advanced care for kids today and for generations to come. The Arthur M. Blank Hospital, slated to open in 2025, is part of this transformative project, that will be a huge leap forward in how we care for Georgia's kids. Designed to take advantage of research-proven healing views of nature, the 1.5 million-square-foot hospital will include one tower with two wings and additional operating rooms, specialty beds and diagnostic equipment to meet anticipated patient needs. There also will be space for clinical research, clinical trials and overall patient care.
- **Douglasville:** Children's Orthopaedics and Sports Medicine will be opening a new clinic in Douglasville in September 2022. The new location will allow us to offer orthopedics and sports medicine services to children and teens in Douglas and surrounding counties five days per week.
- **Research:** Advancing pediatric research and innovation, Children's, Emory University School of Medicine Department of Pediatrics along with other metro Atlanta partners, are proud of the achievements we've accomplished together and look forward to the future. Researchers at Children's and Emory have shown what it takes to combat a pandemic. Unprecedented discoveries in COVID-19 have had a global impact while our standard research program has continued to achieve significant milestones.

Programs to support access to health services that address adolescent issues

Children's 2020-2022 Implementation Plan

Children's continues to operate an adolescent health clinic at Hughes Spalding, with a psychologist, nurse practitioner, social worker and counselor on staff supporting teens by talking about their health with them and their parents or guardians. We provide appointment-based primary and specialty care for concerns of the teenage years, including development, puberty, contraception and eating disorders. Because teens may be embarrassed to have an exam or talk about some things in front of their parents, we give all teens a chance to be seen privately and offer flexible hours to improve access. Teens can be referred from across the Children's network to the clinic.

Children's commits to community programming through the Stephanie V. Blank Center for Safe and Healthy Children to address adolescent issues such as child abuse, sex trafficking, internet safety and child neglect. Children's also targets marketing resources to address adolescent health issues such as teen driving safety and water safety.

Progress and Accomplishments

The adolescent health clinic at Hughes Spalding saw more than 1,300 adolescents between the ages of 13 and 21 in 2020, more than 1,700 adolescents in 2021 and 931 adolescents through June 2022 with most teens seeking health checks and consultations.

In 2020, the Stephanie V. Blank Center for Safe and Healthy Children continued to support child protection efforts with an emphasis on statewide sex trafficking prevention. By 2020 year end, the Stephanie V. Blank Center for Safe and Healthy Children saw 1,585 patient visits (1,486 unique patients). Further, the team hosted multiple webinars, providing expert advice for educators and youth-serving organizations. In 2020, we reached 377 students and 1,142 school staff with sex trafficking messaging and 4,421 key stakeholders with awareness-based messaging. In 2021, child protection webinars providing expert advice trained 77 clinicians. The Strong4Life team published its first article, Child Trafficking: Know the Signs and How to Help and developed multiple social media posts about human trafficking. In 2022, child protection and commercial sexual exploitation of children (CSEC) webinars reached 746 stakeholders through June. Strong4Life supported the work of child protection by promoting relationship-building activities during Child Abuse Prevention month through four social posts on media channels resulting in over 510k impressions and 9k engagements. We continue to promote webinars through a dedicated child protection newsletter with almost 2,000 subscribers.

Programs to raise awareness for asthma, allergies, and respiratory issues

Children's 2020-2022 Implementation Plan

Children's is committed to reducing the prevalence of asthma and the number of emergency room visits caused by asthma. Children's will continue the High-Risk Asthma Program at Scottish Rite, Egleston, Hughes Spalding and patient clinics, as well as the Asthma Center at Hughes Spalding. In addition, Children's will continue to provide medical care to children at metro Atlanta elementary schools through the Ronald McDonald Care Mobile. Children's will continue offering education to patients, caregivers and school staff about asthma triggers and management. In addition, physicians will be provided with standardized tools to improve asthma action plans so that they can better provide care to asthma patients and their families

Progress and Accomplishments

The Asthma Center at Hughes Spalding addresses the needs of the whole patient by providing access to clinicians, asthma educators, social workers, financial counselors, public health partners and Health-Law Partnership (HeLP) attorneys to improve asthma control and address the many barriers to quality care.The Asthma Center reached almost 1,000 unique patients in 2020 and more than 1,000 in 2021.

The Ronald McDonald Care Mobile is a collaborative between Children's Healthcare of Atlanta and Atlanta Ronald McDonald House Charities and is an outreach program of the Children's Asthma Center at Hughes Spalding. The Care Mobile builds upon the expertise and existing partnerships established by the Asthma Center, leveraging its resources and adding others to deliver services directly to high-risk children in their own communities. In 2020, the Care Mobile reached over 900 unique patients and in 2021, reached over 1,300 unique patients. The focus of the Care Mobile shifted in 2022 to offer primary care services including health education, health checks, asthma care and sports physicals to children and have seen 254 unique patients through June 2022.

Collaboration with schools to coordinate care for primary and chronic health issues

Children's 2020-2022 Implementation Plan

Children's will continue to work with schools and school health professionals to coordinate approaches for addressing primary and chronic health issues to reduce missed school days.

Progress and Accomplishments

Children's partnered with schools throughout Georgia to support primary and chronic health issues. The following programs and services were offered to keep kids healthy and reduce absenteeism:

- The Children's regional school health coordinator provided training, education, technical assistance, and communication on clinical pediatric topics and serves as a contact for school health professionals
- The Georgia School Health Resource Manual was available for free online or hard copy
- Children's Asthma Management Education Program
- Scoliosis Screening Program
- Diabetes community education
- Educational Outreach Program at Marcus Autism Center
- Athletic injury prevention
- Project S.A.V.E.

Programs to address injury and illness prevention

Children's 2020-2022 Implementation Plan

Children's will continue its community work in injury and illness prevention through statewide programming and marketing campaigns. Through Safe Kids Georgia, Children's continues to support injury prevention education, enforcement and safety equipment distribution for Georgia's children. Additionally, Children's will continue to support the mission of the Children's Injury Prevention Program (CHIPP) to provide a multidisciplinary approach to reduce childhood injury, both unintentional and intentional in the greater Atlanta area through evidence-based injury prevention programs, research, education and community outreach. Further, Children's will continue to support Project S.A.V.E. to offer CPR and AED training throughout the state. These programs will combine with targeted marketing efforts to increase awareness.

Progress and Accomplishments

Children's addresses the top causes of death among children from birth to 19 years of age through preventing unintentional injuries, such as drowning, sudden unexpected infant death (SUID) and motor vehicle crashes. From 2020 to 2022, we extended our injury and illness messaging to include a campaign focused on child passenger safety, as well as building efforts in water safety and safe sleep. Additionally, we raised awareness around summer safety and safe storage of firearms.

We continued to promote our injury and illness prevention work through various social and traditional media channels, our dedicated website and community partnerships.

Programs to coordinate transition of care for individuals with chronic health issues from adolescence to young adulthood

Children's 2020-2022 Implementation Plan

Children's will continue to collaborate with Emory University, Grady Hospital and other adult hospitals to provide programs and services to coordinate the transition of care from adolescence to young adulthood.

Progress and Accomplishments

Children's offered multiple webinars and sessions about transition of care to adult hospitals and providers for patients with:

- Cystic fibrosis
- Congenital heart disease
- Cancer
- Sickle cell
- Transplants (liver, kidney, heart)

These offerings included information about college resources, mental wellness, financial planning and insurance, community resources and life after high school. Participants were also able to virtually tour adult facilities. Children's also offered its Taking Diabetes to College course for children with Type 1 diabetes transitioning into young adulthood.

Programs to address the health needs of immigrants and transient populations

Children's 2020-2022 Implementation Plan

Children's will continue to provide programs and services to improve the quality of healthcare provided to immigrant and transient populations in the community, including:

- Interpretative services as needed within the hospital
- English and Spanish teaching sheets on patient care and medication
- Website translations into Spanish, when feasible
- Cultural competency training for staff, including information on 18 different cultures

Children's will continue to operate the Primary Care Center at Chamblee and Children's will provide primary care to children through a new partnership with Mercy Care, a federally qualified health center offering child and adult primary care predominately to immigrant and transient populations.

Progress and Accomplishments

Children's continues to offer interpreting and translating services when applicable and teaching sheets available in multiple languages. Children's has a highly qualified, certified team of interpreters and translators who work with doctors, nurses, family service personnel and other healthcare team members. These specialists serve as advocates for our patients and their families and help them with diagnosis, discharge, treatment plans, medical consent forms and other communication needs. Services include Spanish and other foreign language interpreters, phone interpreters, sign language interpreters, written translations and cultural resource support. Children's also offers Pacific Interpreters, which is a telephone service available 24 hours a day to provide interpretation in more than 150 different languages.

The Strong4Life website provides community-based evidence-informed programs, education, and awareness to promote healthy habits for Georgia's families. Strong4Life offers a Spanish-version of the website with culturally-informed content vetted by Spanish-speaking dieticians and mental health professionals. Strong4Life also developed a board book series through the Raising Healthy Eaters program, which is written in both English and Spanish. The catalog of Strong4Life resources available to families, schools, and early education centers have been translated into Spanish.

The Primary Care Clinic at Chamblee closed in February 2020. However, Children's maintained its partnership with Mercy Care, which offers pediatric primary care to primarily immigrant and transient populations. The staff at Mercy Care are bilingual in English and Spanish. Mercy Care offers extended hours and accepts walk-ins to accommodate the work and transportation needs of the large immigrant community near Chamblee/Brookhaven in Atlanta. A full-time social worker is available and dedicated to providing education, support and coordination to families that visit the practice.


MSA

Appendix A: Contributor Acknowledgments

2022 CHNA Survey Participants and Key Informant Interviewees

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Appendix B: Children's Resource Inventory

Healthcare Services

Children's provides primary care services at two locations: the Primary Care Center at Chamblee and the Primary Care Center at Hughes Spalding. In addition, through its clinically integrated network, The Children's Care Network, primary care services are provided through 160 community practices in Georgia.

The Children's Care Network: The Children's Care Network was officially incorporated in 2014 and recruitment began in 2015. As of July 2019, The Children's Care Network has recruited nearly 1,300 members, including 442 primary care providers.

The Children's Care Network is the foundation for metro Atlanta primary care pediatricians and specialists to work together to define, refine, and demonstrate improved quality and outcomes under the umbrella of a Clinically Integrated Network. Since 2014, The Children's Care Network has created a robust quality program, including the development and implementation of primary care core measures focusing on HEDIS and other preventive services, concussion, depression, asthma, and obesity. Clinical integration supports the medical home by bringing together all of the key providers—primary care physicians, specialists, ED and inpatient providers—through data-sharing, focused quality improvement initiatives and better coordination across the care continuum, to enable primary care physicians to better manage the healthcare needs of their patients. **Contact: 404-785-7935.** tccn-choa.org

The Primary Care Center at Chamblee is a service of Children's, providing primary care for children from birth to age 18. Primary care doctors at the Children's Primary Care Center at Chamblee enable access to continuity and coordination of quality pediatric health services for infants, children and adolescents who primarily rely on Medicaid. In 2018, the center managed 16,937 visits and 6,164 patients. The Primary Care Center of Chamblee is located at 4166 Buford Highway NE. **Contact: 404-785-KIDS (5437).** choa.org/locations/childrens-at-chamblee-primary-care-center

Hughes Spalding is a hospital managed by Children's for Fulton-Dekalb Hospital Authority. In addition to being an acute care hospital with a full-service Emergency Department and inpatient beds, Hughes Spalding provides primary care services for children and adolescents. In 2021, the primary care center managed 19,792 visits and 10,061 patients Hughes Spalding is located at 35 Jesse Hill Jr. Drive SE. **Contact: 404-785-KIDS (5437).** choa.org/locations/hughes-spalding-hospital

In addition to its primary care provision through The Children's Care Network, Children's at Mercy Care and Hughes Spalding, Children's offers services to its patients to coordinate care and enhance ease of access for parents and patients.

The Judson L. Hawk Jr., MD, Clinic for Children is a service of Children's and offers multispecialty outpatient treatment for children with a wide range of conditions. By housing all outpatient services together, families are able to receive comprehensive care for children with complex medical issues at this location. Specialists provide services to patients and families in one appointment, reducing the number of school and work absences. The Judson Hawk Clinic provides access to continuity and coordination of quality pediatric health service for infants, children and adolescents with complex medical issues. The Judson Hawk Clinic is located at 1400 Tullie Road NE. **Contact: 404-785-KIDS (5437).** choa.org/locations/childrens-medical-office-building

The **Center for Advanced Pediatrics** opened in 2018 to bring complex care specialists, modern technology, and advanced research for outpatient pediatric care under one roof. Children's offers services including aerodigestive, allergy and immunology, asthma, cardiac, cerebral palsy, cystic fibrosis, developmental progress, diabetes, endocrinology, feeding, gastroenterology, general and thoracic surgery, genetics, gynecology, infectious disease, interventional radiology, medically complex care, multispecialty clinics, nephrology, neurogastroenterology, neurology, neurophysiology, neuropsychology, orthopedics and sports medicine, orthotics and prosthetics, otolaryngology, pain relief, pelvic and anorectal, physiatry, pulmonology, rheumatology, sleep disorders, Strong4Life, and vascular anomalies clinic. The Center for Advanced Pediatrics is located at 1400 Tullie Road NE. **Contact: 404-785-KIDS (5437).** choa.org/locations/center-for-advanced-pediatrics

404-785-KIDS is a 24-hour service that helps caregivers determine appropriate levels of care for their children and can help bridge the gap for patients without access to a pediatrician. It is staffed by specially trained pediatric nurses with an average of more than 15 years of telephone triage experience. The nurse advice line provides patients with access to skilled pediatric nurses, who give home care advice or advise patients to seek a higher level of care when needed. The team also provides care management services, including registered nurses dedicated to patients with concussions and diabetes. **Contact: 404-785-KIDS (5437).**

The **Health Navigator** works in early learning centers serving children between the ages of six weeks and four years old. The nurse navigator is part of a community-based model that integrates child health services and early childhood education to do our part to help young children stay healthy, develop on track, and thrive socially and emotionally in order to achieve academic success.

The essential pillars of the work are:

- Health navigation and care coordination
- Health education
- Community partnerships
- Multidisciplinary care
- Behavioral health and social-emotional development
- Data collection and evaluation

The health navigator helps families access care and obtain follow-up care with the medical home after urgent and emergency care visits. In addition, the health navigator helps to reduce families' barriers to accessing care by arranging transportation, requesting interpreters, connecting families with health insurance navigators or even accompanying them to visits. Families are provided with individualized health education on topics such as the American Academy of Pediatrics periodicity schedule of well-child visits, Centers for Disease Control and Prevention (CDC) immunization schedule, developmental milestones and chronic condition management to support parent knowledge, encourage timely well child visits and facilitate parent engagement at the medical home.

Children's Specialty Services is managed by the Children's Physician Group, one of the largest pediatric multispecialty physician practices in the Southeast. Children's has 35 pediatric specialties and programs and more than 500 physicians and 350 advanced practice providers. All Children's specialists accept and serve Medicaid patients. Children's offers access to pediatric subspecialists across 25 neighborhood locations in Atlanta and surrounding communities. Pediatric specialists are available to patients and healthcare providers through telemedicine, offering remote consultations, evaluations, and training.

Children's specialties include:

- Allergy and Immunology
- Anesthesia
- Apnea
- Cardiothoracic Surgery
- Child Advocacy
- Critical Care
- Cystic Fibrosis
- Diabetes and Endocrinology
- Emergency Medicine
- Gastroenterology
- General Surgery
- Gynecology
- Hematology/Oncology
- Hepatology
- Hospitalists
- Infectious Diseases
- Interventional Radiology
- Neonatology
- Nephrology
- Neurology
- Neuropsychology
- Neurosurgery
- Orthopaedics and Sports Medicine
- Otolaryngology (ENT)
- Pathology
- Physiatry
- Plastic Surgery
- Primary Care
- Psychiatry
- Pulmonology
- Radiology
- Rheumatology
- Sedation Services
- Sleep
- Transplant
- Urgent Care

For a full list of Children's specialties and locations, please call 404-785-KIDS (5437) or visit choa.org/medical-services/childrens-physician-group

Georgia Partnership for Telehealth (GPT): In collaboration with the GPT, Children's is able to improve access to pediatric specialists throughout Georgia with its Telemedicine Program. With 15 specialists and 80 presenting sites in Georgia, this program uses specialized high-definition cameras to allow specialists to provide consultations and evaluations for patients in communities with limited access to services. From 2016 to 2018, GPT subspecialists provided 1,152 visits to children across the state, and the program had 646 healthcare professionals participate in distance learning and outreach offerings. Access is provided to the following subspecialty areas: aerodigestive, ASD, child protection, hepatology, nephrology, pulmonology, sports medicine and concussion. gpth.org

Behavioral and Mental Health Resources

Marcus Autism Center

For children with autism spectrum disorder, Marcus Autism Center offers specialty services and evidence-based treatments to approximately 5,000 children each year within its walls and impacts at least 5,000 additional children in the community. Marcus Autism Center offers clinical services, educational programs, outreach clinics, support services and access to one of the largest healthcare teams dedicated to child development in Georgia. As a National Institutes of Health Autism Center of Excellence, Marcus Autism Center serves as a community resource for parents and children across Georgia, and is one of the largest and most comprehensive centers in the country for the diagnosis and treatment of ASD and related disorders. Marcus Autism Center actively collaborates with the Georgia Department of Public Health's Babies Can't Wait Program, Georgia's Department of Early Care and Learning's program Bright from the Start, and Head Start programs locally and nationally. Marcus Autism Center also collaborates with 1,700 Children's community physicians and the Kids Health First Pediatric Alliance in metropolitan Atlanta. Strategic alliances enable Marcus Autism Center to translate ASD research findings to providers across Georgia.

The mission of Marcus Autism Center is to maximize the potential of children with ASD today and transform the nature of ASD for future generations. Marcus Autism Center is achieving this goal through the integration of multiple services into one coordinated care model, quickly translating research findings into clinical practice and extending into the community and naturalistic settings.

Marcus Autism Center offers four primary clinical programs:

- The Diagnostic Assessments Clinic pairs cutting-edge research and the best diagnostic measures for ASD and related disorders with a large clinical practice performing diagnoses for 23 or more children a week. The clinics offer medical care along with psychological evaluations, allowing clinicians to provide excellent care with the shortest possible wait time. Contact: 404-785-9350. marcus.org/clinical-services/clinical-assessments-and-diagnostics
- The Severe Behavior Program addresses problem behaviors including aggression, self-injury, property destruction, disruptive behavior, pica, elopement and others. Over the past several years, the Severe Behavior Program has averaged more than an 80% reduction in these behaviors, despite the fact that the patients seen in this program represent the most severely challenging population. Contact: 404-785-9350. marcus.org/clinical-services/behavior/severe-behavior-day-treatment
- The Pediatric Feeding Disorders Program is one of the few multidisciplinary programs in the U.S., and the only program in Georgia, offering comprehensive treatment for children with chronic and severe problems with food consumption. These issues well exceed ordinary developmental variations in hunger, food preferences and interest in eating. Contact: 404-785-9493. marcus.org/clinical-services/feeding
- The Language and Learning Clinic teaches new skills, particularly in communication. Approximately 63% of children in the program were non-vocal at admission. Of the children that have been treated, more than 80% percent acquired functional communication including vocal language, augmentative communication systems and sign language. Contact: 404-785-9400. marcus.org/clinical-services/language-and-learning-clinic

The Preschool Program, now offering Georgia Pre-K, is a collaboration of Marcus Autism Center, Children's Healthcare of Atlanta and Emory University offering preschool education to children with and without autism to learn together. The preschool operates as both a school and a place of research on preschool education. Because of this unique relationship, our program continuously creates new and better ways of supporting families and meeting the learning needs of all children with high teacher-to-student ratios. Contact: 404-785-6511. marcus.org/care-and-services/preschool-program

Assessment in primary care settings:

The Children's Primary Care Center at Mercy Care and Primary Care Center at Hughes Spalding have social workers on site to help with behavioral health assessments. Children requiring treatment are referred to the appropriate setting for care.

Outpatient hospital services:

- Outpatient behavioral health services are offered through various service lines at Children's including neurosciences, the Aflac Cancer and Blood Disorders Center, Sibley Heart Center Cardiology, rehabilitation services, Health4Life Clinic, transplant services, and pain and palliative care.
- These outpatient services cover a wide array, ranging from coping with pain to assessing potential developmental delay as a result of chemotherapy treatments.
- Children's partners with mental health providers within the community to offer support and provide services where available.

Inpatient hospital services:

- Children's does not operate an inpatient behavioral health unit, but it addresses behavioral health contributors to medical illness through a comprehensive consultation-liaison service.
- Inpatient and Emergency Department consultations are available at Egleston, Scottish Rite and Hughes Spalding.

In September 2013, Children's began operating an adolescent health clinic at Hughes Spalding. In 2016, the clinic received a grant from Rooms To Go to provide a psychologist, nurse practitioner, social worker, counselor and peer support dedicated to adolescent health issues to begin July 2017. Teens are referred from across the Children's network to the clinic.
Contact: 404-785-9855. choa.org/medical-services/adolescent-medicine

Adolescent health clinic: The clinic at Hughes Spalding provides services in the following areas:

- Comprehensive medical care for adolescents, including school and sports physicals and vaccines
- Comprehensive sexual education and related medical care for teens with developmental delays
- Evaluation and treatment of menstrual and gynecological disorders
- Female and male confidential family planning services
- Pregnancy testing
- Pregnancy prevention education
- Puberty and growth concerns
- Screening and medical care for patients with eating disorders such as anorexia and obesity
- Screening and treatment for mental health issues such as attention deficit hyperactivity disorder (ADHD), uncomplicated anxiety and depression, and self-injurious behaviors
- Sexually transmitted infection and HIV screening and treatment
- Substance abuse screening
- Tobacco cessation counseling

Children's is committed helping reduce the prevalence of asthma and the number of emergency room visits caused by asthma. Several programs at Children's work to make this happen. choa.org/medical-services/asthma

Children's Asthma Demonstration Project: The Atlanta Asthma Demonstration Project (AADP) quality improvement initiative was conducted in 2015, in partnership between Children's and 11 community pediatric practices, to try to improve asthma care based on current evidenced-based guidelines (National Heart, Lung and Blood Institute Guidelines). The AADP, led by a pulmonologist, general pediatrician and emergency medicine physician, included multiple practice-based interventions over a 12-month period. As a result of the project, Children's saw a decrease in hospital admissions and emergency department utilization and an increase in urgent care visits for asthma.

High Risk Asthma Program: Children's High Risk Asthma Program has been standardized at Scottish Rite, Egleston, Hughes Spalding and outpatient clinics serving more than 475 children. The goal of the program is to coordinate care and support for families and children with asthma. The program provides education and communication between families, providers and schools to help decrease missed days of school, hospital admissions and Emergency Department visits.

Children's Asthma Center: The Asthma Center located at Hughes Spalding provides testing, treatments and equipment for patients with asthma. Pediatricians at the center go to the homes of patients to coordinate their care and assess the environmental conditions of the child's living environment. Pediatricians at the center also educate patients, community physicians, and school staff on triggers and asthma management. The program includes a nurse navigator that is dedicated to providing further education, support and coordination to patients seen through the Hughes Spalding Emergency Department, admitted as inpatients or seen in the Asthma Center.

Comprehensive Asthma Management Program: Through this program, we conducted 23 asthma education presentations, reaching 900 Children's employees, school nurses, school staff members and after-school program staff. We distributed asthma equipment to children and schools, provided developmentally appropriate asthma education to 137 campers and 76 volunteers at Camp Breathe Easy, and conducted two educational ACE mentor programs for 73 physicians, nurses and other healthcare professionals

Telemedicine Program: The Children's telemedicine program provides patients with access to the expertise of pediatric specialists through the use of live, secure video. Children's has 9 telemedicine programs in over 85 telemedicine sites across Georgia, including schools, hospitals, public health clinics, and pediatrician or family doctor offices. choa.org/medical-services/telemedicine

Neurocritical Care: Children's offers care for children with critical brain conditions, including brain tumors, seizures, and traumatic brain injuries. Children may receive evaluation and diagnostic tests including neurocritical care intensive care unit monitoring, computed tomography, magnetic resonance imaging, intracranial pressure monitoring, video electroencephalogram monitoring, and X-rays. Services may include medication, inpatient rehabilitation, occupational therapy, pain management, physical therapy, and surgery. In addition, the neurocritical team works closely with the inpatient rehabilitation program and psychiatrists to better help patients recover from injury and illness. **Contact: 404-785-KIDS (5437).** choa.org/medical-services/neurosciences/neurocritical-care

Cystic fibrosis (CF): The transition program for pediatric CF patients, Journey to Independence, was initiated as a formalized transition program at Scottish Rite in 2009 and at Egleston in 2013. Journey to Independence is a five-stage program with transfer at age 17 years and 21 years, respectively. The program requires patients to complete various age-appropriate homework assignments and hands-on activities to advance through the program. There are a total of 25 activities throughout the program. The transition process culminates with a combined pediatric-adult CF capstone clinic held in the pediatric clinic. Children's also established a CF Family Advisory Council, a group of patients' parents who serve as an advisory group to the Emory Adult Cystic Fibrosis Center. Through the Family Mentor Program, families facing CF are matched with trained, veteran parents. choa.org/medical-services/cystic-fibrosis

Congenital heart disease (CHD): The Congenital Heart Center of Georgia partners with Emory's Heart and Vascular Center to bridge gaps in care. The Congenital Heart Center of Georgia is one of the largest transition-of-care programs in the nation and the only one in Georgia. A team including anesthesiologists, cardiac intensivists, cardiologists, child life specialists, congenital heart surgeons, echocardiographers, electrophysiologists, heart failure cardiologists, heart surgeons, interventional cardiologists, nurse practitioners, nurses and social workers work together to transition from pediatric to adult care. At Children's, teens with moderate to complex congenital heart disease work with their doctors and nurses to prepare them to transition to adult care. They are given a booklet about growing up with CHD, and pediatric cardiologists help them fill out an Owner's Manual about their condition. The booklet outlines expectations for many life decisions teens will face, such as guidelines for insurance coverage, the ability to start a family and physicians who should be a part of their adult care team. Many patients transition to the Emory Adult Congenital Heart Center. choa.org/medical-services/cardiac-care/congenital-heart-center-of-georgia

Cancer: The Aflac Cancer and Blood Disorders Center of Children's has developed a multidisciplinary team to address the needs of childhood cancer survivors. Cancer survivors establish a survivor healthcare plan (a long-term, follow-up plan that includes a medical summary of cancer diagnosis and treatment, an individualized risk profile and the personalized surveillance program) and have access to SurvivorLink, an information technology network that serves as a crucial tool for helping childhood cancer survivors in Georgia receive the recommended survivor care and, as a result, optimal health and quality of life. SurvivorLink includes a survivor healthcare plan, an individualized risk profile, a personal surveillance plan, educational materials, national guidelines for survivorship care and other information needed. SurvivorLink electronically facilitates communication and shares information among the survivor, survivor team, primary care physician and 23 subspecialists. Children's also supports Survivor Day, an annual, free patient education session to discuss resources to cover the cost of care, applying for Medicare, accessing insurance plans and more. **Contact: 888-785-1112.** choa.org/medical-services/cancer-and-blood-disorders/cancer/cancer-survivor-program

Sickle cell disease: At Children's, patients with sickle cell disease participate in a transition clinic. As part of the transition program, teenagers are taken to the Grady sickle cell program for adults and introduced to adult providers. The transition to adult providers occurs by age 18. Children's also supports Sickle Cell Day, an annual, free patient education session to discuss resources to cover the cost of care, applying for Medicare, accessing insurance plans and more. **Contact: 888-785-1112.** choa.org/sicklecell

Transplant: Children's also offers specific adolescent transplant clinics for teenage liver, kidney and heart transplant patients to provide care specific to the needs of the adolescent transplant population. Patients in adolescent transplant clinics receive age-appropriate healthcare education, opportunities for independence (they are seen without their parents at most clinic visits), comprehensive, individualized care and a tour of Emory for patients preparing to transition to an adult facility. **Contact: 800-605-6175.** choa.org/medical-services/transplants/adolescent-and-young-adult-program

The Mercy Care Clinic: Since 1985, Mercy Care has been providing care to those with and without health insurance, those with little or no income and those experiencing homelessness. As a network of primary care clinic sites, Mercy Care is a medical home to thousands who need quality primary medical, dental, and vision care, behavioral health, diagnostics and social services. The Mercy Care clinic at Chamblee sees a large immigrant and transient population. Children's supports Mercy Care by providing primary care for children and adolescents.

Interpretative services: Children's provides interpretative services at every facility. Children's supplies as many teaching sheets on patient care as possible in both English and Spanish, as well as medication instructions. In addition, Children's provides free education tapes on asthma training in both English and Spanish.

Cultural differences: Children's has cultural resources available to its staff with information on 18 different cultures and the clinical implications associated with these cultures. Through the U.S. Department of Health and Human Services, there are two training courses available to staff to increase cultural awareness concerning the health needs of immigrant populations, as well as providing instruction to increase immigrants' health literacy.

Community Programs

Children's has taken a leading role within Georgia in developing and supporting community programs to help children and families. Highlighted below are the extensive programs, education and services offered.

Programs in clinical settings: Children's works in its clinical settings to reduce the prevalence of obesity through a number of programs, including:

- The Strong4Life Clinic has a multidisciplinary team of medical providers, dietitians, exercise physiologists and psychologists who work with patients and families to provide intensive treatment of obesity through the promotion of a physically active lifestyle, healthy eating habits and behavior changes. Patient successes include healthy weight loss and weight management, increase in daily physical activity, improved nutritional intake, reduction of incidence of associated comorbidities and improved quality of life and self-image. Children's also provides bariatric surgery to those children with extreme weight issues. **Contact: 404-785-3512.**
- Sibley Heart Center Cardiology houses a preventive cardiology program to assist cardiac patients who are overweight and obese. The program provides diet and nutrition counseling. choa.org/medical-services/cardiac-care/sibley-heart-center-cardiology

- At the Primary Care Center at Chamblee, nurses and doctors are alerted when a patient qualifies as overweight based on body mass index. When this happens, patients and families are counseled using motivational interviewing techniques (taught through the Strong4Life's Provider Program) and are asked to return every three months until the child's weight stabilizes.
- Hughes Spalding Hospital has an obesity clinic and refers kids to the Strong4Life Clinic if they need more advanced treatment.

Strong4Life: In 2011, Children's Healthcare of Atlanta launched Strong4Life, a unique model for change designed to improve the health and well-being of Georgia's children. The focus is on reducing the prevalence of childhood obesity through prevention and treatment initiatives for kids and those that influence their lives. Strong4Life aims to leverage Children's clinical and nutrition expertise and thought leadership with other organizations who are joining the fight against childhood obesity. Strong4Life impacts kids and families through programs and community partnerships designed to deliver consistent messages and support that bring about sustainable lifestyle change. Since 2011, Strong4Life has made significant strides in building awareness, impacting over 1.5 million children, training nearly 4,000 healthcare providers throughout the state and establishing a presence in more than 1,800 schools in 172 Georgia school districts. Strong4Life.com

Strong4Life marketing:

- Awareness: Increasing awareness of obesity in children and adolescents: Children's continues to leverage its marketing expertise to deliver messages that address this critical need and inspire change. Children's employs traditional media campaigns, as well as digital media and other tactics to reach parents in the community.
- Website: Children's created the Strong4Life website, Strong4Life.com, to educate parents and empower key influencers to support change and provide practical solutions for those ready to change. The site contains:
  - Videos, fact sheets, recipes, activity ideas and other useful information on healthy habits
  - In-depth information on all Strong4Life programs, as well as community resources
  - Specific information for physicians and other clinical professionals interested in training and continuing medical education (CME)

Strong4Life community programs:

- **Strong4Life Provider Program:** The Strong4Life Provider Program is designed to improve healthcare providers' ability to influence patients and families to choose healthy lifestyles to reduce childhood obesity. The program is free and includes a lecture, videos and hands-on practice sessions centered on counseling, supported by a toolkit of materials. Physicians, physician assistants and nurse practitioners who complete the training are recognized on the Strong4Life website as Certified Strong4Life Providers. The Strong4Life Provider Program also provides an Early Feeding Program, focusing on early prevention (conception to 3 years of age), as prevention and early intervention is critical to reversing Georgia's childhood obesity epidemic. Strong4Life.com/landing-pages/providers-and-professionals
- **Strong4Life webinars:** As an extension of the Strong4Life Provider Program, Children's offers a series of live streaming webcasts related to the management and treatment of comorbidities associated with childhood obesity. The webcasts are offered during lunchtime and feature a 45-minute roundtable discussion among experts in the field.
- **Early Childhood Intervention Book Program:** This early intervention program aims to address prevention of unhealthy habits before they start. In this program, providers, including pediatricians, nurse practitioners and physician assistants, provide evidence-based messaging at well-child checkups and provide families with a children's book reinforcing the same messages. The program has the dual benefit of reinforcing messages that prevent obesity while also promoting reading and literacy. Since 2013, Strong4Life has distributed 156,379 books to pediatric offices and Women, Infants and Children (WIC) offices throughout the state.
- **Essentials of child and adolescent weight management training for registered dietitian nutritionists (RDN):** The Strong4Life RDN Training Program aims to develop and support a network of registered dietitian nutritionists across the state of Georgia with the targeted skills and training to provide medical nutrition therapy to manage and treat childhood obesity. The program uses a continuous tiered education format with a combination of live and web-based training and hands-on workshops. RDNs who attend training components are promoted as a referral resource to pediatric primary care providers, enabling RDNs and pediatricians to work collaboratively to reduce childhood obesity in Georgia. Strong4Life.com/providers-and-professionals/registered-dietitians

- **Strong4Life WIC Training Program:** Sixty percent of Georgia's children are eligible for the Georgia WIC Program. Accordingly, Children's developed the Strong4Life WIC Training Program to equip nutritionists with the necessary tools and resources to motivate families to choose healthy lifestyles that prevent and reduce childhood obesity. The program aims to enhance goal setting by the WIC nutritionist and increase goal adherence of the caregiver. Currently, WIC requires each nutritionist to complete an online Strong4Life module about motivational interviewing and early feeding best practices. Strong4Life.com/en/clinicians/early-feeding-program
- **Strong4Life School Nutrition Program:** The Strong4Life School Nutrition Program aims to increase consumption of healthier foods in Georgia school lunchrooms by equipping school nutrition team members with targeted skills and an innovative toolkit. Strong4Life uses basic marketing principles to encourage kids to make positive choices regarding the foods they eat. Strong4Life.com/landing-pages/school-nutrition
- **Strong4Life School Nurse Program:** The goal of the Strong4Life School Nurse Program is to educate and empower Georgia's school nurses to serve as health ambassadors in the school. Specifically, the program provides nurses with the nutrition knowledge and counseling skills necessary to positively impact students' health. School nurses learn how to have conversations with students and parents around nutrition and Strong4Life healthy habits. Children's provides ongoing technical assistance and webinar training to enhance the skills of the nurses. Strong4Life.com/en/schools-and-community/school-programs
- **Strong4Life Challenge:** Strong4Life Challenge is a program that teaches elementary school children about the importance of good nutrition and physical activity in a fun and challenging way, energizing the entire school community. The program provides schools with a kick-off pep rally, follow-up visit to the PE classroom and cafeteria, as well as fun incentives for students and teachers, including water bottles and t-shirts.
- **Camp Strong4Life:** Camp is based upon the premise of simple, sustainable change through the adoption of healthy habits while having fun through a curriculum developed by a multidisciplinary team of experts. The overnight camp, held in partnership with Camp Twin Lakes, provides targeted interventions for children ages 9 to 14 with a BMI in the 85th percentile or higher. The unique camp experience engages the entire family, providing hands-on learning and skill building. Strong4Life.com/programs/camp/about-camp-Strong4Life
- **Wellness Blueprint:** The Wellness Blueprint aims to promote a healthy environment within youth organizations. A Wellness Blueprint is a set of written standards an organization commits to achieving to promote the health and wellness of those reached by their programs and services. In this program, Strong4Life engages organization leaders one-on-one to develop an individualized Wellness Blueprint. A key component of the program is the Strong4Life Wellness Hub, which includes a wellness assessment, a wellness basecamp, a youth hall of fame, and healthy habits videos. Participating organizations receive two toolkits to support their wellness efforts. Strong4Life.com/en/schools-and-community
- **Champions Program:** The Champions Program invites Children's employees to participate as volunteer representatives of Strong4Life at community events. Champions increase Strong4Life's presence at community events, while engaging Children's employees in the initiative. Champions are trained throughout the year and agree to volunteer for a minimum of eight hours per year. In addition to providing a valuable community service, several Champions report that they adopted healthier habits as a result of participating.
- **Community events:** Strong4Life's participation is often requested for community events, such as health fairs, festivals and more. Strong4Life's participation in these events is a vehicle for delivering key campaign messages, promoting programs, and building relationships with community partners and stakeholders. Positioning itself as a go-to resource on childhood obesity and healthy habits, Strong4Life has a responsibility to offer support resources to the community.
- **Publications dissemination:** Strong4Life continues to contribute to the body of research around childhood obesity prevention and treatment, reflecting a programmatic priority for understanding its causes and finding replicable solutions. In 2018, Strong4Life submitted 8 abstracts to professional journals, with additional abstracts and posters to state and national conferences, all of which were accepted for either publication or presentation.

Strong4Life programs in collaboration with community organizations: Children's, in collaboration with community organizations, is working to further support the fight against obesity in children and adolescents. Some community collaborations include:

- Alpharetta Parks and Recreation
- Atlanta Community Food Bank
- Camp Twin Lakes
- City of Atlanta Department of Parks and Recreation
- City of Roswell Parks and Recreation
- City of Smyrna Parks and Recreation
- Emory University
- Georgia Association of School Nurses
- Georgia Breastfeeding Coalition
- Georgia Department of Education
- Georgia Department of Public Health
- Georgia Recreation and Parks Association
- Georgia Shape
- Georgia WIC
- Gwinnett County Parks and Recreation
- Kids Health First Pediatric Alliance
- Roswell Recreation, Parks, Historic & Cultural Affairs Department
- YMCA of Metro Atlanta

Ronald McDonald Care Mobile: The Ronald McDonald Care Mobile began providing medical care to children at metro Atlanta schools in 2016. Launched in October 2016, the Ronald McDonald Care Mobile is a mobile clinic that visits schools in metro Atlanta to provide medical services for children with asthma. Since 2016, the Care Mobile has seen 3,212 children. In 2018, the program expanded from nine schools to 11 schools with 1,375 visits for 652 unique patients. We also saw a 10% decrease in the number of missed school days for Care Mobile patients in 2018. The concept, which is part of a larger outreach program of the Children's Asthma Center at Hughes Spalding hospital, is a collaborative effort between Children's and Atlanta Ronald McDonald House Charities. Asthma is one of the leading reasons for missed school days in Georgia and access to care is a barrier to asthma control identified by many families. By bringing asthma medical care directly to the schools, we aim for kids to be able to gain control of their asthma, miss less school and spend less time at unnecessary emergency room visits. Children's mission is to bring asthma care where kids live, learn and play. rmhc.org/ronald-mcdonald-care-mobile

Education and research: Children's provides training and educational video series for schools, community providers and coaches on what to do during an asthma-related emergency. In 2016, Children's began to offer CME on raising awareness of asthma management. Children's supports multiple research initiatives around the treatment and prevention of asthma to improve the recognition of asthma severity.

Children's has a robust history of collaboration with schools in the community and provides several services and alliances to keep kids healthy and reduce absenteeism. choa.org/schoolhealth

Children's regional school health coordinator: Children's has a full-time regional school health coordinator that collaborates with over 3,400 schools and 1,600 school health professionals throughout Georgia to provide updates and webinars on clinical pediatric topics and staff education for school districts in metro Atlanta. The regional school health coordinator serves as the primary contact for school health professionals to call to discuss programmatic needs and difficult cases. The regional school health coordinator also provides resources to the school health community, including an annual conference for school nurses, a common infectious illnesses poster, teaching sheets and educational videos. **Contact Marnell Dujour, BSN, RN: 404-785-8927.**

Georgia School Health Resource Manual: Children's provides school health professionals with a free, regularly updated, online Georgia School Health Resource Manual, which is also available for purchase in hard copy. The manual includes sections on injury management and emergency medical concerns, administration of medications, communicable disease and infection control, chronic health conditions, special health procedures in a school setting, mental health in schools, screening considerations in the school setting, health education, and employee health and workplace wellness.

Children's Asthma Management Education Program: The Asthma Management Education Program trains school nurses, school staff and healthcare professionals in asthma management. Topics include controlling asthma triggers and helping children safely participate in school and physical activities. Program offerings include on-site presentations, trainings through the Asthma Care and Education (ACE) Program, asthma education resources and asthma equipment. **Contact Ginger Tuminello: 404-785-7240.** choa.org/medical-services/asthma

Scoliosis Screening Program: The Scoliosis Screening Program partners with public health and school health professionals to detect early signs of scoliosis. Students can be referred to one of the registered nurse-facilitated scoliosis tertiary clinics for an X-ray evaluation, and the results and treatment recommendations are sent to the family and primary care physician. The annual Scoliosis Screening Conference is conducted for healthcare professionals and focuses on scoliosis screening techniques, research and treatment methods. **Contact: 404-785-7553.**
choa.org/medical-services/orthopaedics/scoliosis-and-spine-program/scoliosis/scoliosis-screening-program

Diabetes community education: Children's has a diabetes community educator who offers information, classes and contacts to help teachers and other school health professionals make their schools safe for kids with diabetes.
choa.org/medical-services/diabetes/diabetes-resources

Educational Outreach Program at Marcus Autism Center: The Educational Outreach Program at Marcus Autism Center provides schoolwide trainings to foster social and emotional engagement in the classroom, professional development for school health professionals, and systemwide trainings to build professional learning communities and effective coaching practices to foster social engagement. **Contact: 404-785-9446.** marcus.org/clinical-services/outreach-programs

Athletic injury prevention: Children's has contracts with 29 high schools and 24 club sports for injury prevention around metro Atlanta. In addition, quarterly sports medicine seminars are provided to coaches, school nurses and pediatricians in the community, covering topics including exercise-induced asthma, heat illness and more. Children's sports medicine physicians serve as a resource in the area of concussion management in schools.

Project S.A.V.E.: Children's cardiac services support Project S.A.V.E. (sudden cardiac death: awareness, vision for prevention and education), a program that helps Georgia's schools become recognized as heart-safe, which means they have implemented our comprehensive program to prevent sudden cardiac deaths. It includes teaching CPR, implementing automated external defibrillators (AEDs), and preparing coaches, school nurses and other staff to manage these emergencies. Project S.A.V.E. was created to educate school systems and doctors about pediatric sudden cardiac arrest. Georgia schools can also apply for training grants to assist with the training portion of program implementation. choa.org/projectsave

Strong4Life school nurse training: Strong4Life provides nurses with information, communication techniques and counseling skills that help inspire and support kids to make smart food choices in the lunch line and to be more active.

Action plans for school health: Children's has a number of action plans including, asthma, sudden cardiac arrest, mitochondrial, diabetes and seizure, that are created with the patient during their visit and shared with the child's school to help them identify and handle these conditions in the event of an emergency.

School Program: The School Program is available for patients who miss school because of hospitalizations and clinic appointments. Certified hospital teachers serve as liaisons between patients and schools to coordinate instruction and educational support. The team educates parents on available services with their child's school and provides the latest medical updates and recommendations to schoolteachers. In 2018, Children's provided 2,102 individualized instructional sessions for patients at Egleston and Scottish Rite and served 5,146 patients with educational support.

Georgia Health Information Network: Children's is enrolled in the Georgia Health Information Network to help communicate and coordinate care with our community colleagues, including both providers and schools. **Contact: 1-855-200-1214.** gahin.org

Safe Kids: Safe Kids Georgia was established 30 years ago as the injury prevention outreach arm and is managed by Children's Child Advocacy team.

Safe Kids fosters collaboration to prevent injuries to children by bringing together a statewide network of health educators from law enforcement, fire departments, public health agencies and hospitals. Depending upon the individual county community needs and resources, Safe Kids coalitions provide direct services in the following areas: child passenger safety, bike/wheeled safety, pedestrian safety, home safety, water safety, fire safety and sports safety.

With 33 coalitions in more than 60 counties touching 70% of Georgia families, Safe Kids numbers statewide tell a compelling story. In 2021, a total of 69,133 youth were reached throughout Georgia. Safe Kids coalitions held 1,709 safety events and provided 6,566 safety equipment items. **Contact:** safekidsgeorgia.org/

CHIPP: Childhood injury remains the number one cause of death for children ages 1 to 19 in the U.S. To address this problem, a multidisciplinary group of Children's Healthcare of Atlanta physicians and staff from the departments of trauma, emergency medicine, advocacy, and primary care came together to form Children's Injury Prevention Program (CHIPP) in January 2016. CHIPP's mission is to provide a multidisciplinary approach to reduce childhood injury, both unintentional and intentional in the greater Atlanta area through evidence-based injury prevention programs, research, education, and community outreach. CHIPP is a Children's-based organization that has grown rapidly as a pediatric injury prevention coalition since its inception and includes representatives from multiple specialties at all three of the Children's campuses. In addition, CHIPP partners with Safe Kids, Georgia Department of Public Health, Center for Disease Control, Injury Prevention Research Center at Emory, and the Injury Free Coalition for Kids.

Sports Medicine: The Children's sports medicine team understands how to diagnose and care for young athletes to avoid long-term damage. The multidisciplinary team includes sports medicine physicians, orthopedic surgeons, physical therapists and certified athletic trainers. The team works together to develop specialized, effective treatments that return young athletes to playing their sport as safely and quickly as possible, treating athletes who have a wide range of sports-related injuries and conditions, including back, neck and spine, upper body and lower body. Children's services include athletic training, physical therapy, sports primary care, sports surgery, specialized treatment and testing, dry needling, isokinetic testing, Sports Motion Analysis, sports nutrition education, and surgery. **Contact: 404-785-KIDS (5437).** choa.org/medical-services/sports-medicine

School Nurse Resources: Children's provides school nurses and school health professionals with information, skills, and resources to support injury and illness prevention in schools.

Georgia School Health Resource Manual: Children's provides school health professionals with a free, regularly updated, online Georgia School Health Resource Manual, which is also available for purchase in hard copy. The manual includes sections on injury management and emergency medical concerns, administration of medications, communicable disease and infection control, chronic health conditions, special health procedures in a school setting, mental health in schools, screening considerations in the school setting, health education, and employee health and workplace wellness.

Diabetes: Children's offers workshops, classes, panel discussions, and information sessions to patients with diabetes and their families about the transition to college. A panel of both parents and peers answer questions and share their own experiences. choa.org/medical-services/diabetes/diabetes-classes

Appendix C: Community Resources

Advocacy for the Community Health Needs of Children

Annie E. Casey Foundation: The Annie E. Casey Foundation is a private charitable organization, dedicated to helping build better futures for disadvantaged children in the U.S. KIDS COUNT is a national and state-by-state effort to track the well-being of children in the U.S., using data and policy analysis. The Atlanta Civic Site incorporates multiple programs for vulnerable families with young children. These programs seek to ensure that children are healthy, thriving socially and emotionally, and developing on track to achieve academic success by the third grade. **Contact Kweku Forstall: 678-686-0145.** aecf.org

Boys & Girls Clubs of Metro Atlanta (BGCMA): For nearly 75 years, BGCMA has been at the forefront of youth development, working with young people from disadvantaged economic, social and family circumstances. BGCMA enriches the lives of girls and boys that other youth agencies fail to reach. BGCMA is dedicated to ensuring that our community's young people, who are most in need of our help, have greater access to quality programs and services that help them succeed academically, live healthy lifestyles and become leaders. **Contact: 404-527-7100.** bgcma.org

Georgia Chapter–American Academy of Pediatrics (AAP): The Georgia Chapter of the American Academy of Pediatrics is the state-wide professional association of general pediatricians and pediatric medical and surgical subspecialists. Its mission is to obtain optimal physical, mental and social health for the infants, children, adolescents and young adults of Georgia. To accomplish this, the Georgia AAP also supports the professional needs of its members.

Georgia Family Connections Partnership (GFCP): The Georgia Family Connections Partnership is a statewide network of 159 county organizations collaborating in communities to improve the quality of life for children and families. GFCP wants kids to be healthy and ready to start school and do well when they get there, and wants families to be stable and self-sufficient. gafcp.org

Voices for Georgia's Children: Established in 2003, Voices for Georgia's Children is a nonprofit child policy and advocacy organization that envisions a Georgia where children are safe, healthy, educated, employable and connected to their families and communities. Its mission is to be a powerful, unifying voice for a public agenda that ensures the well-being of all of Georgia's children. Voices has developed a long-term policy agenda focused on early childhood, child health and transitioning youth to foster change in five measures of child well-being. georgiavoices.org

YMCA of Metro Atlanta: The YMCA of Metro Atlanta focuses on developing the potential of kids, improving individual health and well-being, and giving back and supporting our neighbors. Parents find a safe, positive environment for children to learn good values, social skills and behaviors. Families come together to have fun and spend quality time with each other. Children and teens play, learn who they are and what they can achieve, and are accepted. Adults connect with friends, pursue interests and learn how to live healthier. Communities thrive because neighbors support each other and give back. We all build relationships that further our sense of belonging and purpose. ymcaatlanta.org

Financial Assistance

PeachCare for Kids: The PeachCare program is sponsored by the Georgia Department of Community Health and provides comprehensive healthcare to children through the age of 18 who do not qualify for Medicaid and live in households with incomes at or below 247% of the federal poverty level. Health benefits include primary, preventive and specialist care, dental care, and vision care. The program covers hospitalization, emergency room services, prescription medications and mental health care. Each child in the program has a Georgia Families Care Management Organization who is responsible for coordinating the child's care. **Contact: 404-463-8368.** peachcare.org

Right from the Start Medical Assistance Group (RSM): RSM is a doorway for certain people in need of healthcare coverage. The mission of the RSM is to enable children under age 19, pregnant women, low-income families, and women with breast or cervical cancer to receive comprehensive health services through Medicaid and related programs. RSM eligibility specialists help working and low-income families obtain access to no-cost and low-cost healthcare coverage. The RSM staff has expertise in accessing eligibility to Medicaid, as well as PeachCare for Kids for those not eligible for Medicaid. RSM also refers clients to assistance with other services and collaborative programs, and conducts outreach within the communities. **Contact: 1-800-809-7276.** dfcs.georgia.gov/services/how-do-i-apply-medicaid/right-start-medical-assistance-group

Temporary Assistance for Needy Families (TANF): The TANF program, often referred to as welfare, is a monthly cash assistance program for low-income families with children under the age of 18. Cooperation with the Division of Child Support Services is a requirement for receiving TANF benefits. In order to be determined eligible for TANF benefits, a child under the age of 18 must reside in the home and must be deprived of the care of at least one parent due to a variety of reasons, including: continued absence from home, the death of a parent, physical or mental incapacity, or if one parent has a recent connection to the work force and both parents are in the home. dfcs.dhs.georgia.gov/temporary-assistance-needy-families

Legal Assistance

Health Law Partnership (HeLP): HeLP is an interdisciplinary community collaboration between Children's Healthcare of Atlanta, Georgia State University College of Law and the Atlanta Legal Aid Society to improve the health and well-being of low-income children and their families by providing free civil legal services to address health-harming legal problems affecting children's health. Contact: 404-785-2005. healthlawpartnership.org

Behavioral Health

Behavioral Health Link provides professional staff that are available any time day or night to help with a mental health crisis or problem with drugs or alcohol. Contact: 800-715-4225. behavioralhealthlink.com

Georgia Department of Behavioral Health and Developmental Disabilities (DBHDD) provides treatment and support services to people with behavioral health challenges and addictive diseases, and assists individuals who live with developmental disabilities. The agency's mission is to provide high-quality healthcare opportunities for individuals with developmental disabilities or behavioral health challenges close to their homes and in the least restrictive setting possible, allowing them to create a sustainable, self-sufficient and resilient life in their community while embracing independence and recovery. DBHDD offers crisis services, outpatient treatment, and therapeutic programs to all Georgia residents. Contact: 404-657-2252. dbhdd.georgia.gov

Georgia Community Support Solutions (GCSS) is a community-based nonprofit organization that provides services to people with developmental disabilities, as well as support to their families. GCSS offers a wide variety of program options, including respite services, residential options, children's services and day programs. The Homes Offering Support and Training (HOST) Children and Adolescents program provides a safe, supportive family environment for children and adolescents with developmental disabilities, including those with severe behavioral problems. GCSS currently operates 23 programs that benefit over 1,300 individuals in 20 counties in Georgia. Contact: Chiyoko Rasser: 404-634-4222. gacommunity.org

View Point Health provides behavioral health services to children, adolescents and their families throughout the state. View Point Health is a pioneer for Georgia's system of care, having helped developed community services and support for over a decade. View Point Health fees are established by the state of Georgia on a sliding scale based on family size and amount of income. View Point Health does not file private insurance claims for services provided to clients. Contact: 678-209-2411. myviewpointhealth.org

Crescent Pines Hospital is a 50-bed facility in Stockbridge, Ga., that provides psychiatric treatment and substance abuse services for children (ages 4 to 12), adolescents (ages 13 to 18) and adults. Crescent Pines provides all levels of care from acute inpatient stabilization, partial hospitalization and intensive outpatient programming. Contact: 770-474-8888. crescentpineshospital.com

Devereux Advanced Behavioral Health Georgia (Devereux Georgia), in Kennesaw, Ga., provides a continuum of care which includes: a psychiatric residential treatment facility for youth 10 to 21 years of age who are experiencing emotional and behavioral challenges brought on by mental illness, abuse, neglect, sexual exploitation, or intellectual and/or developmental disabilities; a specialty foster care program; community-based therapeutic group homes; and an AdvancED-accredited school. Contact: 770-427-0147. devereuxga.org

Hillside Inc. in Atlanta provides numerous treatment options for children and adolescents ages 7 to 21 experiencing difficulties with emotional and behavioral challenges. Hillside's primary treatment modality is Dialectical Behavior Therapy (DBT), a specialized form of cognitive behavioral therapy. DBT has been successfully proven to help decrease self-injurious behaviors, mood instability, chaotic relationships, anger and impulsive behaviors. DBT also helps improve the understanding of personal boundaries and relationships and how to better deal with conflicting or painful emotions. Other interventions provided are Theraplay, animal-assisted therapy, recreation therapy, Triple P Positive Parenting Program and prescriptive education curriculum provided at the accredited Conant School. Hillside's array of services include residential, day/partial hospitalization and outpatient DBT services, as well as community intervention programs and therapeutic foster care. hside.org and hillsidedbt.org

Laurel Heights Hospital is a private intensive residential treatment center located in Atlanta's Emory/Druid Hills neighborhood. Laurel Heights has the only specialty acute unit in the Southeast that specializes in the treatment of children and adolescents ages 6 to 17 with complex psychiatric and behavioral problems with co-occurring developmental disabilities. This includes children and adolescents with any level of ASD. The 12-acre campus offers seven residential cottages, a separate clinic, a Southern Association of Colleges and Schools (SACS)-accredited school, a cafeteria, a gym, a swimming pool and several outdoor playgrounds. Laurel Heights accepts commercial insurance, Medicaid/Managed Medicaid, TriCare, agencies and school system funding. **Contact: 404-888-5475.** laurelheightshospital.com

Peachford Hospital in Atlanta provides mental health and chemical dependency treatment in a nurturing environment for children (ages 4 to 12), adolescents (ages 13 to 18), adults and senior adults to find hope and healing from emotional, psychiatric and addictive diseases. The Peachford Hospital system includes a 246-bed inpatient acute care facility, partial hospitalization and intensive outpatient programs. **Contact: 770-455-3200.** peachford.com

Ridgeview Institute is located in the suburb of Smyrna, Ga. Since 1976, Ridgeview has treated adolescents and their families with a variety of therapeutic approaches such as group therapy, family therapy, cognitive behavioral therapy and dialectical behavior therapy. Ridgeview emphasizes a multi-disciplinary model with an integrated treatment approach, allowing comprehensive care for adolescents between the ages of 11 to 17. Using a track system, patients are separated by age and diagnosis; this includes primary psychiatric, primary addiction and dual diagnosis. Ridgeview provides three levels of care for the adolescent population: inpatient, partial hospitalization and intensive outpatient. Ridgeview is in-network with most major insurances and offers free assessments 24 hours a day, seven days a week. **Contact: 1-800-329-9775 or 770-434-4567.** ridgeviewinstitute.com

RiverWoods Behavioral Health is located behind the Southern Regional Medical Center campus in Riverdale, Ga., and provides psychiatric & chemical dependency services, intensive outpatient programs, partial hospitalization programs and adolescent treatment. **Contact: 770-951-8500.**

SummitRidge Hospital in Lawrenceville, Ga., treats teenagers with addiction problems through inpatient and partial hospitalization programs. **Contact: 678-442-5800.** summitridgehospital.net

Obesity

Alliance for a Healthier Generation, founded by the American Heart Association and the Clinton Foundation, works to reduce the prevalence of childhood obesity and to empower kids to develop lifelong healthy habits. The Alliance works with schools, companies, community organizations, healthcare professionals and families to transform the conditions and systems that lead to healthier children. healthiergeneration.org

Georgia Shape, led by Governor Nathan Deal but facilitated by the Department of Public Health, is positioned as the state's lead organization for childhood obesity initiatives. Georgia Shape begins with a basic, benchmark measurement of fitness among our students called FITNESSGRAM. The FITNESSGRAM tool used for Georgia Shape's annual standardized fitness assessment evaluates five different parts of health-related fitness, including aerobic capacity, muscular strength, muscular endurance, flexibility and body composition, using objective criteria. It also generates reports providing valuable individual, school, and state-level data to empower parents, schools and the community to best assess the current health needs for children in Georgia. The report is delivered confidentially to families and aggregate results are reported to create a true snapshot and highlight areas for improvement. georgiashape.org

Georgia Campaign for Adolescent Power & Potential (G-CAPP) works with adolescents and their parents to reduce childhood obesity through the PowerMoves: Eat Better Do Better program. gcapp.org

Georgia Family Connection Partnership (GFCP) is a statewide network of 159 county organizations collaborating in communities to improve the quality of life for children and families. GFCP wants kids to be healthy and ready to start school and do well when they get there. GFCP wants families to be stable and self-sufficient. gafcp.org

Georgia Health Policy Center (GHPC) was established in 1995 in the Andrew Young School of Policy Studies at Georgia State University. The GHPC integrates research, policy and programs to advance health and well-being. With more than 20 years of experience, the center is at work locally, statewide and nationally, focusing on solutions to some of the most complex issues facing health and healthcare today, including child health and well-being. The center aims to improve child outcomes and child and family policies in Georgia through applied policy analysis and research. Funding from public and private sources supports work in the areas of school health, childhood obesity and child well-being. The GHPC is also home to the Georgia Center of Excellence for Children's Behavioral Health (the COE). The COE partners with the Georgia Department of Behavioral Health and Developmental Disabilities in providing assistance to the state's child and adolescent behavioral health system of care. ghpc.gsu.edu

Georgia Organics connects organic food from Georgia farms to Georgia families. georgiaorganics.org

Voices for Georgia's Children, established in 2003, is a nonprofit child policy and advocacy organization that envisions a Georgia where children are safe, healthy, educated, employable, and connected to their families and communities. Its mission is to be a powerful, unifying voice for a public agenda that ensures the well-being of all of Georgia's children. Voices for Georgia's Children has developed a long-term policy agenda focused on early childhood, child health and transitioning youth to foster change in five measures of child well-being. georgiavoices.org

HealthMPowers is a comprehensive school health intervention program exemplifying the key strategies that the CDC outlined for improving health, physical activity and healthy eating in schools. In collaboration with its sponsors—the CDC, Emory School of Public Health, Children's, Piedmont Healthcare, Northside Hospital and Isakson-Barnhart—HealthMPowers has created a model that not only targets youth but also addresses the major support networks in a child's life: school staff and family members. Contact: 770-817-1733. healthmpowers.org

University of Georgia (UGA) launched a major campuswide initiative in January 2012 to help the state address its growing epidemic of childhood and adult obesity, as well as the increasing incidence of overweight infants. UGA is able to harness diverse and extensive obesity-related instruction, research activities, and public service and outreach components to address this multifaceted problem. The initiative will develop obesity prevention and treatment programs that interested Georgia communities, employers and healthcare providers can implement. The initiative will also coordinate the study and development of state and national public health policies and economic strategies to address obesity and metabolic disorders. UGA will work cooperatively with interested parties, including other Georgia research institutions and Athens Regional Medical Center, to help bring obesity under control. obesity.uga.edu

Other Community Resources

The American Heart Association has published "Best Practices in Managing Transition to Adulthood for Adolescents With Congenital Heart Disease: The Transition Process and Medical and Psychosocial Issues—A Scientific Statement From the American Heart Association" to assist healthcare providers in creating a formal transition process for youth with congenital heart disease. ahajournals.org/doi/10.1161/CIR.0b013e3182107c56

The American Lung Association in Georgia is the lead organization in the state working to save lives by improving lung health and preventing lung disease. The association provides a wealth of resources related to respiratory health, including programs for children with asthma, such as the Asthma 101 Program, Camp Breathe Easy, asthma-friendly schools awards and Open Airways for Schools. In addition, it is a leading advocate for creating asthma-friendly environments. Contact: 770-434-5864. lung.org

Georgia Academy of Family Physicians (GAFP) offers patient centered medical home (PCMH) educational opportunities to members with live activities, on-site coaching, online education and shared resources. GAFP encourages NCQA PCMH recognition. In 2010, GAFP initiated the Patient-Centered Medical Home University, which has now guided more than 200 clinicians from Georgia family medicine practices and residency programs through the process of meeting the standards for NCQA Recognition. gafp.org

Georgia Adolescent Health and Youth Development (AHYD) Program includes 30 teen centers and 18 district youth coordinators and is available to children ages 10 to 19. Services include: abstinence education, drug and alcohol prevention education, reproductive health services, and seminars to increase awareness about sexually transmitted diseases and teen pregnancy. Contact: George Crawford at 404-656-6679. dph.georgia.gov/chronic-disease-prevention/chronic-disease-data

Georgia Association of School Nurses (GASN) was organized in 1991 to unite school nurses committed to providing quality healthcare services to school children. GASN remains dedicated to promoting excellence in school health through its continued education programs and advocacy. gasn.org

The **Georgia Asthma Control Program** is part of a national initiative launched by the CDC, National Center for Environmental Health to reduce the burden of asthma and improve the health and quality of life for all persons affected by asthma through effective control of the disease. The Georgia Asthma Control Program has developed a partnership with the Georgia Association of School Nurses that will lead efforts toward the adoption and implementation of the American Lung Association and CDC's Asthma-Friendly Schools Initiative throughout Georgia school systems. The core components of the program include: establishment of management and support systems for asthma-friendly schools; providing appropriate school health and mental health services for students with asthma; providing asthma education and awareness programs for students and school staff; providing a healthy school environment to reduce asthma triggers; providing enjoyable physical education and activity opportunities for students with asthma; and coordinating school, family and community efforts to better manage asthma symptoms and reduce asthma-related school absences. The goal of this initiative is to reduce asthma-related hospitalizations, emergency department visits and days missed from school.
Contact Francesca Lopez, M.S.P.H., A.E.-C.: 404-651-7324. dph.georgia.gov/asthma-surveillance

Georgia Department of Education, School Nurse Exchange provides a collection of resources for school nurses to keep abreast of current trends and best practices in the leadership and delivery of school based health services. Their webpage serves as a vehicle for exchanging ideas and suggestions to support school nurse programs across Georgia. https://www.gadoe.org/wholechild/Pages/School-Nurse.aspx

Georgia Department of Public Health, deputy chief nurse provides leadership, training and consultation as it relates to school nursing practice and public health to all health districts and school districts, including private and parochial schools, as well as nurses employed as school nurses. dph.georgia.gov/school-health

Georgia Campaign for Adolescent Power & Potential (GCAPP) provides programs in teen pregnancy, physical activity and nutrition and healthy relationships. GCAPP works to build comprehensive and improved sexual health education in Georgia school districts through the Working to Institutionalize Sex Education (WISE) initiative, educate high-risk youth on abstinence and contraception, decrease teen pregnancy rates in metro Atlanta through a youth leadership council, and support young mothers through the Second Chance Homes Network. Contact: 404-524-2277. gcapp.org

Grady Teen Clinic serves adolescents ages 12 to 19 and provides birth control, gynecological care, pregnancy testing, STI testing and treatment, HPV vaccinations and sports physicals. Contact: 404-616-3513. gradyhealth.org/specialty/teen-center/

Johns Hopkins Medicine Cystic Fibrosis Center developed a webcast, "Partnering for care: transition to adult care," which identifies specific and concise goals for adolescents as they transition from pediatric to adult care. Goals are established for 12- to 14-year-olds, 16- to 18-year-olds and 21-year-olds, with the focus on each individual developing a sense of personal responsibility for their own care and treatment. All patients and families have access to this webcast. hopkinscf.org

National Association of Free and Charitable Clinics (NAFC) is the only nonprofit 501(c)(3) nonprofit organization whose mission is solely focused on the issues and needs of the more than 1,200 free and charitable clinics and the people they serve in the U.S. Founded in 2001 and headquartered in Washington, D.C., the NAFC is an effective advocate for the issues and concerns of free and charitable clinics, their volunteer workforce of doctors, dentists, nurses, therapists, pharmacists, nurse practitioners, technicians and other healthcare professionals, and the patients they serve. nafcclinics.org

National Committee for Quality Assurance (NCQA) trains providers in the PCMH and recognizes practices implementing the PCMH program. NCQA PCMH recognition is the most widely used way to transform primary care practices into medical homes. ncqa.org

National Diabetes Education Program (NEDP) is a program of the National Institutes of Health and the CDC and provides a pediatric-to-adults diabetes care transition checklist designed to help healthcare providers, young adults, and families discuss and plan the change from pediatric to adult healthcare. The young adult, family and healthcare provider can obtain online transition resources at the NDEP website. ndep.nih.gov/transitions

The National Kidney Foundation has developed a toolkit to assist pediatric nephrology social workers in helping transition

adolescents with chronic kidney disease to adult facilities. Note: to view the toolkit modules, one must enroll as a member of the website. kidney.org/professionals/CNSW/toolkit.cfm

Not One More Life (NOML) is an asthma education program dedicated to teaching others about asthma. The program is designed to deliver knowledge needed to make informed decisions.

Osteogenesis Imperfecta Foundation (OIF) provides information to parents, youth and healthcare providers on the transition from pediatric to adult care for teens with osteogenesis imperfecta, a genetic bone disorder characterized by fragile bones that break easily. oif.org

Patient-centered Primary Care Collaborative (PCPCC) is a nonprofit that advocates nationally to advance patient-centered primary care and the medical home model. PCPCC also works to broadly disseminate resources that capture best practices and lessons learned from medical home initiatives throughout the country, including free webinars, publications and conferences. These resources and tools are available at pcpcc.org

Planned Parenthood offers sex education and counseling and reproductive services, and coordinates with schools to provide education programs. There are two locations in metro Atlanta, in Cobb and Gwinnett counties. plannedparenthood.org

Sickle Cell Disease Association of America (SCDAA) provides resources to assist patients, family members, healthcare providers and medical social workers with the transition of patients with sickle cell disease from pediatric to adult care. sicklecelldisease.org

St. Joseph's Mercy Care Clinic is sponsored by the Sisters of Mercy and Saint Joseph's Health System. The clinic was created in 1985 by volunteer nurses and physicians and grew from modest beginnings into a "medical home" that provides an efficient, integrated system of primary medical care for adults and children, dental healthcare, behavioral health, education and social services reaching thousands of persons in need throughout Atlanta each year. There are 10 fixed-site clinics across metro Atlanta. Six other clinics are conducted in community partner facilities or onboard our mobile health coach. Their clinic services are available to the uninsured, underinsured, persons of low income, the homeless and HIV-positive individuals on a sliding-fee scale according to a patient's ability to pay. They offer resource referral, supportive services, case management and mental health assessment. They also provide health education programs on a variety of topics, including prenatal care, parenting and child education to Atlanta's Hispanic community. Contact: Downtown: 678-843-8600 North: 678-843-8700 City of Refuge: 678-843-8790. mercycareservices.org

ThinkFirst Program: The ThinkFirst Program provides free, research-based education to children and teens on the prevention of injuries related to the use of seat belts, helmets and lifestyle choices. Presentations are available for schools and community programs. Contact: 800-THINK-56. thinkfirst.org

Vaccines for Children (VFC) is intended to help raise childhood immunization levels in the U.S., especially for infants and young children. This effort requires wide participation and collaboration of private healthcare providers to reach children who might not otherwise receive vaccinations because of financial barriers or who might receive vaccines late because they would be referred to another setting for free vaccines. This federally funded program supplies vaccines free of charge to participating providers. The vaccine may then be made available to children up to 19 years of age who are enrolled in Medicaid, uninsured, underinsured (child has health insurance but immunizations are not a covered benefit), and/or American Indian or Alaska Native. dph.georgia.gov/vaccines-children-program


Children's
STRONG4LIFE
ong4Life.com


Get rest
to be
your best

Appendix D: Caregiver Focus Groups

FOCUS GROUP GUIDE

Introduction

Thank you for spending this time with us; we really appreciate it. Today, we want to talk about children's health—in other words, keeping them healthy—and healthcare, in general. We are not here to explore the specific medical conditions of individuals, but we'll discuss children's health and healthcare in the community.

There are no wrong answers. Be very honest, you won't hurt our feelings. It's important that we hear what you really think. Everyone talks and please be brief so that we hear from everyone, but please talk one at a time because we want to capture everyone's input. It's OK to disagree but be respectful.

We have a few note takers who will help with recording your thoughts. We will also record the discussion, but it's only for our work. (You will not be on TV.) We will focus on children, specifically birth to 18 years. We will discuss their health needs, major concerns and issues related to health and healthcare, and children's overall well-being.

Participant Introductions

First name:

1. When someone says children's health, what do you think of, in general?

    - Probe: Are you the primary person making health and healthcare decisions for a child or children? If not, who makes those decisions?

General child health and healthcare

2. What are the biggest challenges to children **staying healthy** in your community?

    - Probe: What is most needed to **support children's health** in your community?
    - Probe: What are the biggest health **challenges** for children in your community?

3. What types of **healthcare** are most needed for children in your community?

    - Probe: Nationally, these are some of the biggest children's **healthcare issues** that we see. Are there similar issues in your community?
        - Preventive care (routine doctor visits)
        - Emergency or urgent care
        - Specialty care (an example might be Neurologist or ENT)
        - General health needs might include physical or mental health concerns

4. What are the **health or healthcare** needs that are NOT met for children?

    - Probe: Are there issues with **gaps, access, or unmet needs** in keeping children **healthy**? Probe: Are there issues with **gaps, access, or unmet needs** in children's **healthcare**?
    - Probe: Are there gaps in children's **healthcare** from…?
        - Preventive care (routine doctor visits)

- Emergency or urgent care
- Specialty care (an example might be Neurologist or ENT)
- General health needs might include physical or mental health concerns

- Probe: Are there certain **areas** of the community or **members** of the community where you see **gaps** in children's health or healthcare?
  - What about geographically?
  - What about by income, race, etc.?

External Issues (social determinants)

5. Are there other factors that get in the way of **keeping children healthy** and getting them the **healthcare** they need?

- Probe: Are there issues with children's **health and healthcare** because of…
  - Inconvenient hours
  - Delays in getting care
  - Availability of needed services close by
  - Transportation
  - Financial—payment, insurance, hospital assistance
  - Coverage for needed services
  - Language
  - Other?
  - Is there anything that you can think of that would help with these issues?

- Probe: Are there broader issues that impact children's **health and healthcare**?
  - What about issues with…
    1. Housing
    2. Environment
    3. Food quality
    4. Food security
    5. Stigma
    6. Cultural barriers
    7. Language barriers
  - Is there anything that you can think of that would help with these issues?

Wellness and Prevention

6. Thinking about children's health in your community, what could be better or easier? **Most children start out generally healthy, what does your community need to keep them healthy?**

7. What helps children be **safe, healthy, and resilient** in your community? How could we better serve children to create an environment that helps them thrive?

- Probe: Some examples: walking paths, free affordable Y memberships, bus passes to hospital or doctor's office, more evening/weekend hours for doctors, other?

8. What else should we consider to support children's **health needs**? What **information** and community resources do families need to support their child's health and well-being?

9. How can **Children's Healthcare of Atlanta** better support children's **health and well-being** in your community?

10. Do you have a **medical home, pediatrician, or regular doctor** for your child(ren)?
    - If no, what makes it difficult to have a medical home or regular doctor for your child?
    - If yes, what helps make it possible to have a medical home or regular doctor?
    - Do you take your child for prevention or routine care to the doctor?
    - What makes it easy or difficult to take your child for prevention or routine care?

11. What are your main **sources of information** for your child's health, development, prevention or wellness topics for your child? This would be information about their normal development and building healthy habits for life.
    - What do you find most helpful or useful about these sources?
    - What is least helpful?
    - What topics or information about your child's health, wellness, or development would be most useful right now?
    - FOR PARENTS WITH CHILDREN UNDER AGE 5: Do you see your daycare or other childcare providers as sources of information? Why or why not?
    - FOR PARENTS OF CHILDREN OVER 5: Do you see your child's teacher or other school staff as sources of information? Why or why not?

FOCUS GROUP RESULTS

Parent and caregiver focus groups were conducted between March and April 2022, with 95 participants ranging in gender, education, income, race, geographic location, age of child(ren) and primary language spoken. Primary concerns were mental health, access, obesity, specialty care, dental care and issues affecting Hispanic or Latino communities.

Mixture of gender, race, education, location

2 Spanish speaking

8 English speaking

Distribution based on age of child(ren) and income

Caregivers remarked that "mental and physical well-being go together," citing the need for routine mental health checkups mirroring the physical health routine checkup schedule. Caregivers recognized the **mental health concerns facing children today—stress, bullying, body shaming and isolation from COVID-19—as well as how the mental health concerns presented with physical concerns.** Caregivers asked for pediatricians to take more time during well-child visits to properly evaluate children's mental health, leaving time for proper diagnosis and referrals as needed.

Access to care repeatedly came up through the sessions, with caregivers citing lack of both primary and specialty providers within their local community, cost of care, appointments, transportation and geographic location. One parent aptly said "Where you live affects the quality and frequency of care." Many caregivers specifically mentioned the lack of mental health providers, such as play therapy and cognitive behavioral therapy providers. Coupled with the lack of providers, caregivers also face lack of insurance coverage for providers in their community, including both mental, physical and developmental providers. One caregiver said "[finances] are the number one barrier to healthcare for children." Whether lack of insurance coverage, out-of-pocket costs or deductibles, families face financial difficulties when paying for healthcare for their children. Caregivers discussed appointment difficulties, such as inconvenient hours, wait times, rushed appointments, and offered solutions like after-hours appointments or multi-sibling well-child visit times. When appointments require time off from work, caregivers face further financial difficulty.

"You're told not to go to the ER. Where do you go?"

Beyond healthcare system constraints of limited providers, financial difficulty and appointment concerns, caregivers contend with geographical and transportation issues when accessing care. Beyond the metro-Atlanta area, public transit remains difficult or non-existent and many families have either one car or no car. Many facilities in outlying areas do not have pediatric-focused providers, especially at urgent care facilities. When **facing inconvenient hours, travel time upwards of an hour or more, rushed appointments, transportation costs and limited providers**, families feel the constraints to provide adequate care for their children.

Discussions of **childhood obesity centered on nutrient dense foods and opportunities for physical activity.** Groups across income ranges cited the high price of nutritious foods, such as milk, referencing recent inflation hikes. Some groups also shared concerns over steroids, genetically modified organisms (GMO), dyes, chemicals and high sugar. Most caregivers lacked affordable, healthy foods with no nearby grocery stores, farmers markets or fruit stands. Caregiver perceptions of school lunch were "insufficient quantities" and "not nutritious foods." They are also concerned about the lack of physical activity opportunities during the school day, saying "kids are not as active in schools." Caregivers offered solutions, including education on proper nutrition, community gardens, backpacks for weekend food, increased recess, greenspace or trails and affordable sports and fitness center opportunities.

Accessing **specialty care presented additional barriers** for families through long wait times to see specialists, lack of specialty care in suburban and non-metro areas, limited pediatric specialty providers and limited insurance coverage. Specific specialty areas discussed were mental health, neurology, gastrointestinal (GI), endocrine or diabetes care, dermatology and speech therapy. One caregiver mentioned that pediatric neurologists were "tough to find with a 1-year wait list and 1.5 hours away." Another caregiver shared "dermatologists don't specialize in young kids…only puberty." Families cited financial concerns for specialty care saying they would like more flexibility in price points for specialists.

"There is a lack of specialists that accept insurance."

Dental care was consistently mentioned, with caregivers expressing the need for consistent **dental checkups, dental insurance coverage** and care geared toward children to address their fears. Caregivers suggested school-based interventions to include toothbrush, toothpaste and instructions on proper dental care. Others mentioned mobile exams and dental clinics that visit schools and communities twice a year for preventive care.

Multiple groups, in addition to the Spanish-speaking groups, highlighted barriers **Hispanic or Latino** families face. Caregivers cited the **lack of bilingual or culturally sensitive providers**, as well as interpreters. The Spanish-speaking groups highlighted **asthma, diabetes, mental health, childhood obesity, dental health and attention deficit disorder** as the main health concerns in their communities. Immigrant families can lack information about how the U.S. healthcare system works, including how to access care. Caregivers suggested increased Spanish-language community resources and education about services in both English and Spanish. Multiple caregivers mentioned that parents prefer information in Spanish, while children prefer information in English, so offering both languages is helpful to the whole family.

Beyond health and healthcare concerns, families offered insights into social determinants of health or external issues and wellness/prevention efforts. Caregivers largely identified **health promotion and education** as key efforts within their community. Caregivers desired workshops to better understand their child's health, support identifying issues early (e.g., is my child's migraine something more?) and further support on healthy communication or positive discipline. Educational attainment was mentioned as an important component of their children's health; **health literacy** impacts the care their child receives, **"I can't always understand what the doctor is saying."** Caregivers are overwhelmed by the amount of information and many mistrust information sources, like the Centers for Disease Control and Prevention (CDC) saying "medical care for kids is political." Caregivers desired support groups with caregivers facing similar issues as their own.

In summary, to **keep kids healthy**, caregivers focused on adequate and nutritious foods, opportunities for physical activity, respect for cultural and ethnic differences, screenings in schools, limited screen time, list of community resources and support for children's mental health.

A full report is available upon request.

Appendix E: Qualitative Interviews

Interview Guide

1. **Describe the population you serve. Out of the system, support in the system, young people transitioning, strengthen welfare system overall**
    - Probe: Age, region, race, ethnicity, socioeconomic status?
    - Probe: Overall health of the youth in your community?

2. **Who in your community do you consider to be the most vulnerable or at risk for health concerns?**
    - Probe: Poor nutrition, physical activity, mental health, etc.
    - Probe: Why?
    - Probe: Undocumented families or mixed status are higher risk, families tend to stay in shadows more

3. **What would you say are the biggest health concerns or problems in your community?**
    - Probe: Any critical overarching health concerns? Physical, Emotional, Mental, Social or System related health concerns.
    - Probe: What are the biggest health concerns in underserved families? Low-income families? Trends among different races, ethnicities?
    - Probe: What contributes to different concerns?

    Define Children's approach to Whole-Child Wellness: Building healthy, safe, resilient children (birth to 17 years)
    - Development
    - Nutrition/healthy eating
    - Physical activity
    - Mental and behavioral health
    - Illness treatment
    - Illness prevention
    - Injury prevention/safety

4. **What are some things that make it difficult for families in your community to raise safe, healthy, resilient children?**
    - Probe: Laws, access to affordable care, transportation, time, lack of knowledge, variety of information/misinformation, Structural/environmental conditions, food deserts, etc.
    - Probe: Are the biggest barriers at the individual level? Organizational level? Or environmental level?

    In your opinion, what is the best way to address these issues?
    - Probe: How would you approach fixing these issues?
    - Probe: How does a community build or support raising safe, healthy, resilient children?

5. **What are the most utilized programs and/or resources that help families in your community raise healthy, safe, resilient children?**

    How effective do you believe them to be?

    What are some programs/resources that would be helpful that families in your community currently don't have access to?

6. **How would you rate Children's Healthcare of Atlanta when it comes to:**

    Clinical care?
    - Probe: Why?

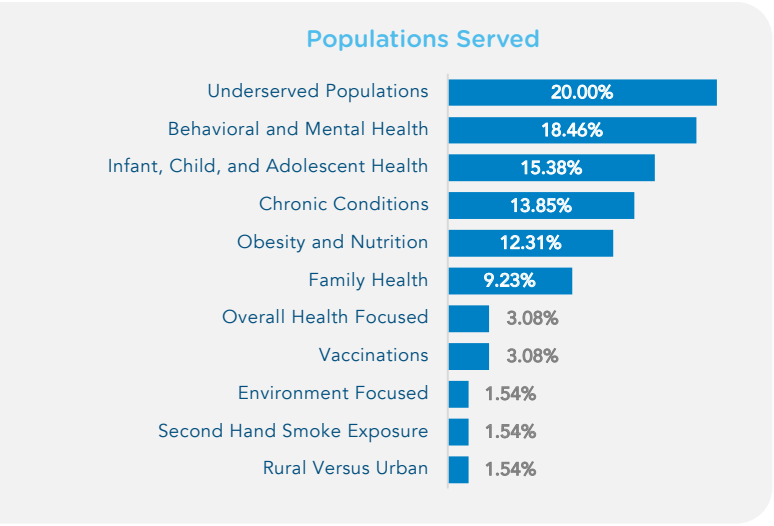
    Helping to meet the needs of the community? Children's trusted anchor institution for medical/resources
    - Probe: Why?

    Strengths? Weaknesses? How can these be improved?

7. **Is there anything else you'd like to add?**

Qualitative Interview Results

We conducted 15 interviews of middle- to upper-leadership from state and local organizations who currently serve families and children. Interviews took place from April to June 2022. Each interview was 30 minutes in length. Notes were taken during each interview and analyzed for common themes. Common themes throughout the interviews were underserved populations, behavioral and mental health, obesity and nutrition, chronic conditions, rural populations and environment.

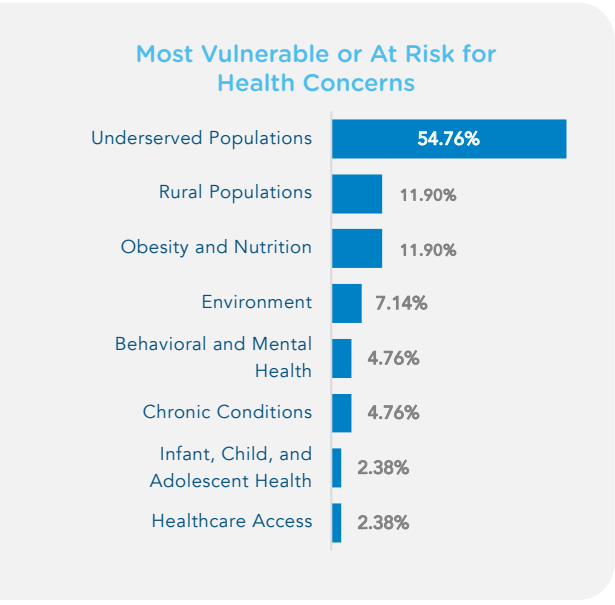


Description of the population served

Interview participants were asked to describe the population they served in terms of demographics and the overall health of the youth in their community. Several of the participants described the population they served as an underserved population, such as people of color, low socioeconomic status, uninsured or underinsured individuals and people with a low educational attainment. Another way they population was described was people with behavioral and mental health issues. Some mentioned there have always been issues with behavioral and mental health, but that COVID-19 exacerbated the issues. One participant commented, "higher rates of other psychiatric issues-anxiety, depression, suicidality, mental health on rise since COVID."

Population in community considered most vulnerable or at risk for health concerns

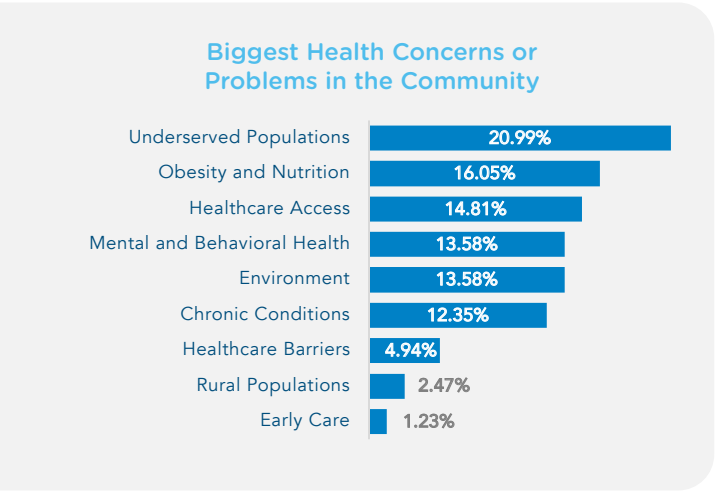
When describing the population in their community that they believe is most vulnerable or at risk for health concerns, a vast majority of the comments described underserved populations. The participants specifically mentioned poverty or people with a low socioeconomic status, those who are uninsured or underinsured, people of color, immigrant populations, people with cultural differences, those who speak a different language, populations experiencing homelessness and LGBTQ populations. When describing the list of populations at risk, one participant stated, "Populations that are normally disproportionately impacted in everyday life." Participants discussed that the people in these underserved populations do not receive the care that they need and are treated differently. One participant mentioned that some of these populations are afraid to get the care that they need.



Other groups of people who were mentioned numerous times as most vulnerable or at risk for health concerns were people in rural communities, environment and issues with obesity and nutrition, such as overweight, food insecurities and lack of access to healthy foods. People in rural areas were mentioned to have a more difficult time getting access to care, and people who have trouble with housing and transportation were mentioned as at risk as well.

Biggest health concerns or problems in community

When asked what the biggest health concerns or problems in their communities were, underserved populations were again the largest group described. Participants mentioned there is an issue with resources for these groups of people, whether it be having trouble paying for quality healthcare, not being able to receive care due to lack of insurance, not having enough coverage on their insurance or having trouble with culturally responsive care where people can feel safe.



Obesity and nutrition issues came up numerous times. One participant described widespread issues with nutrition as, "kids starving, poor diets, getting sufficient calories to live but not quality calories to become their best." Also mentioned several times was healthcare access, mental and behavioral health and environment. For healthcare access, not being able to get an appointment with primary or specialty care, lack of services and telehealth not being accessible were some of the problems in the communities that were described. Environmental health issues, housing issues, lack of opportunities for athletic activities, issues with internet or phone access and transportation issues were discussed as problems in the community as well. These issues make it difficult for individuals to receive the care they need.

Additional Analysis

The remaining responses were inconsistent with the common themes across interviews. Each interview participant offered additional important insight based on their role in working with children and adolescents.

Things that make it difficult for families to raise safe, healthy, resilient children

An additional response mentioned numerous times was that parents and caregivers are not provided with the relevant educational materials needed to teach their children. One participant mentioned that parents lack resilience themselves. A few participants stated the cost of living is too high or that "structures and systems are not built to set parents up for success—cost of living is overwhelming, every caregiver and parent is working—cost of housing, everything is so much higher." Aside from these responses, there were things such as time, peer pressure to make bad decisions, transportation, issues with insurance, that were mentioned that make it difficult for families to raise safe, healthy, resilient children.

Partnership was one of the key suggestions mention for how to address these issues, whether it be with schools, families, ambassadors, community-based organizations, or changes through policy or legislative action. The believed there needed to be creation of trust to provide the information needed to help with raising these children who are considered safe, healthy, and resilient.

Most utilized programs and/or resources that help families in your community currently don't have access to

Using community resources like SNAP, food pantries, rental assistance or financial assistance programs were some of the programs or resources mentioned that families don't utilize. Others mentioned broad idea like, systems where all parties work together on providing education. Although described as a need, having a safe place where trust has been built came up again during this discussion.

Rating of Children's Healthcare of Atlanta when it comes to clinical care

Children's Healthcare of Atlanta was overwhelming described in a positive light when it comes to clinical care. Some of the comments were, "Top notch, premier organization for care for young children", "Excellent 10/10", "highest level".

Rating of Children's Healthcare of Atlanta when it comes to helping to meet the needs of the community

Children's Healthcare of Atlanta, again, was rate highly when it came to meeting the needs of the community including being mentioned numerous times as a trusted voice, but there were suggestions of what Children's could to help improve in this initiative. One person mentioned no one works with adolescents, and we need more people to work with them. Awareness of services also came up a few times. One participant mentioned people do not know about the services provided by Children's Healthcare of Atlanta, that pediatricians are not mentioning them. In the same thought, another participant mentioned physicians need to point parents to the right resources. A few people also mentioned the need of providing resources and trainings on the topic of behavioral and mental health concerns. A couple of people also mentioned expanding Children's access into other areas like the suburbs of Atlanta. One person mentioned providing mobile units to the community as a solution.

Appendix F: Quantitative Survey

SURVEY INSTRUMENT

1. Date: _____

Demographics

2. First Name: _____
3. Last Name: _____
4. Email: _____
5. Sex:
   a. Male
   b. Female
   c. Other
   d. Prefer not to answer
6. Race: (Select all that apply)
   a. White
   b. Black or African American
   c. Asian
   d. American Indian or Alaska Native
   e. Native Hawaiian or Other Pacific Islander
   f. Prefer not to answer
7. Ethnicity:
   a. Hispanic or Latino
   b. Non-Hispanic or Latino
   c. Prefer not to answer
8. Select the primary sector(s) in which you work. (Select all that apply)
   a. Clinical (Hospital, primary care, etc.)
   b. Early Care
   c. Schools
   d. Research/Academia
   e. Government
   f. Non-Profit
   g. Other: _____
9. Role [Q8=A]:
   a. MD/DO
   b. NP
   c. RN
   d. PA
   e. RD
   f. Administrator
   g. Other: _____

10. Role [Q8=B]:
    a. Teacher/Teacher Assistant
    b. Director/Assistant Director
    c. Family Engagement Staff
    d. Nutrition/Health Staff
    e. Cook/Chef
    f. Other: _____

11. Role [Q8=C]
    a. Teacher/Teacher Assistant
    b. School Nurse
    c. Administrator
    d. Social Worker
    e. Counselor
    f. Health/PE Staff
    g. Nutrition Staff
    h. Support Staff
    i. Other: _____

12. Primary city you serve:
    [List]

13. Primary county you serve:
    [List]

14. Primary zip-code you serve: _____

Health and Wellness

15. Rank the following health and wellness topic areas based on the needs of the community you serve.
    (1=Highest Need, 11=Lowest Need)
    a. Adolescent Health
    b. Chronic Disease Prevention and Management
    c. Community Outreach
    d. Healthcare Access and Coordination
    e. Healthcare Literacy
    f. Infectious Disease Prevention and Management
    g. Injury Prevention
    h. Mental and Behavioral Health
    i. Obesity
    j. Oral Health
    k. Primary care or Medical Home (Team-based approach aimed to deliver ongoing, coordinated care)

16. Are there any other health and wellness topic areas that weren't included in the list above? If so, please list.

    _____

We would like to better understand the highest ranked topics you selected. Please answer the following questions about your top 3 selections

About Mental and Behavioral Health

17. From the following list, which items require the most support in the community you serve? (Select all that apply).
    a. Programs focused on the prevention of behavioral and mental health concerns/ support of emotional wellness
    b. Mental Health routine check-ups
    c. Education on mental health specialist roles (LCSW, Psychologist, LPC, etc.)
    d. Education on the referral process and types of care (therapeutic approaches, modalities, certifications, etc.)
    e. Access to mental and behavioral health specialists
    f. Stigma
    g. Screening, assessment and early intervention screening tools
    h. Crisis care
    i. Other: _____

18. For this topic, which age groups do you think have the highest need? (Select all that apply)
    a. Infant (0-1 years)
    b. Toddler (1-3 years)
    c. Pre-schooler (3-5 years)
    d. Middle Childhood (6-11 years)
    e. Adolescent (12-17 years)

About Obesity

19. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Feeding and Nutrition education
    b. Movement and Physical Activity Education
    c. Obesity Prevention
    d. Food Insecurity
    e. Access to healthy foods
    f. Access to specialty providers (registered dietitians, endocrinologists, obesity specialist physicians)
    g. Screen time
    h. Other: _____

20. For this topic, which age groups do you think have the highest need? (Select all that apply)
    a. Infant (0-1 years)
    b. Toddler (1-3 years)
    c. Pre-schooler (3-5 years)
    d. Middle Childhood (6-11 years)
    e. Adolescent (12-17 years)

About Injury Prevention

21. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Safe sleep education and awareness
    b. Playground safety
    c. Home or indoor hazards education and prevention (e.g., safe firearm storage, medication storage)
    d. Outdoor hazards education and prevention (e.g., water safety, sun safety)
    e. Child abuse and neglect detection and prevention
    f. Car safety education
    g. Access to safety equipment (e.g., car seats, cribs, helmets, gun lock boxes)
    h. Other: _____

About Infectious Disease Prevention and Management

22. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Education on how to stop the spread of communicable diseases
    b. Vaccine Education
    c. Access to primary and urgent care for acute, communicable diseases
    d. Other: _____

23. For this topic, which age groups do you think have the highest need? (Select all that apply)
    a. Infant (0-1 years)
    b. Toddler (1-3 years)
    c. Pre-schooler (3-5 years)
    d. Middle Childhood (6-11 years)
    e. Adolescent (12-17 years)

About Chronic Disease Prevention and Management

24. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Obesity Management Education
    b. Asthma Detection and Management Education
    c. Allergies Management Education
    d. Developmental Delay Screening and Management Education
    e. Epilepsy Management Education
    f. Mental Illness Detection and Management Education
    g. Eating Disorders Detection and Management Education
    h. Diabetes Prevention and Management Education
    i. Access to specialty care
    j. Other: _____

25. For this topic, which age groups do you think have the highest need? (Select all that apply)
    a. Infant (0-1 years)
    b. Toddler (1-3 years)
    c. Pre-schooler (3-5 years)
    d. Middle Childhood (6-11 years)
    e. Adolescent (12-17 years)

About Adolescent Health

26. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Reproductive Health Education (STI's, Contraception)
    b. Tobacco use, Cigarette Smoking and Vaping
    c. Motor Vehicle Safety
    d. Eating Disorders Detection and Management Education
    e. Bullying
    f. Drug and alcohol use
    g. Healthy Sleep Routines
    h. Depression and Anxiety Detection and Management Education
    i. Access to adolescent specialized care
    j. Other: _____

About Healthcare Access and Coordination

27. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Insurance coverage
    b. Insurance affordability
    c. Insurance enrollment
    d. Primary Care Access
    e. Specialty Care Access
    f. Dental care Access
    g. Telehealth Access
    h. Access to Translators or Interpreters
    i. Access to Mental and Behavioral Health Specialists
    j. Access to Cross-cultural providers
    k. Access to services for unhoused people
    l. Access to services for people with disabilities
    m. Healthcare system education
    n. Health and Nurse Navigation (i.e., community health work or nurse to support families within the healthcare system)
    o. Other: _____

About Healthcare Literacy

28. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Insurance education
    b. Education on primary and specialty care roles
    c. Education on mental and behavioral health specialist roles
    d. Education on health risks
    e. Education on medical forms
    f. Cultural or language barriers
    g. Other: _____

About Community Outreach

29. From the following list, what items require the most support in the community you serve? (Select all that apply)
    a. Education events (Health, Nutrition)
    b. Healthcare service events (mobile clinics, vaccine clinics, health fairs)
    c. Food access events or activities (drives, community gardens)
    d. Access to spaces for outdoor activities (bike lanes, skate parks, trails, parks, etc.)
    e. Other: _____

30. For the health and wellness topics you ranked above, what actionable things can Children's do in these areas?

    _____

31. Which of the following social determinants of health domains do you consider have the most impact in the health and wellness needs of the community you serve? Select all that apply.
    a. Economic Stability (financial resources, cost of living, socioeconomic status)
    b. Education Access and Quality (educational attainment, childhood education and development)
    c. Healthcare Access and Quality (primary care, health insurance, health literacy)
    d. Neighborhood and Built Environment (housing, transportation, air and water quality, availability of healthy foods)

About Economic Stability

32. Which of the following topics on Economic Stability do you consider have the most impact in the health and wellness needs of the community you serve? Select your top 3.
    a. Unemployment
    b. School Withdrawal
    c. Poverty
    d. Work opportunities
    e. Affordable Housing
    f. Food Security
    g. Workplace compensation and benefits
    h. Other: _____

About Education Access and Quality

33. Which of the following topics on Education Access and Quality do you consider have the most impact in the health and wellness needs of the community you serve? Select your top 3.
    a. High Quality Early Care and Childcare
    b. Reading and math literacy
    c. School Readiness
    d. High School Diploma or equivalent degree attainment
    e. Postsecondary school enrollment
    f. High Educational Attainment
    g. Resources for People with Disabilities
    h. Other: _____

About Healthcare Access and Quality

34. Which of the following topics on Healthcare Access and Quality do you consider have the most impact in the health and wellness needs of the community you serve? Select your top 3.
    a. Preventive healthcare
    b. Adequate healthcare services wait time
    c. Healthcare screening
    d. Specialty care intervention services
    e. Substance abuse management services
    f. Reproductive health services and care
    g. Affordable healthcare access
    h. Provider communication with patient
    i. Telehealth
    j. Prenatal care
    k. Other: _____

About Neighborhood and Built Environment

35. Which of the following topics on Neighborhood and Built Environment do you consider have the most impact in the health and wellness needs of the community you serve? Select your top 3.
    a. Neighborhood violence
    b. Internet access
    c. Water quality
    d. Air Pollution
    e. Health and environmental risks
    f. Hazardous sites in proximity to neighborhood
    g. Motor Vehicle Accidents
    h. Wheelchair access
    i. Neighborhood active mobility (walking trails and biking lanes)
    j. Public transportation access
    k. Urban vs. Rural
    l. Other: _____

SURVEY RESULTS

Health & Wellness Ranking

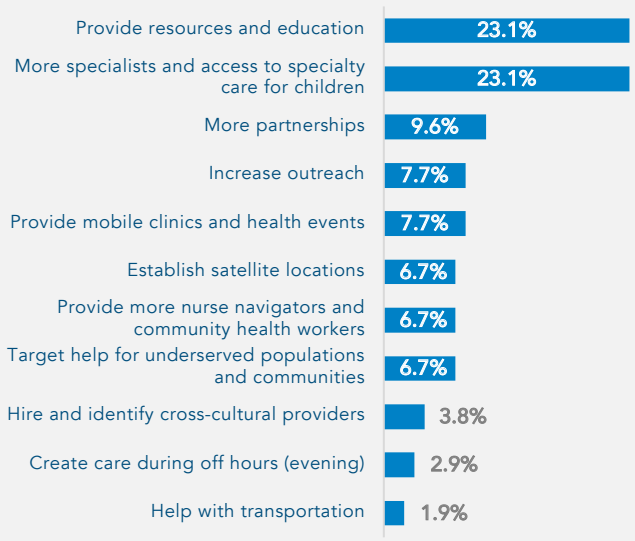
Health & Wellness Topics	Ranking
Mental and Behavioral Health	1
Healthcare Access and Coordination	2
Chronic Disease Prevention and Management	3
Adolescent Health	4
Obesity	5
Infectious Disease Prevention and Management	6
Community Outreach	7
Injury Prevention	8
Primary Care or Medical Home (Team-based approach aimed to deliver ongoing, coordinated care)	9
Healthcare Literacy	10
Oral Health	11

Health and Wellness Topics Not Discussed

The following list are topics not discussed in the survey and where identified as topics that need to be covered:

1. Provider and staff self-care
2. LGBTQ+ health and wellness needs
3. Free emergency medication

Actionable Things Children's Healthcare of Atlanta Could Do in the Health & Wellness Topic Areas



Participants were asked to share what actionable things Children's Healthcare of Atlanta could to for each of the Health & Wellness topics they chose at a top need in the community they served. 23.1% of participants indicated Children's needed to hire more specialist and the children needed more access to healthcare they needed. Mental and behavioral health and dental care were mentioned they most when discussing the need for access to healthcare. They also stated Children's should provide more resources and education, not only to children and their families, but also provide training to healthcare workers, specifically mental and behavioral health, to help with the need of specialists (23.1%). One person stressed the need for the help sooner rather than later, but also expressed their understanding that change takes time, "We need these resources now but it might take years to balance the resource with the need. The short term bridge might be to educat[e] primary care ped[iatricians] on mental health. Residency programs should be addressing this now as well." Some participants (9.6%) suggested partnership to help deal with some of the health and wellness needs. Partnership examples included pediatricians, community organizations, early education providers, other public and private entities, etc. The partnerships would help provide education, lower costs of service, and sharing resources.

Another suggestion that came up to help with the health and wellness needs was to increase outreach with education and resources, with one suggestion of targeting the avenues adolescents often use, "Utilize social media and internet for educational campaigns to reach youth where they see it." Participants also suggested having mobile clinics and health community events to help bring care to people. One person suggested to host "clinic events where multiple specialists are together at one place to allow caregivers/patients to have contact with several providers in a single visit."

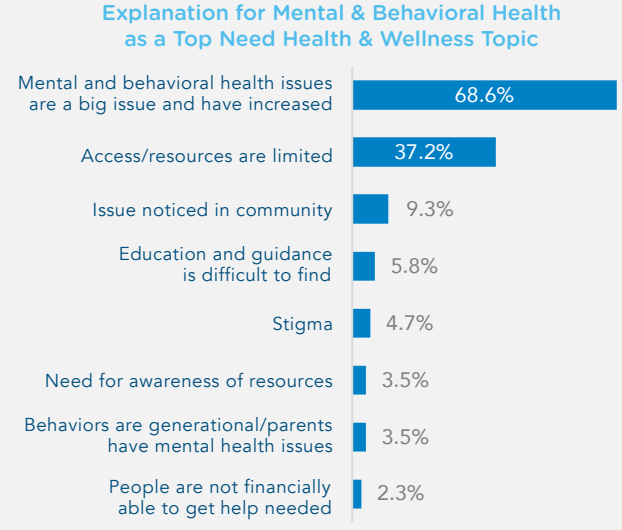
Mental & Behavioral Health

Behavioral & Mental Health: Require the Most Support	N
Access to mental and behavioral health specialists	77
Programs focused on the prevention of behavioral and mental health concerns/ support of emotional wellness	60
Screening, assessment and early intervention screening tools	46
Crisis care	46
Mental health routine check-ups	38
Education on mental health specialist roles (LCSW, Psychologist, LPC, etc.)	25
Education on the referral process and types of care (therapeutic approaches, modalities, certifications, etc.)	23
Stigma	17
Other (chronic anxiety flair-ups, HHB outpatient specialists)	2

Behavioral & Mental Health: Age Groups with Highest Need	N
Adolescent (12-17 years)	82
Middle childhood (6-11 years)	57
Pre-schooler (3-5 years)	17
Toddler (1-3 years)	7
Infant (0-1 years)	4

Explanation of Top Health & Wellness Need Selection

Participants were asked to please explain why they chose this Health & Wellness topic as one of the top needs in the community you serve. A majority of the participants who chose this as a top need (68.6%) indicated mental and behavioral health is currently a big issue and has increased in their community. Several participants stated this was due to COVID-19 or traumas children are expecting at home or seeing in the media, like school shootings. Many participants (37.2%) also stated access to resources needed for treating these issues is difficult to find and very limited. Because there is such an increase in mental and behavioral health issues, in all ages, there are not enough specialist available to help. Some participants stated they do not have education or expertise to help in that area.

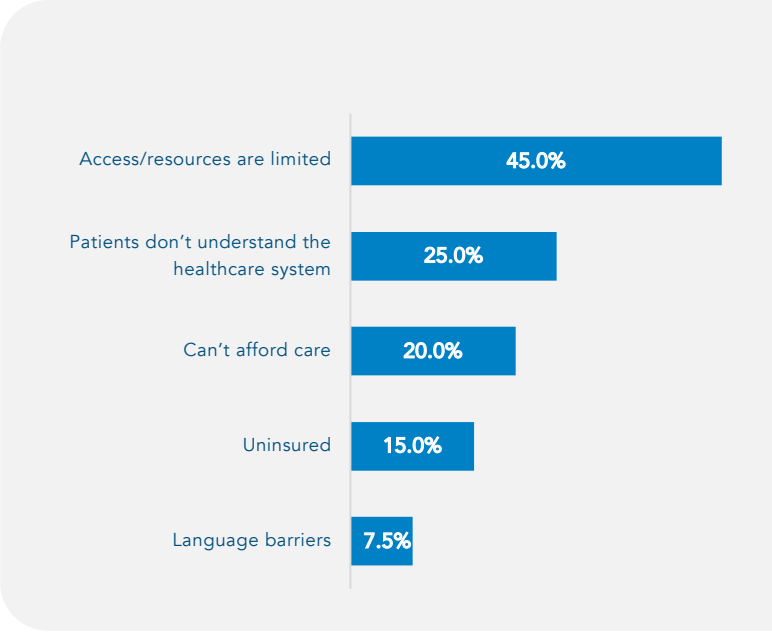


Healthcare Access and Coordination

Healthcare Access & Coordination: Require the Most Support	N
Access to mental and behavioral health specialists	87
Primary care access	52
Insurance coverage	49
Specialty care access	47
Insurance affordability	44
Dental care access	43
Health and nurse navigation (community health work or nurse to support families within the healthcare system)	37
Access to cross-cultural providers	29
Healthcare system education	29
Access to translators or interpreters	27
Access to services for people with disabilities	26
Insurance enrollment	21
Access to services for unhoused people	19
Telehealth access	16
Other (parent education tools for each topic)	1

Explanation of Top Health & Wellness Need Selection

Participants were asked to please explain why they chose this Health & Wellness topic as one of the top needs in the community you serve. Nearly half of the people (45%) who chose Healthcare Access and Coordination as a top need stated healthcare access is difficult, whether it be because people in their community cannot find specialty care or wait times for appointments are long. Similarly, healthcare resources are limited, which affects these issues as well. 25% of participants also mentioned patients do not understand the healthcare system or how to navigate it. Another issue related to healthcare access and coordination is the issue of people not being able to afford the care they need or being uninsured impacting the care they are able to receive (35%).



Chronic Disease Prevention & Management

Chronic Disease Prevention & Management: Require the Most Support	N
Mental illness	23
Obesity	19
Developmental delay	19
Diabetes	19
Asthma	17
Access to specialty care	13
Allergies	12
Epilepsy	3
Eating disorders	3

Chronic Disease Prevention & Management: Age Groups with Highest Need	N
Middle childhood (6-11 years)	23
Adolescent (12-17 years)	22
Pre-schooler (3-5 years)	17
Toddler (1-3 years)	10
Infant (0-1 years)	4

Explanation of Top Health & Wellness Need Selection

Participants were asked to please explain why they chose this Health & Wellness topic as one of the top needs in the community you serve. Over half of the participants (51.2%) who identified chronic disease prevention and management stated a large portion of the people they see in their community have at least one chronic condition. Some people stated they have seen an increase in the number of patients they see with chronic conditions like diabetes, obesity, asthma, heart diseases, etc. Many participants stressed the need for education for families and patients on their conditions and how to manage them properly (27.3%). Like they other top categories, many people mentioned there are issues with access to care and resources are limited due to a shortage in healthcare workers (27.3%).

Adolescent Health

Adolescent Health: Require the Most Support	N
Depression and anxiety	33
Drugs and alcohol use	27
Bullying	26
Tobacco use and vaping (smoking, chewing, sniffing)	23
Healthy sleep routines	15
Reproductive health (STIs, contraception)	14
Eating disorders	13
Access to adolescent specialized care	12
Motor vehicle safety	11
Other (basic hygiene, gun violence, self-harm)	3

Obesity

Obesity: Require the Most Support	N
Movement and physical activity education	24
Feeding and nutrition education	21
Obesity prevention	19
Access to healthy foods	19
Access to specialty providers (registered dietitians, endocrinologists, obesity specialist physicians)	17
Food insecurity	15
Screen time	12
Other (fast food restaurants in the same vicinity, better nutrition limitations at school)	1

Obesity: Age Groups with Highest Need	N
Middle childhood (6-11 years)	28
Adolescent (12-17 years)	21
Pre-schooler (3-5 years)	17
Toddler (1-3 years)	9
Infant (0-1 years)	6

Infectious Disease Prevention & Management

Infectious Disease Prevention & Management: Require the Most Support	N
Access to primary and urgent care for acute, communicable diseases	11
Vaccine education	10
Education on how to stop the spread of communicable diseases	7

Infectious Disease Prevention & Management: Age Groups with Highest Need	N
Adolescent (12-17 years)	10
Middle childhood (6-11 years)	9
Toddler (1-3 years)	7
Pre-schooler (3-5 years)	7
Infant (0-1 years)	6

Community Outreach

Community Outreach: Require the Most Support	N
Education events (health, nutrition)	20
Healthcare service events (mobile clinics, vaccine clinics, health fairs)	18
Food access events or activities (drives, community gardens)	9

Injury Prevention

Injury Prevention: Require the Most Support	N
Home or indoor hazards education and prevention (safe firearm storage, medication storage)	12
Child abuse and neglect detection and prevention	11
Car safety education	9
Safe sleep education and awareness	7
Playground safety	7
Outdoor hazards education and prevention (water safety, sun safety)	7
Access to safety equipment (car seats, cribs, helmets, gun lock boxes)	7
Other (drug and substance abuse in children)	2

Primary Care or Medical Home

Primary Care or Medical Home: Require the Most Support	N
Access to providers	19
Insurance coverage	17
Affordability	16
Other (education on benefits of a medical home, access to providers in rural areas, education of insurance coverage, coordination of care)	4

Healthcare Literacy

Healthcare Literacy: Require the Most Support	N
Education on mental and behavioral health specialist roles	8
Cultural or language barriers	8
Insurance education	6
Education on health risks	6
Education on primary and specialty care roles	3
Education on medical forms and billing (applications, doctor office forms, insurance forms, medical history, etc.)	2

Oral Health

Oral Health: Require the Most Support	N
Access to oral health specialty providers	11
Access to oral health providers	10
Affordability	9
Insurance coverage	8
Other (oral health knowledge and providers for people with special needs)	2

Oral Health: Age Groups with Highest Need	N
Pre-schooler (3-5 years)	10
Middle childhood (6-11 years)	10
Adolescent (12-17 years)	7
Toddler (1-3 years)	4
Infant (0-1 years)	1

Social Determinants of Health Topic Counts

Most Impactful Social Determinants of Health on Health & Wellness Needs	N
Economic Stability	76
Healthcare Access & Quality	66
Education Access & Quality	44
Neighborhood & Built Environment	41

Economic Stability

Economic Stability: Most Impactful on Health & Wellness Needs	N
Poverty	55
Affordable housing	45
Unemployment	32
Food security	26
Workplace compensation and benefits	15
Work opportunities	12
School withdrawal	9
Other (transportation need, parenting skills, cost of living)	3

Healthcare Access & Quality

Healthcare Access & Quality: Most Impactful on Health & Wellness Needs	N
Preventive healthcare	47
Affordable healthcare access	35
Specialty care intervention services	23
Healthcare screening	20
Substance abuse management services	19
Adequate healthcare services wait time	13
Provider communication with patient	10
Prenatal care	5
Reproductive health services and care	4
Telehealth	4
Other (mental health, school telehealth program, cost of living)	3

Education Access & Quality

Education Access & Quality: Most Impactful on Health & Wellness Needs	N
High quality early care and childcare	34
Reading and math literacy	24
School readiness	17
Resources for people with disabilities	15
High school diploma or equivalent degree attainment	11
High educational attainment	10
Postsecondary school enrollment	2
Other (alternatives to screentime)	1

Neighborhood & Built Environment

Neighborhood & Built Environment: Most Impactful on Health & Wellness Needs	N
Neighborhood violence	27
Health and environmental risks	20
Neighborhood active mobility (walking trails, biking lanes, skate parks)	16
Public transportation access	16
Internet access	11
Urban vs. rural	6
Air pollution	5
Water quality	4
Hazardous sites in proximity to neighborhood	3
Motor vehicle accidents	3

Demographics

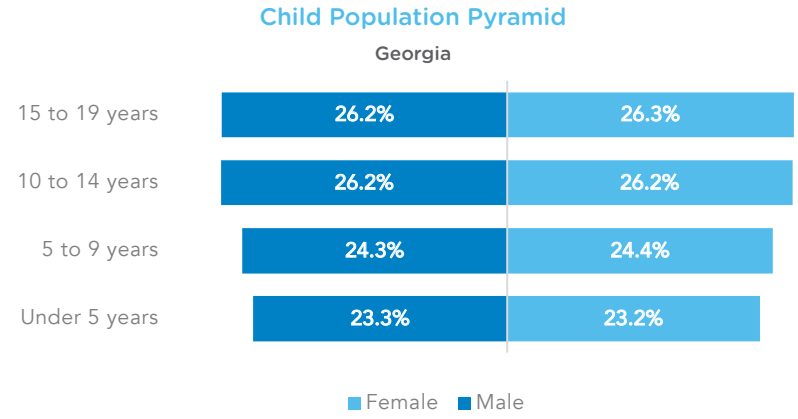
Demographics	%	N
Sex		
Female	**78.3%**	**90**
Male	20.9%	24
Prefer not to answer	0.9%	1
Race		
White	**67.0%**	**77**
Black or African American	24.3%	28
Asian	4.3%	5
Prefer not to answer	3.5%	4
Multiracial	0.9%	1
Ethnicity		
Non-Hispanic or Latino	**97.4%**	**112**
Prefer not to answer	1.7%	2
Hispanic or Latino	0.9%	1
Primary Sector		
Schools	**41.7%**	**48**
Clinical (Hospital, primary care, etc.)	21.7%	25
Government	17.4%	20
Early Care	9.6%	11
Multiple Primary Sectors	6.1%	7
Non-Profit	2.6%	3
Other (Public Health)	0.9%	1
Clinical Role		
MD/DO	**92.6%**	**25**
RN	7.4%	2
Early Care Role		
Director/Assistant Director	**76.9%**	**10**
Nutrition/Health Staff	15.4%	2
Other (Education Coordinator)	7.7%	1
School Role		
School Nurse	**40.0%**	**20**
Administrator	32.0%	16
Other	14.0%	7
Nutrition Staff	8.0%	4
Health/PE Staff	4.0%	2
Support Staff	2.0%	1

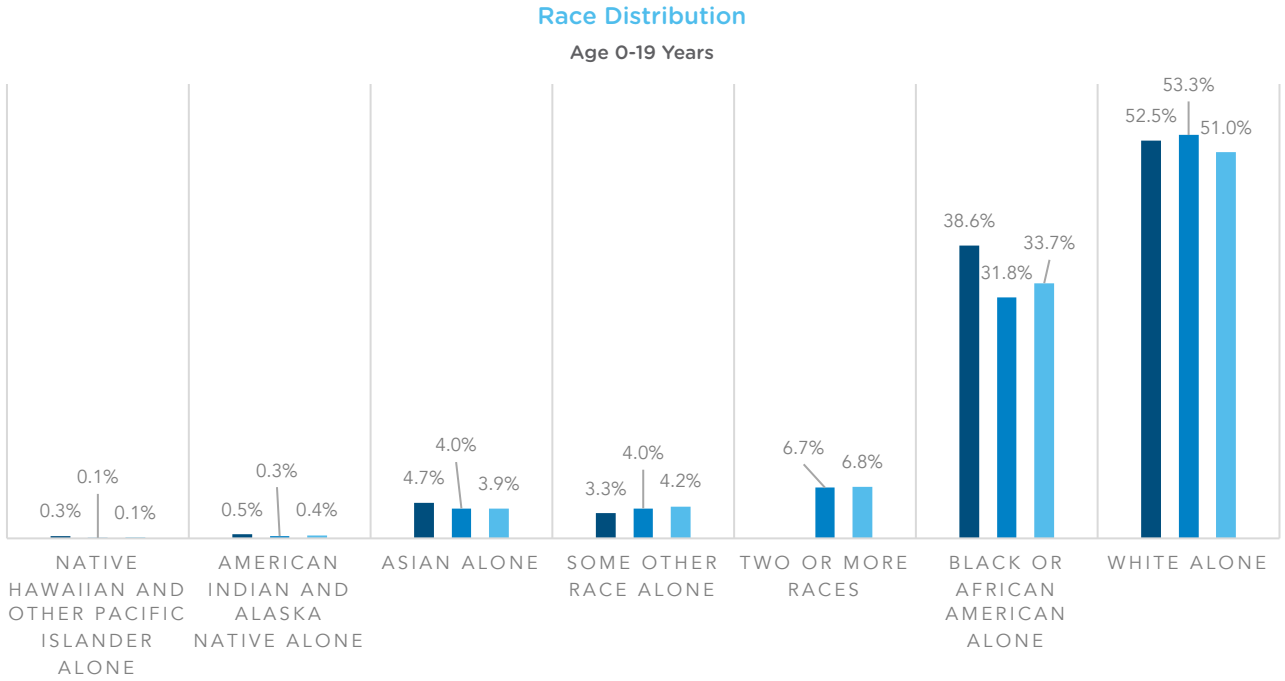
Appendix G: Expanded Description of Health Needs and Data Compilation

Data Compilation Methodology

Secondary data sources were used to describe the demographic characteristics of the patients and community served by Children's Healthcare of Atlanta. They were also used to describe and identify relevant health and wellness topics, and the social determinants of health that influence them, presenting the differences between our service area (primarily covering Atlanta and the metro area), Georgia, and the U.S. Patient data was obtained to present the demographic characteristics of the youth served by the organization and to identify counties from which Children's receives high numbers of patients.

Demographic Tables and Figures





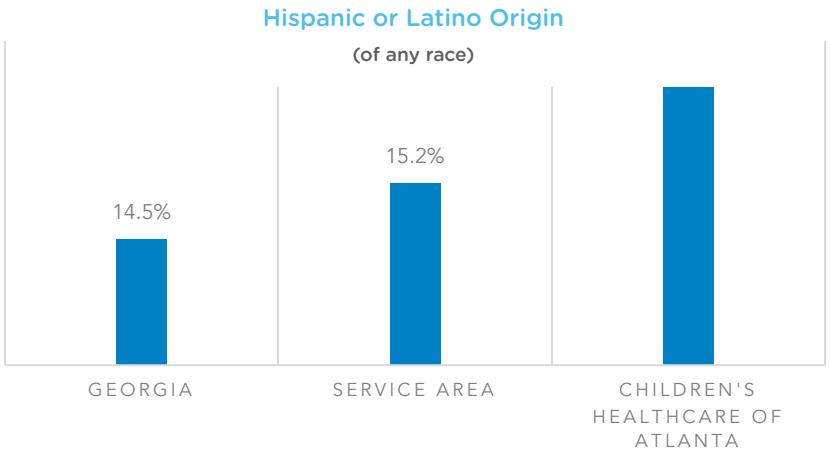
Family Demographics

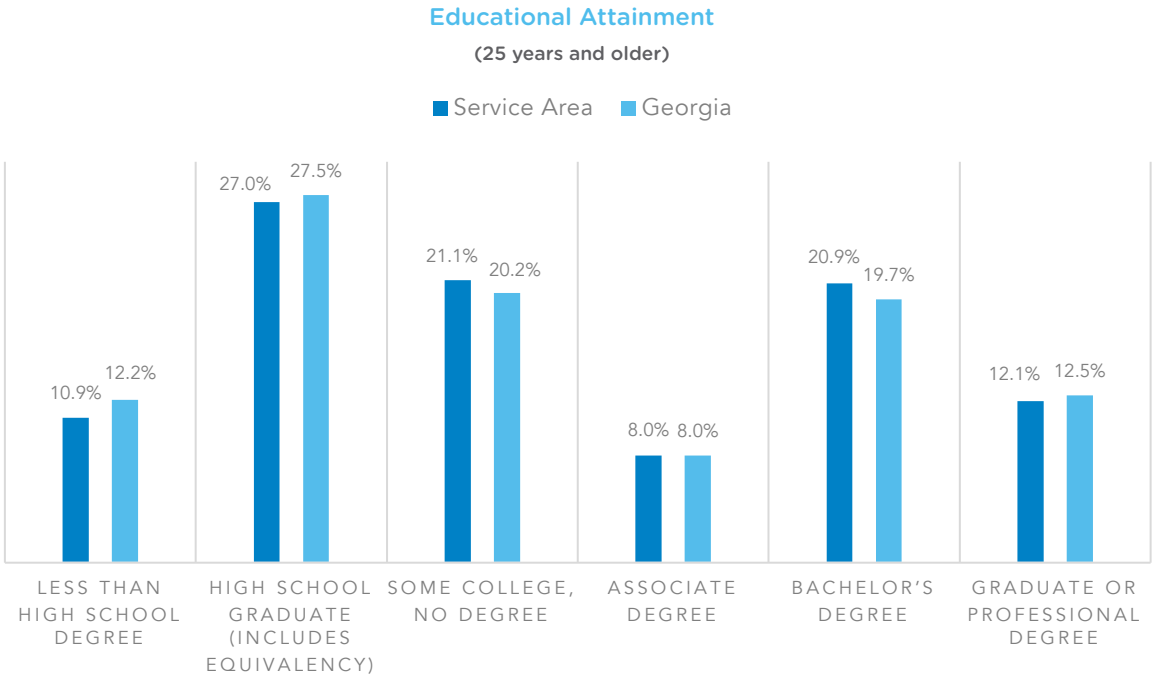
Family Demographics	Service Area	Georgia
Relationship to Householder		
Own child (biological, step or adopted)	86.0%	85.9%
Grandchild	9.5%	9.5%
Other relatives	2.9%	2.9%
Foster child or other unrelated child	1.6%	1.7%
Nativity		
Foreign born	2.8%	2.8%
Presence of Other Adult		
Unmarried partner of householder present	6.4%	6.8%
Household Type		
Married-couple household	52.3%	47.4%
Cohabiting couple household	5.6%	5.4%
Male householder, no spouse/partner present	14.9%	17.0%
Female householder, no spouse/partner present	27.3%	30.2%
Family Income		
Median Income	$81,058	$70,326
Public Assistance		
Children living in households with Supplemental Security Income (SSI), cash public assistance income, or Food Stamp/SNAP benefits	22.5%	26.7%

Source: 2016-2020 American Community Survey

Other Demographics	Children's Healthcare of Atlanta	Service Area	Georgia
Sex			
Male	51.4%	50.8%	50.9%
Female	48.6%	49.2%	49.1%
Language			
English	90.1%	85.3%	86.0%
Other languages	9.9%	14.7%	14.0%

Source: 2016-2020 American Community Survey; 2019-present (07/22/2022) Children's Healthcare of Atlanta internal data





Infant, Child & Maternal Mortality

These are important indicators used to describe maternal and child wellness. An important indicator used to highlight racial disparities is maternal mortality. Georgia has a notably higher maternal mortality rate (34) compared to the U.S. (20.1). Based on the CDC's Pregnancy Mortality Surveillance System (PMSS), black (40.8) and American Indian/Alaska native (29.7) women had higher pregnancy-related mortality ratios than other racial/ethnic groups.

Infant, Child & Maternal Mortality	Overall Service Area	Georgia	U.S.
Mortality			
Infant mortality rate	6.1	6.4	7
Maternal mortality rate	-	34	20.1
Premature death or Years of life lost (YLL)	7,173	8,000	7,300

Perinatal Outcomes

Premature births and low birthweights are important predictors for children's health and wellness. For both indicators, Children's overall service area and Georgia have higher overall rates compared to the U.S..

Perinatal Outcomes	Overall Service Area	Georgia	U.S.
Perinatal outcomes			
Percentage of infants born before 37 weeks gestation	11.3	11.5	10.1
Percent of infants weighing less than 2,500 at birth	9.3	10	8.2

Besides geographical differences seen in rates, there are racial/ethnic disparities also. Black, non-Hispanic infants are 2 times more likely to have low birthweight compared to white, non-Hispanic infants.

Low birthweight *Percentage of infants weighing less than 2,500 grams (5 pounds, 8 ounces) at birth*		%
U.S.		8.2
Georgia		10
Overall Service Area		9.3
Primary Service Area		9.6
	Highest Performing	7.1
	Lowest Performing	12.3
Secondary Service Area		9.1
	Highest Performing	6.6
	Lowest Performing	11
Race/Ethnicity		
	White, non-Hispanic	7.3
	Black, non-Hispanic	14.6
	Hispanic	7.3
	Asian/Pacific Islander, non-Hispanic	9.6
	American Indian/Alaska Native, non-Hispanic	8

Source: March of Dimes, Perinatal Data

For preterm birth rates there are racial disparities present also. Black, non-Hispanic infants are 1.45 times more likely to be born preterm compared to white infants. Interestingly, Hispanic infants are 1.02 times less likely to be born preterm compared to white infants. Both these indicators are relevant outcomes to address for health disparities.

Preterm birth rate
Percentage of infants born before 37 weeks gestation

		%
U.S.		10.1
Georgia		11.5
Overall Service Area		11.3
Primary Service Area		11.1
	Highest Performing	9.3
	Lowest Performing	12.7
Secondary Service Area		11.4
	Highest Performing	9.6
	Lowest Performing	13.1
Race/Ethnicity		
	White, non-Hispanic	10.0
	Black, non-Hispanic	14.5
	Hispanic	9.8

Source: March of Dimes, Perinatal Data Center (2017-20)

The selection of demographic, health, and social determinants indicator data was informed by the literature review of multiple research studies and Community Health Needs Assessments, as well as key stakeholder conversations, focus groups, and a stakeholder quantitative survey. The main health and social determinants areas and sub-topics are as follows:

Health and Wellness

Access to primary care medical homes	• Medical Homes	
Adolescent issues	• Reproductive health • Smoking	• Behavioral and mental health services access
Behavioral and developmental health	• Access to care • Mortality • Quality of life • Family resilience	• Adverse childhood experiences (ACEs) • Child flourishing
Chronic disease prevention and management	• Chronic disease	
Healthcare access and coordination	• Primary care access	• Healthcare insurance, coverage, and availability
Infant, child, and maternal mortality	• Mortality	
Infectious disease and prevention	• Vaccination	
Injury prevention	• Prevention • Fatal	• Non-fatal • Unknown fatality
Obesity and nutrition	• Obesity • Nutrition • Physical activity	• Screen time • Food security
Oral health	• Dental care access	
Perinatal outcomes	• Outcomes	

Social Determinants of Health

Education	Environment	Housing and Transportation	Socioeconomic
Early care education and learning	Active mobility	Affordable housing	Economic stability
Postsecondary enrollment	Air pollution	Renting and owning	Employment
Preschool	Internet access	Unhoused population	Income
Schools	Neighborhood violence	Vehicle access	Public assistance
-	Racism and discrimination		
-	Water quality		

The main secondary sources used were the American Community Survey (ACS), Area Health Resource Files, National Survey of Child's Health interactive data query, Georgia Governor's Office of Student Affairs and Department of Education publicly available data, County Health Rankings and America's Health Rankings compiled data, Georgia Department of Early Care and Learning data, and other state and federal sources.

Description of Health Needs and Summary Tables

The following summary tables present the topics and sub-topics mentioned above with their corresponding indicators. Attached in each segment there are indicator specific tables highlighting geographical disparities and differences across communities.

Mental, Behavioral and Developmental Health

Mental health, generally, includes emotional, psychological and social well-being.[49] Children who are mentally healthy throughout childhood reach "developmental and emotional milestones and learning healthy social skills and how to cope when there are problems."[50] Common childhood mental and behavioral health conditions commonly include anxiety, depression, obsessive-compulsive disorder, oppositional defiant disorder, conduct disorder, attention-deficit/hyperactivity disorder (ADHD), Tourette syndrome and post-traumatic stress disorder.[51] Other conditions and concerns that affect a child's health and well-being may include developmental disabilities, autism, substance abuse or self-harm.

Survey respondents highlighted multiple areas of concern when asked why they chose mental and behavioral health as a top concern, most notably citing increasing prevalence of disorders and concerns (68.6%). A study by the Centers for Disease Control and Prevention estimates a 24% and 31% increase between April and October 2020 in the proportion of emergency department visits for children ages 5-11 and 12-17 years, respectively.[52] In 2019-2020, 25.4% of children aged 3-17 years have one or more mental, emotional, developmental or behavioral problem, compared to 22% in 2018.[53] Nationwide, approximately 9.4% of children aged 3-17 years have diagnosed anxiety; 4.4% have diagnosed depression.[54] Suicide is the third leading cause of death in adolescents nationwide.[55] About 1 in 44 children has autism spectrum disorder.[56] Caregivers from our focus group are most concerned about children's social well-being through peer interactions, bullying, body-shaming, and "kids making jokes," citing the effect these social interactions have on mental health.

Access to mental and behavioral health specialists is the number one area chosen by survey respondents as needing the most support in our community. As evidenced by the map of driving distance to pediatric developmental-behavioral providers, many families are driving long distances or unable to access the care they need. Caregivers in our focus groups also shared that "it's so hard to navigate mental health help and insurance." Another caregiver shared "Only one area doctor accepts our insurance."

COVID-19 Pandemic

The pandemic is a significant disruption to the lives of children and adolescents, particularly through isolation and school closures. A meta-analysis from 2021 reveals that the pandemic caused increased stress, worry, helplessness and social and risky behavior problems among children and adolescents. Because of this, children and adolescents are experiencing higher rates of anxiety and depression.[57] Through a flourishing scale monitored on the National Survey of Children's Health, Georgia saw a decrease in the number of children meeting all three items for children aged 6-17 years: 68.8% in 2018 compared to 63.2% in 2019-2020.[6] Hispanic and Black, non-Hispanic children are less likely to meet all three flourishing items compared to white, non-Hispanic children. Many survey respondents cited the COVID-19 pandemic as a concern for children's mental.

Flourishing for children and adolescents (ages 6-17 years) *Percent children and adolescents who meet all 3 flourishing items*	%
United States	63.3
Georgia	63.2
Race/Ethnicity	
White, non-Hispanic	66.2
Black, non-Hispanic	59.1
Hispanic	63.7

Source: 2019-2020 National Survey of Children's Health, Health Resources and Services Administration, Maternal and Child Health Bureau.

In this area overall, Georgia's outcomes for the chosen indicators have equivalent or better results to what is seen in the U.S. The main difference is seen in Adverse Childhood Experiences (ACEs) presence. Georgia has a higher percentage of ACEs presence compared to the U.S. (21.6 vs. 18.1). It is important to highlight that an important limitation is access to data regarding these indicators.

Behavioral & Developmental Health	Overall Service Area	Georgia	U.S.
Access to care			
Proportion of primary care visits with depression screening			
Mental health provider ratio to population			
Proportion of children with mental health problems who get treatment	-	-	13.6
Proportion of children with autism spectrum disorder (ASD) who receive special services	-	-	1.8
Percent infants screened for ASD and other developmental delays			
Percent children whose parent completed a standardized developmental screening tool	-	40	36.4
Mortality			
Number of deaths due to suicide per 100,000 population	-	15.1	14.5
Quality of life			
Average number of mentally unhealthy days	4.9	4.8	4.5
Family resilience			
Percent children and adolescents who can share ideas or talk with their parents	-	95	95.2
Family resilience composite	-	83.3	83.9
Adverse Childhood Experiences (ACEs)			
ACEs presence	-	21.6	18.1
Child Flourishing			
Young child flourishing	-	84.3	82.3
Older child or adolescent flourishing	-	63.2	63.3

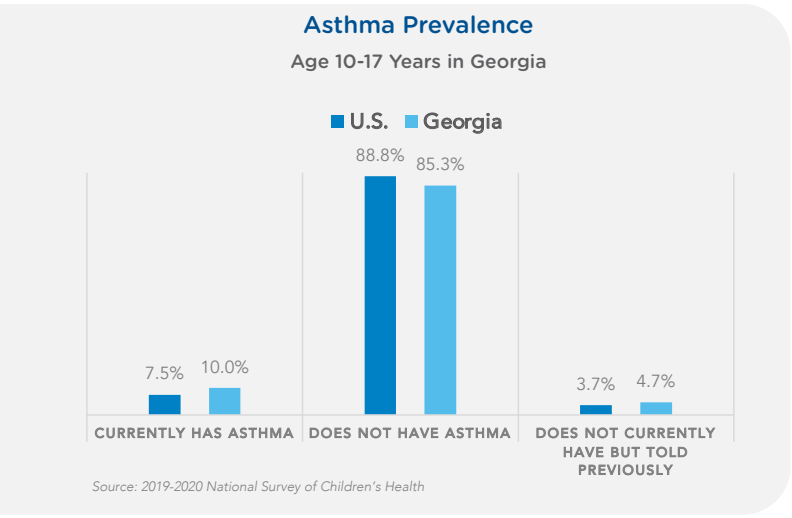
There are racial disparities seen in ACEs presence. Black (29.3%) and Hispanic (22.2%) children are more likely to have two or more ACEs compared to white (16.4%) children.

Adverse Childhood Experiences *Percent children with two or more ACEs*	%
United States	18.1
Georgia	21.6
Race/Ethnicity	
White, non-Hispanic	16.4
Black, non-Hispanic	29.3
Hispanic	22.2

Source: 2019-2020 National Survey of Children's Health, Health Resources and Services Administration, Maternal and Child Health Bureau.

Chronic Disease Prevention & Management

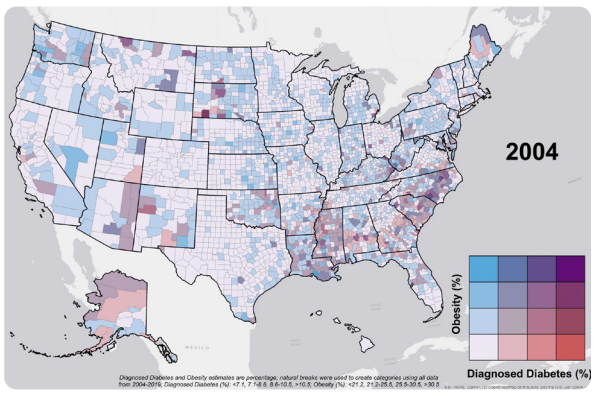
Over 10 million children and adolescents have some type of chronic disease. Over 40% of school-aged children and adolescents have at least one chronic health condition, such as asthma, diabetes, epilepsy, allergies, obesity, other physical conditions or behavior/learning concerns.[58] Survey respondents chose chronic disease prevention and management one of the top needs in the community you serve. Over half of the respondents (51.2%) who identified chronic disease and management as top health concern stated a large portion of the community has at least one chronic condition and there is an increase in the number of patients seen with chronic conditions like diabetes, obesity, asthma or heart diseases. One survey respondent wrote "Many of my patients have multiple chronic medical conditions." Respondents stressed the need for education for families and patients on their conditions and how to manage them properly (27.3%). Respondents mentioned issues with access to care and limited resources due to a shortage in healthcare workers (27.3%). Survey respondents cite middle childhood as the age group with the highest need and adolescents second. Our focus is on asthma, diabetes and allergies due to high prevalence rates, increased hospitalizations and emergency room visits and complex management of the condition across childhood.

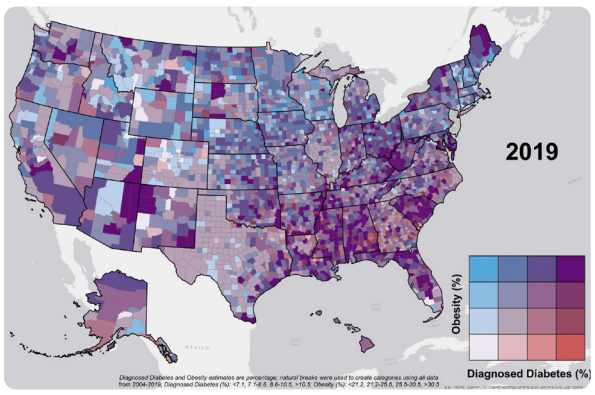


Source: 2019-2020 National Survey of Children's Health

Asthma is the leading chronic illness among youth and one of the leading causes of missing days of school.[59] In 2020, children aged 0-19 years in Georgia had 11,379 emergency room visits for asthma.[60] Georgia's children have higher prevalence of asthma compared to the U.S., with 10% of children aged 0-17 currently having asthma and 4.7% having ever been told but not current. Each year, about 1 in 6 children with asthma visits the emergency department and 1 in 20 is hospitalized.[61] In 2021, Children's Healthcare of Atlanta had over 13,000 visits related to asthma.

Type 1 diabetes is largely diagnosed in childhood and, increasingly, the U.S. is seeing rising incidence of Type 2 diabetes in youth. In 2019, about 283,000 children and adolescents had diagnosed diabetes; of those, 244,000 had Type 1.[62] While diabetes is not a leading chronic condition for prevalence, management of the disease is imperative. Children's Healthcare of Atlanta had over 3,000 visits related to diabetes in 2021. Data from the Behavioral Risk Factor Surveillance System (BRFSS) shows that between 2004 and 2019, the rates of diabetes and obesity among persons aged 20 years and older increased significantly across the U.S.[63] Although these maps represent adults, children have seen corresponding increases in incidence of Type 1 and Type 2 diabetes.[64] As one respondent wrote, "Chronic disease plagues our communities. Diabetes has become an epidemic and we are even seeing school-aged children on hypertensive medications."





Chronic Disease Prevention & Management	Overall Service Area	Georgia	U.S.
Chronic disease			
Child diabetes prevalence			
Percentage of adults who reported being told by a health professional that they currently have asthma	-	9	9.6

Nearly 30% of children and adolescents living in Georgia have allergies, including food, drug, insect or other types, which is higher than the national prevalence of just under 24.4%.[15] According to the CDC, an estimated 8% of children have a food allergy,[65] which is approximately two students per classroom. Two in five children with food allergies in the U.S. have been treated in the emergency department.[66] A recent study examining anaphylaxis-related hospitalizations found the highest hospitalization rate among children aged 5-14 years.[67]

Survey respondents also included obesity and mental illness as chronic conditions, which are included as special health topics in this report. Other common chronic conditions in childhood include cystic fibrosis, cerebral palsy, congenital heart disease and sickle cell disease. Overall, there is a lack of consensus on definition and prevalence of chronic conditions in childhood, largely due to lack of research,[68] but the prevalence of conditions like asthma and allergies coupled with rates of hospitalizations and emergency department visits highlight the ongoing need for prevention and management.

Adolescent Health

Adolescent health is sometimes overlooked, even though it's an important age for promoting health and preventing disease. Georgia has a teenage pregnancy rate 1.77 times higher than what is seen in the U.S.. Even though Children's service area has a teen pregnancy rate smaller than Georgia, it is still higher than the U.S. (8.4 vs 6). This highlights an area of need of the community and Georgia as a whole. Racial/Ethnic disparities can also be seen in this indicator. In 2019, in the U.S. the teen birth rates for Hispanics (25.3) and Black, non-Hispanic (25.8) teens were over 2 times higher compared to white (11.4) teens.

Adolescent Health	Overall Service Area	Georgia	U.S.
Reproductive health			
Teenage pregnancy rate	8.4	10.4	6
Behavioral and Mental Health Services Access			
Proportion of adolescents with depression who get treatment			
Smoking			
Percent high school students who reported using an electronic vapor product	-	17	32.7

Georgia Student Health Survey, 2022	
I feel connected to others at school.	24.5 somewhat or strongly disagree
I have felt unsafe at school or on my way to or from school.	29.9% somewhat or strongly agree
How often in the last 30 days have I been bullied or threatened by other students?	18.9% more than 0 times
During the past 12 months, on how many occasions have you seriously considered attempting suicide?	12.3% more than 0 time
During the past 12 months, on how many occasions have you attempting suicide?	6.2% more than 0 time
In the past 7 days, how many days were you physically active for at least 60 minutes at school or home?	25.3% not at all
How often do you feel stressed?	60.5% sometimes or always
During the past 30 days, on how many days did you have at least one drink of alcohol?	7.1% one or more days
During the past 30 days, on how many days did you smoke cigarettes?	2.8% one or more days
During the past 30 days, on how many days did you smoke an electronic vapor product?	7.0% one or more days

The COVID-19 pandemic had long-term and persistent impacts on adolescents. The Centers for Disease Control and Prevention (CDC) conducted the Adolescent Behaviors and Experiences Survey in 2021, which is a comprehensive look at the impact of COVID-19 on our nation's high school students.[69] Over one-third of students reported experiencing poor mental health during the pandemic, with nearly half reporting feeling persistently sad or hopeless. Caregivers from the focus groups highlighted bullying and body shaming as key drivers for poor mental health. Over half of students reported experiencing emotional abuse in the home, while over 10% reported physical abuse. Disparities in health outcomes include female students (12%) attempting suicide at a higher rate than their male counterparts (5%), Black students more likely to report food insecurity and students experiencing racism more likely to also report poor mental health and less connectedness. Adolescents that reported feeling connected had better mental health.

Obesity

Rising obesity trends among children and adolescents remains a top health concern both nationally and in Georgia. Childhood obesity rates have more than tripled over the last few decades, increasing from 5% in 1978 to 18.5% in 2016.[70] According to the 2019-2020 National Survey of Children's Health, 16.4% of children aged 10-17 years in Georgia were in the overweight category and 18% in the obese category.[71] Georgia currently ranks 14th in the U.S. for highest percentage of children with obesity. Nationally, among children aged 10-17, 16.5% had overweight and 16.6% obesity in 2020. One survey respondent wrote, "Obesity is a problem in our community. Lack of education, learned habits, decreased activity and increased fast food intakes are concerns." With recent data showing increasing rates due to the COVID-19 pandemic[72] and significant interruption to the daily lives of children and adolescents,[73] the obesity epidemic remains a complex health issue facing our community.

Children with obesity are more likely to develop other serious health problems, like heart disease, Type 2 diabetes, anxiety, depression and low self-esteem. While some children are genetically pre-disposed for an increased risk of obesity, family and community risk factors increase a child's risk. These risk factors include high-calorie/low-nutrient diet, lack of quality sleep, increased screen time, decreased physical activity and stress or trauma.[74] Survey respondents echoed similar concerns highlighting movement and physical activity education, feeding and nutrition education and access to healthy foods at the top areas needing support to address obesity in the community.

Racial and ethnic minority children also experience disparate rates of obesity. Black or African American children experience higher rates of obesity than their White or Asian counterparts. In early childhood, rapid infant weight gain contributes substantially to racial and ethnic disparities,[75] which suggests differential early childhood risk factors. While higher socioeconomic status is a protective factor for risk of obesity in childhood, the protective factor is smaller for Black children compared to White children.[76] Hispanic children also face increased risk for obesity with a substantially higher prevalence at age 2 than non-Hispanic white, non-Hispanic Black and non-Hispanic Asian children; by age 11, obesity prevalence is similar between Hispanic and non-Hispanic Black children with estimates of more than 25%.[77]

The COVID-19 pandemic significantly impacted children and adolescents through lockdowns and school closures. Common sources of stress during the pandemic for youth include quarantine, isolation, less interaction with peers, food insecurity, disruption to routine and schedule, limited physical activity, online learning, instability in family finances and parental stress. Each of these stressors create increased risk for obesity.[78]

Overall, Children's service area and Georgia performed better than the U.S. in the chosen indicators for Obesity and Nutrition. Even though Georgia performed similarly in obesity prevalence to the U.S., child obesity is another condition considered to have worsened because of the COVID-19 pandemic and that highlighted healthcare access disparities. Food security is another topic that has been highlighted during the COVID-19 pandemic where usually those affected are communities that are already underserved in other areas. In Children's overall service area, it's 1.21 times more likely for there to be a lack of adequate access to food and people be low income compared to Georgia. On the other hand, in Children's service area it's 1.81 times more likely for children to lack adequate access to food compared to Georgia. This highlights an important issued to be addressed.

Obesity & Nutrition	Overall Service Area	Georgia	U.S.
Obesity			
Obesity prevalence	-	15.3	19.7
Nutrition			
Percentage of adults who reported consuming two or more fruits and three or more vegetables daily	-	7.6	8
Physical Activity			
Percentage of children ages 6-17 who were physically active at least 60 minutes every day in the past week	-	24.9	20.6
Average number of physically unhealthy days	4.1	4.1	3.9
Screen time			
Proportion of children who get no more than 1 hour of screen time a day	-	-	43.9
Food security			
Percentage of population who lack adequate access to food and are low income	9.3	7.7	-
Percentage of children who lack adequate access to food	7.8	4.3	-
Food insecurity prevalence	-	10	10.7

Infectious Disease Prevention and Management

Amid the COVID-19 pandemic, the need for infectious disease prevention and management changed compared to previous CHNA cycles. Survey respondents largely cited access to primary and urgent care

for acute, communicable diseases as a top area needing support, second to education on how to stop the spread of communicable diseases. Both interviewees and survey respondents identified the need for increase vaccine education, specifically mentioning the COVID-19 vaccines for children, but also general vaccine education. Georgia (79.5%) is above the national prevalence (75.8%) of children receiving all recommended doses of vaccines by age 35 months. Though parents express increased vaccine hesitancy,[79] communities can slow or mitigate communicable diseases through high vaccination rates among children and adolescents. This, in turn, reduces emergency department use, morbidity and mortality. A survey respondent wrote, "20% of the population is not immunized with proper immunizations due to the lack of vaccine education and/or access to care."

Access to care for communicable diseases is a top concern within the community. One survey respondent shared, "Many of our residents do not know that they can access primary and urgent care for acute/communicable diseases and instead go to the emergency rooms. Some of our rural counties do not have access to primary/urgent care and drive to Athens to receive services."

Georgia has a higher percentage of children who received their recommended vaccines (79.5%) compared to the U.S. (75.8%).

Infectious Disease Prevention & Management	Overall Service Area	Georgia	U.S.
Vaccination			
Percentage of children who received by age 35 months all recommended doses of the combined seven-vaccine series	-	79.5	75.8

COVID-19 Pandemic

As of July, Georgia has 343,504 cases, 3,838 hospitalizations and 38 deaths with confirmed COVID-19 infections.[80] The pandemic changed infection prevention protocols for families, schools and youth organizations. Survey respondents cite a lack of knowledge of infection transmission, particularly in the 12–17-year-old age group, as well as vaccine and viral misinformation. Although interviewees focused on the secondary effects of the pandemic (e.g., mental health concerns, sedentary behavior), survey respondents highlight the need for education on how to stop communicable diseases as a result of COVID-19.

Community Outreach

Community outreach is essential to ensure members of a community have access to healthcare services and to improve the collective health and well-being of the community. Different communities may experience different variables affecting their health, such as greater levels of food insecurity or exposure to contaminants from a nearby waste facility. On the other hand, members of the same community often share similar socioeconomic conditions and health characteristics and thus can often be broadly engaged to address the greatest challenges they face.[81]

Survey respondents outlined three areas needing increased support to meet communities where they are: education, healthcare service and food access events. One key stakeholder said, " [we must] create trusted relationships with stakeholders in the community […] getting the trust there to be able to provide information and resources." In the U.S., there are over 7,000 primary care, 6,000 dental health, and 5,5000 mental health shortage areas, but community outreach may address health disparities, especially in rural and low-income communities. Survey respondents most often cited education events as the area needing the most support. The effectiveness of education events and programs are often dependent on many factors, including the content of the educational materials, the social determinants of health within a community, and coinciding services to educational events. A survey respondent shared "community outreach is important for our underserved parts of the community. Education events would be helpful."

Nationally, the Center for Disease Control and Prevention promotes the health of children and adolescents through various work with communities, with an approach that focuses on reducing obesity risk in early care settings, improving healthy food options in school, improving physical activity in school, preventing tobacco use, helping youth manage chronic conditions, supporting social/emotional learning, promoting dental sealants, and promoting better sleep.[82] School-based gardening programs paired with nutritional education is recommended and has demonstrated an increase in children's consumption of vegetables.[83] Other programs such as food access events and programs have shown an effectiveness in reducing food insecurity and promoting health. There is some uncertainty whether the benefits of healthcare service events outweigh the costs, especially those focused primarily on screenings.[84] Healthcare service events are most effective when they use a consistent, sustainable model that ensures individuals receive the care and treatment they need.

As a survey respondent noted "Our community benefits from these events because the families will attend an event that will get them access to multiple services at one time. It is a one stop shop for the families and easy to attend. They also appreciate receiving any tools and resources that are handed out at these events. It is a great way for the community to network with others as well."

Injury Prevention

The leading causes of unintentional injury changes by age group mirroring the unique risks different age groups face. Younger children experience higher rates of unintentional suffocation and unintentional drowning, while old children experience higher rates of motor vehicle crashes and suicide suffocation. Recent data suggests that firearm-related injuries have surpassed motor vehicle crashes as the leading cause of death for persons aged 1-19 years. Firearm-related injuries include suicide, homicide, unintentional and undetermined.[85]

Based on data from the Centers for Disease Control and Prevention, unintentional injuries is the leading cause of death for children aged 1-18 years old.[86] In 2020, 332 children aged 0-19 years in Georgia died due to unintentional injury, with approximately 116,773 emergency room visits.[87] The CDC cites injuries as one of the most under-recognized public health problems facing the U.S.,[88] with one child dying every hour from injury.[89] Neither caregivers in our focus groups nor key stakeholders during qualitative interviews mentioned injury prevention as a top health concern, however, morbidity and mortality data consistently shows the impact of injury on children and adolescents. In 2019-2020, 23% of children living in Georgia missed four or more days of school due to injury and illness.[90] Nationally, death due to unintentional injury decreased between 2010 and 2019, but it remains the leading cause of death for children and teens.[91] In Georgia, unintentional injury deaths only slightly declined. Morbidity and mortality from injury is a key health concern for all children.

Our survey respondents from the government and school sector ranked injury prevention higher than other sectors. One survey respondent wrote "injury and violence are leading causes of morbidity and mortality. It's also one of the least funded areas for primary prevention." Another respondent shared, "We need to keep educating parents and children in ways to prevent these injuries." The top areas identified requiring the most support within injury prevention are home or indoor hazards education and prevention (e.g., safe firearm storage, medication storage), child abuse and neglect detection and prevention and car safety education.

Children living in rural areas face higher rates of unintentional injury than their urban counterparts; nationally, the rate of death per 100,000 is higher in rural areas (12.4) than urban areas (6.3). For children aged 5-13 years, death due to motor vehicle crashes is twice as high in rural areas compared to urban (3.1 and 1.5, respectively).[92] Additional injury disparities include higher rates of injury deaths among male children and babies under age one and teens aged 15-19 years. Black and American Indian and Alaska Native children also experience higher rates of death by injury. Black children experience higher rates of death due to drowning than their white counterparts: 2.6 times higher rate for Black children aged 5-9 years and 3.6 times higher for Black children aged 10-14 years.[93]

A survey respondent aptly wrote, "Avoidable child injuries are the leading cause of death among children across the nation. We must provide information and equipment to increase awareness and change behaviors to create safer communities where children can flourish."

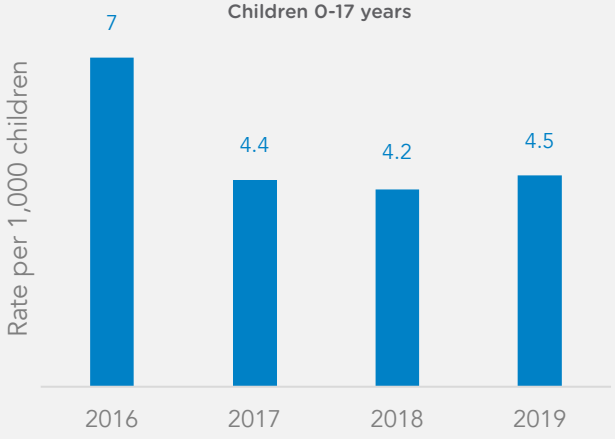
The indicators selected for Injury Prevention as a focus are on prevention, fatal and non-fatal injuries, and ER visits. In most of the indicators Georgia outperformed the U.S., except for motor vehicle traffic-related deaths. In Georgia, it's 1.26 times more likely for there to be a motor vehicle related death compared to the U.S. One of the main limitations when gathering this data was the limited access to geographic information for these indicators.

Leading Cause of injury deaths by age group, 2020

<1 year	1-4 years	5-9 years	10-14 years	15-24 years
Unintentional Suffocation **1,024**	Unintentional Drowning **425**	Unintentional Motor Vehicle Traffic **319**	Unintentional Motor Vehicle Traffic **476**	Unintentional Motor Vehicle Traffic **6,741**
Homicide Unspecified **104**	Unintentional Motor Vehicle Traffic **284**	Unintentional Drowning **117**	Suicide Suffocation **312**	Unintentional Poisoning **6,664**
Unintentional Motor Vehicle Traffic **72**	Unintentional Suffocation **118**	Homicide Firearm **99**	Suicide Firearm **224**	Homicide Firearm **5,966**
Homicide Other Spec., Classifiable **68**	Homicide Unspecified **108**	Unintentional Fire/Burn **60**	Homicide Firearm **218**	Suicide Firearm **3,173**
Unintentional Drowning **38**	Homicide Firearm **75**	Unintentional Suffocation **38**	Unintentional Drowning **91**	Suicide Suffocation **1,914**

Injury Prevention	Overall Service Area	Georgia	U.S.
Prevention			
Percent of infants sleeping on their backs	-	71.3	79.8
Fatal			
Number of deaths caused by injuries per 100,000 population	-	143.2	158.2
Number of deaths caused by unintentional injuries per 100,000 population	-	94.1	112.8
Motor vehicle traffic-related deaths per 100,000 population	-	31.8	25.2
Firearm-related deaths per 100,000 population	-	25.6	33.5
Child abuse and neglect deaths per 100,000 children under 18 years	-	-	2.6
Non-Fatal			
Nonfatal child abuse and neglect per 1,000 children under 18 years	-	-	8.9
Unknown fatality			
Percentage of state unintentional injury ER visits	35.8	-	-
Percentage of state intentional injury ER visits	56.4	-	-

Child Abuse and/or Neglect Rate in Georgia



Injury prevention encompasses intentional injuries like child abuse and neglect. According to the Georgia Division of Family & Children Services Child Protective Services data system, the rate of children with a substantiated incident of child abuse and/or neglect declined between 2016 and 2019, although remains consistent since 2017. A recent study suggests that areas with socioeconomic hardship and increased drug-related crime are more likely to experience higher rates of child abuse and neglect.[94] However, one survey respondent highlighted that "child abuse and neglect can often go unrecognized and unreported in more affluent areas."

Primary Care Medical Homes

Currently the medical home model is considered an important part of adequate primary care. Georgia and the U.S. have a similar percentage of children with a medical home. The Patient-Centered Medical Home (PCMH) model is effective because it integrates multiple strategies that address the social determinants of health of an individual and community, which are the circumstances and factors outside the healthcare system that may influence health, such as education and income.[95] Unlike fragmented models of healthcare, medical homes take into account the child's full scope of healthcare needs, including prevention, and coordinates care by integrating multiple approaches—clinical, mental and behavioral, social, economic, education, and community. From a systematic review on the impact of PCMHs on the health of low-income patients, medical homes were found to have an overall positive effect with better clinical outcomes, higher adherence, and lower utilization of emergency rooms. From a selection of low-bias studies with large sample sizes greater than 500 participants, findings generally indicated little effect of medical homes on cost of overall care. However, one low-bias study did find a significant improvement in cost, and evidence nonetheless links medical homes to higher effectiveness and quality of care.[96]

Furthermore, medical homes offer great potential in bridging the health disparities divide through reaching medically underserved populations. While research on the ability of medical homes to combat health disparities is limited, it is nonetheless compelling. In one investigation, research staff acting as patients who identified as self-pay, private insurance, or Medicaid recipients were more likely to secure appointments with PCMH practices than with non-PCMH practices.[97] Research shows that the implementation of medical homes can be associated with improvements in preventive cancer screening across the socioeconomic scale, with higher rates of screening among the lowest socioeconomic group. There are multiple factors pertaining to why the PCMH model may prove effective and advantageous in addressing health disparities, including comprehensive care, patient-centered services, care coordination, service accessibility, and quality/safety. For example, comprehensive, preventive measures and flexible appointment scheduling are likely to bolster the health of vulnerable populations because they take into consideration social determinants of health and account for busy work schedules, respectively.

Access to Primary Care Medical Homes	Overall Service Area	Georgia	United States
Medical home			
Percentage of children with a medical home	-	46	46.8

However, while the PCMH model may be effective in lessening disparities, there is still more that can be done to properly leverage medical homes to lessen disparities. In a qualitative study surveying several key stakeholders and experts on medical homes and their impact on racial health disparities, researchers interviewed grant making organizations, researchers, accrediting bodies, policy makers, primary care practices, patients and patient advocacy groups, payers, and practice transformation organizations. The study found that most stakeholders view the current PCMH model as having little impact on reducing healthcare disparities and recommend for further integration of strategies that address healthcare disparities into the PCMH model. The authors of this study recognize the promise of medical homes to reduce disparities, recommending that PCMH standards be revised to focus on healthcare disparities and to commit to identifying and targeting disparities within a community.[98] Overall, the PCMH model is an encouraging opportunity that would help advance progress toward bridging the gaps that disproportionately and adversely impact the health of underserved individuals and populations.

Even though the percentages are similar between Georgia and the U.S., when stratified by Race/Ethnicity, Hispanic children in Georgia are 1.95 times less likely to receive care within a medical home compared to white, non-Hispanic children. Similarly, Black, non-Hispanic children are 1.33 times less likely compared to white, non-Hispanic children. This currently shows disparities in medical home access and the need for efforts to promote medical homes to minorities.

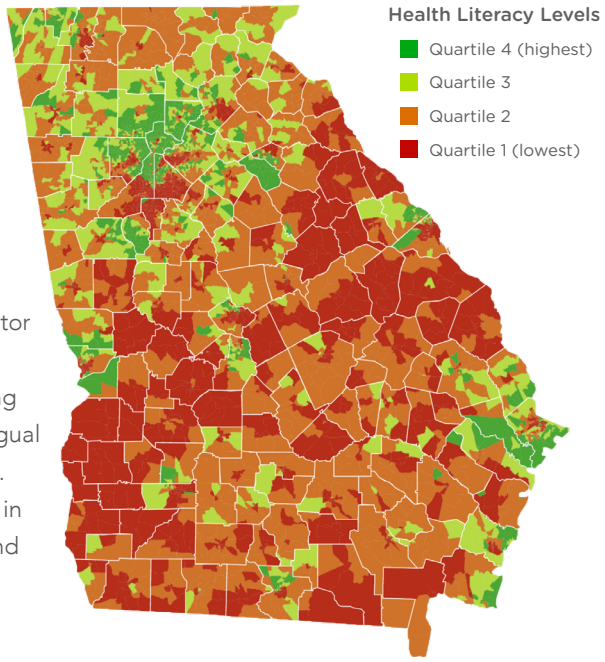
Medical Home *Percent children who received care within a medical home*	%
United States	46.8
Georgia	46
Race/Ethnicity	
White, non-Hispanic	55.8
Black, non-Hispanic	41.8
Hispanic	28.6

Source: 2019-2020 National Survey of Children's Health, Health Resources and Services Administration, Maternal and Child Health Bureau.

Health Literacy

According to the American Academy of Pediatrics, 1 in 4 parents have low health literacy, which affects their ability to use health information to make health decisions for their child. The effects of low health literacy include poor nutrition knowledge and behaviors, higher obesity rates, increased medication errors, increased emergency department usage and poor asthma knowledge, behaviors, and outcomes.[99] In the U.S., an estimated annual cost of $106 billion to $238 billion is due to low health literacy, which represents 7% to 17% of personal healthcare expenses.[100] Parents with low health literacy are also less likely to engage in injury prevention behaviors, e.g., three times less likely to have a smoke detector, two times more likely to let a child play alone near water and two times more likely to have harmful household products within reach of children.[101] Adolescents with low health literacy have worse tobacco- and alcohol-related behaviors.[102] In addition, caregivers with low health literacy and educational attainment are less likely to use patient portals, which has implications for quality of care and patient self-efficacy as many healthcare systems and providers support patient portals to engage in healthcare.[103]

Across Georgia, low healthy literacy spans the state.[104] The figure breaks down estimated health literacy scores of adults into four categories: below basic, basic, intermediate and proficient. Below basic scores represent adults who can locate information in simple text like appointment times but would struggle with information in more complex documents. Proficient adults, for example, can use a table to calculate an employee's share of health insurance costs. The map is a predictive model of health literacy using gender, age, race, ethnicity, language spoken at home, income, education, marital status, time spent in the U.S. and Metropolitan statistical area, which are all highly correlated to health literacy levels. According to this model, children and adolescents living in the lower quartile areas (red and orange) will experience worse health outcomes due to caregiver health literacy levels. These areas are largely concentrated in more rural areas.



Caregivers from the focus groups identified gaps in healthcare due to health literacy. One parent shared, "I can't always understand what the doctor is saying." Caregiver perceptions include use of medical jargon, providers do not listen, and pediatricians charge extra to talk about a condition during routine visits. They also highlighted issues affecting Spanish-speaking bilingual households, like children preferring English and parents preferring Spanish. One caregiver discussed difficulty finding bilingual and interpreter services in the community. Language and cultural barriers prove difficult for parents and caregivers when advocating for their child's health.

Oral Health

The Georgia Department of Public Health defines oral as that which refers to the whole mouth, including the teeth, gums, hard and soft palate, linings of the mouth and throat, tongue, lips, salivary glands, chewing muscles, and upper and lower jaws. Oral diseases encompass a wide range of conditions ranging from tooth decay to life-threatening oral cancers. Oral health is an essential part of overall health, going beyond just healthy teeth, and it is intimately related to the health of the rest of the body. Infections in the mouth may increase the risk of heart disease and affect the control of blood sugar for people with diabetes. Furthermore, evidence suggests that infections in the mouth put pregnant mothers at risk for pregnancy complications and their children at risk for future oral disease. Disease in the mouth is often the first signs of problems elsewhere in the body, such as immune disorders, nutritional deficiencies, and cancer.[105]

Most common oral diseases can be prevented through effective community-based interventions such as community water fluoridation and school-based sealant programs. Georgia provides water fluoridation to 92% of its population using public water systems. Oral conditions could further be prevented through combatting risk factors such as the use of tobacco and alcohol. Behavioral surveys illustrate a steady decrease in cigarette smoking by middle and high school students, yet 11.9% of high school students nonetheless indicated that they had smoked their first cigarette before the age of 13. Additionally, there has been an increase in the use of smokeless tobacco.[49]

Lack of access to dental care providers can be considered one of the main barriers to adequate dental care. Georgia is 1.39 times more likely to not have access to dental care providers compared to the U.S., while Children's overall service area is 1.33 times more likely not to.

Oral Health	Overall Service Area	Georgia	U.S.
Dental care access			
Number dentists per 100,000 population	46.8	44.7	62.3

Dental Providers Per 100K Population	Per 100K population
U.S.	62.3
Georgia	44.7
Overall Service Area	46.8
Primary Service Area	51.1
Highest Performing	71
Lowest Performing	25
Secondary Service Area	43.4
Highest Performing	97
Lowest Performing	15

Source: 2021 America's Health Ranking National Plan and Provider Enumeration System; 2020 County Health Rankings National Provider Identification File

As can be seen in the indicator specific table above, both the primary and secondary service area are below the USA dentists' rate as well.

Social Determinants of Health

Healthcare Access and Coordination

The Agency for Healthcare Research and Quality defines access as "the timely use of personal health services to achieve the best health outcomes." The focus of the indicators selected for "Healthcare access and coordination" was primary care access, and insurance use, coverage, and availability.[106]

According to the National Health Interview Survey, 5.0% of children were uninsured in 2020, representing 3.7 million children in the U.S. Among those children without insurance, over half did not have insurance for a year or more.[107] Moreover, 26.3% of children in the U.S. with insurance coverage do not have adequate coverage to meet their health needs. For children living in Georgia, over 11% do not have insurance coverage.[108] When survey respondents were asked why they chose healthcare access as the top health need, 35% cited issues related to families unable to afford the care they need or how being uninsured impacts the care children are able to receive. Accessing high-quality primary care services significantly reduces non-urgent emergency room visits among children.[109]

Healthcare Access & Coordination	Overall Service Area	Georgia	U.S.
Primary care access			
Percent children who received well child visits	-	83.1	80.7
Percent counties considered completely or partially a Health Professional Shortage Area (HPSA)	67	95	89
Number of family medicine, internal medicine, and pediatric providers per 100,000 population	105.9	98.3	-
Number of pediatricians per 10,000 children	9.7	8.2	-
Percent pregnant women who receive early and adequate prenatal care	76.6	74.9	76.7
Healthcare insurance, coverage, and availability			
Percent uninsured adults	16.9	18.2	12.3
Percent uninsured children	7.9	7.4	5.2
Percent children with private health insurance	62.8	59.2	62.6
Percent children with public health insurance	34.6	39.5	38.6
Percent children with adequate coverage	-	72.5	72.9
Percent of adults who didn't see a doctor because of cost	-	15.1	9.8

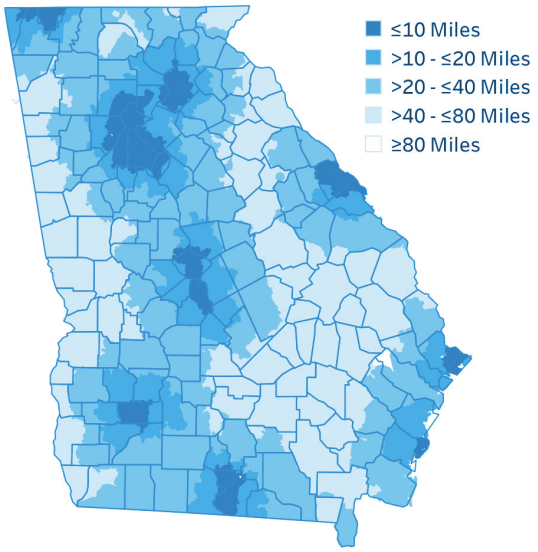
Health Professional Shortage Areas (HPSA) *Percentage of counties considered completely or partially an HPSA*	%	N
United States	89	2,888
Georgia	95	151
Overall Service Area	67	12
Primary Service Area	75	6
Secondary Service Area	60	6

Source: 2020-2021 Area Health Resource Files, 2021 HPSA Code, Primary Care

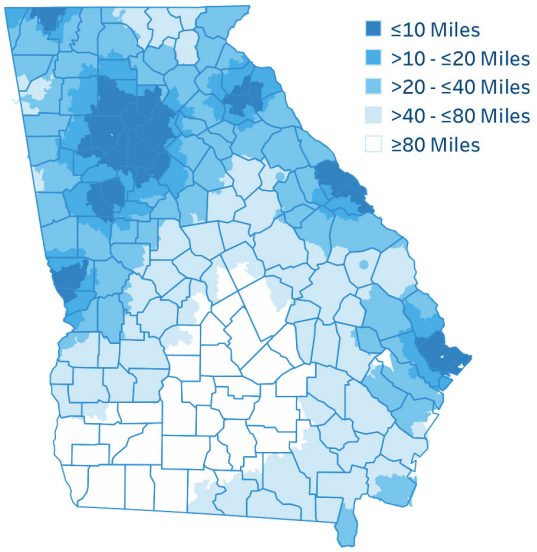
It is important to highlight some of the results seen in the summary table above. One important indicator is the presence of Health Professional Shortage Areas (HPSAs). They are areas that have a shortage of primary, dental, or mental healthcare providers. Geographical HPSAs can be labeled as whole or partial, which for Georgia and the U.S. most of them were the latter. Georgia is 1.1 times more likely to have counties considered completely or partially an HPSA compared to the U.S. Even though Children's overall service area has a better result compared to Georgia and the U.S., a high quantity of counties are HPSA.

There is a significant disparity in the geographic distribution of pediatric subspecialists across the country, according to the American Academy of Pediatrics. Approximately one in three children must travel 40 miles or more to receive pediatric subspecialty care and wait between five weeks and three months to get an appointment.[110] The American Academy of Pediatrics has estimates of average driving distance to care by different subspecialties. The map highlights average driving distances to allergy and immunology specialists across the state with many areas greater than 40 miles. The U.S. average driving distance to allergy and immunology specialists is 22.7 miles; Georgia average driving distance is 20.3 miles with a maximum distance of 76.1 miles.

Estimated Driving Distance to Allergy and Immunology Specialist by County



Estimated Driving Distance to Pediatric Emergency Medicine by County



Compared to the U.S., Children's overall service area and Georgia have higher percentages of uninsured adults and children. In Georgia, 18.2% of adults and 7.4% children are uninsured; compared to 12.3% and 5.2% in the U.S. respectively. This in turn can influence the quality of healthcare, access to services, adequate management of diseases, among others.

Uninsured adults

Percentage of uninsured people who are over 19 and under 65 years old

		%	n
U.S.		12.3	23,640,483
Georgia		18.2	1,136,245
Overall Service Area		16.9	598,855
Primary Service Area		16.7	466,589
	Highest Performing	10.9	15,271
	Lowest Performing	24	41,436
Secondary Service Area		17.8	132,266
	Highest Performing	10.5	6,714
	Lowest Performing	24.1	28,411

Source: 2016-2020 American Community Survey Estimates

Uninsured children *Percent children under 19 who are uninsured*		%	n
U.S.		5.2	4,016,835
Georgia		7.4	196,271
Overall Service Area		7.9	118,021
Primary Service Area		8	92,604
	Highest Performing	5.2	12,636
	Lowest Performing	11.9	10,092
Secondary Service Area		7.6	25,417
	Highest Performing	4.8	1,471
	Lowest Performing	10.2	2,428

Source: 2016-2020 American Community Survey Estimates

An example of an indicator influenced by higher uninsured rates of children is well child visits access. Even though Georgia and the U.S. have comparable percentages of children who received well child visits, you can see racial and ethnic differences. Hispanic children are 1.15 times less likely to have received one or more preventive visits in the past 12 months compared to their white, non-Hispanic counterparts in Georgia. Meanwhile, Black, non-Hispanic children are 1.10 times less likely to receive well child visits compared to white, non-Hispanic children. There are multiple factors that could be influencing these results, including lack of insurance.

Received well child visits *Percentage of children ages 0-17 who received one or more preventive visits in the past 12 months*		%
United States		80.7
Georgia		83.1
Race/Ethnicity		
	White, non-Hispanic	87.7
	Black, non-Hispanic	80
	Hispanic	76.4

Source: 2019-2020 National Survey of Children's Health, Health Resources and Services Administration, Maternal and Child Health Bureau.

On another topic regarding access, Hispanic mothers are 1.18 times less likely to have received early and adequate prenatal care compared to white, non-Hispanic mothers, while for Black mothers it is 1.2 times less likely. Overall, there are racial disparities associated to healthcare access that should be addressed and that impact overall health and wellness outcomes.

Early and adequate prenatal care *Percentage of live births in which the mother received prenatal care beginning in the first four months of pregnancy with the appropriate number of visits for the infant's gestational age*		%
U.S.		76.7
Georgia		74.9
Overall Service Area		76.6
Primary Service Area		74.7
	Highest Performing	88.6
	Lowest Performing	61.1
Secondary Service Area		78.1
	Highest Performing	84.2
	Lowest Performing	68
Race/Ethnicity		
	White, non-Hispanic	82.1
	Black, non-Hispanic	68.3
	Hispanic	69.3

March of Dimes, Perinatal Data Center, 2020 Data. 2021 America's Health Rankings Data.

As mentioned above, cost can also influence service access. In Georgia, 15.1% of adults reported they didn't see a doctor because of cost compared to 9.8% at the U.S. level.

Education

For most education indicators, Georgia and the U.S. have similar results. There are two indicators worth highlighting: Number of childcare centers and percent of students enrolled in a postsecondary institution.

Education	Overall Service Area	Georgia	U.S.
Early care education			
Percent quality rated early care centers	62.2	64.1	-
Percent household income required for childcare expenses	19.7	21	-
Number of childcare centers per 1,000 population under 5 years old	186.3	38.3	-
Preschool			
Percentage of children ages 3 to 4 who are enrolled in nursery school or preschool	51.6	49.1	47.3
Schools			
Adolescent high school graduation rate	85.2	83.8	-
School readiness indicator score	81.9	81.1	-
Percent of students with chronic school absence	19.9	19.8	-
Percentage of public-school students who lack a fixed, regular and adequate nighttime residence	-	2.2	3
Postsecondary enrollment			
Percent of students enrolled in a postsecondary institution	70.1	65.9	

There is a noticeable difference in the number of childcare centers seen per 1,000 people between Children's overall service area and Georgia. There is a higher number of Childcare Centers in the service area compared to Georgia numbers (186.3 vs. 38.3). Since Children's service area is primarily composed of urban counties, it indirectly shows that non-urban areas found in the state have lower numbers of childcare centers. There is a high need for childcare centers in less populated, non-urban areas. It also highlights a topic in need of more focus.

Childcare Centers *Per 1K population under 5 years*		Per 1K Population
Georgia		**38.3**
Overall Service Area		**186.3**
Primary Service Area		345.1
	Highest Performing	835
	Lowest Performing	116
Secondary Service Area		59.2
	Highest Performing	91
	Lowest Performing	38

Source: 2021 County Health Rankings Homeland Infrastructure Foundation-Level Data (HIFLD)

The percent of students enrolled in a postsecondary institution is slightly higher in Children's overall service area compared to Georgia (70.1 vs. 65.9). Important to highlight are the racial/ethnic differences seen in enrollment. Hispanic students are 1.3 times less likely to be enrolled in a postsecondary institution compared to white students. On the other hand, Black, non-Hispanic students are 1.11 times less likely compared to white students.

Adolescents enrolled in postsecondary institutions
Percent of students enrolled in a postsecondary institution within 16 months of graduation.

	%	n
Georgia	65.9	74,401
Race/Ethnicity		
White, non-Hispanic	70	33,313
Black, non-Hispanic	63	25,905
Hispanic	53.7	8,282

2019 Georgia Governor's Office of Student Affairs, Enrolled in Post-secondary
Note: Some counties and racial/ethnic stratifications had too few students, therefore the data was not available for the counts. They were not included in the final percentage.

Housing and Transportation

In the Housing and Transportation section, the overall service area, Georgia, and the U.S. have comparable results or values. An important item to highlight is the vehicle access indicator. Children's overall service area (5.8%) and Georgia (6.3%) have a lower percentage of households without vehicles compared to the U.S. (8.5%). Having access to a vehicle might indicate spending power but it also indirectly portrays the reliance in automobiles in this city and state.

Housing & Transportation	Overall Service Area	Georgia	U.S.
Vehicle access			
Percent households without vehicles available	5.8	6.3	8.5
Renting and Owning			
Percentage of renter occupied housing units	33.8	34.5	33.5
Percentage of owner-occupied housing units	66.2	65.5	66.5
Affordable housing and renting			
Percentage of households that spend 35% or more of their household income on housing, including mortgage	18.8	19.1	20.6
Percentage of occupied units paying rent that spend 35% or more of their income in rent	40.3	40.1	40
Unhoused Population			
Percentage of public-school students who lack a fixed, regular and adequate nighttime residence	-	2.2	3

Another relevant indicator is monthly spending on housing. It is considered that families and people shouldn't spend more than 30% of their monthly income on housing. As can be seen in the summary table above, most housing units are owner-occupied, but the highest percentages seen where people are paying more than 35% are associated to renting. Even though Children's overall service area has similar values to what is seen in Georgia and the U.S., around 40% of renter occupied units are paying above 30% of their income for housing. Renting is considered as an affordable option for housing, yet it is becoming as unaffordable as owning a house.

Gross rent as a percentage of household income

Percentage of occupied units paying rent that spend 35% or more of their income in rent

		%	n
U.S.		40	16,206,622
Georgia		40.1	509,006
Overall Service Area		40.3	287,517
Primary Service Area		40.6	243,948
	Highest Performing	35.1	7,567
	Lowest Performing	43.8	42,146
Secondary Service Area		39	43,569
	Highest Performing	29.7	3,517
	Lowest Performing	50.9	5,183

2016-2020 American Community Survey Estimates

Neighborhood and Built Environment

The environment a child grows up in has a high impact on health outcomes since it is widely understood now that health is impacted by societal and environmental structures. Some of the indicators important to highlight are juvenile delinquency cases and access to active mobility.

Environment	Overall Service Area	Georgia	U.S.
Neighborhood violence			
Rate of delinquency cases per 1,000 juveniles	699.2	474.1	-
Number of murders, rapes, robberies and aggravated assaults per 100,000 population	-	341	379
Racism and discrimination			
Index of residential segregation non-white/white	43	56	-
Internet access			
Percentage of households with broadband internet connection			
Water quality			
Percentage of population served by community water systems			
with a serious drinking water violation during the year	-	0.2	0.8
Air pollution			
Average daily density of fine particulate matter in micrograms per cubic meter (PM2.5)	9.2	7.8	8.3
Active mobility			
Percentage of children with access to a park or playground;			
recreation center, community center or boys' and girls' club; library or bookmobile; and sidewalks or walking paths	-	27.6	37.4

According to the data analyzed, Children's overall service area (699.2) has a noticeably higher rate of juvenile delinquency compared to Georgia (474.1). This can be partly explained by some of the previous issues mentioned above. Lack of access to opportunities, healthcare, and development can lead to increased rates in delinquency. It is important to find areas of need to provide opportunity to youth.

The other indicator highlighted is access to active mobility. Georgia (27.6%) has a lower percentage of children who have access to parks, clubs, walking paths, etc.; compared to the U.S. (37.4%). This is an important factor to consider when we're seeing increases in child obesity and diabetes because of sedentary lifestyles.

Socioeconomic

There are three indicators important to highlight for socioeconomical factors: WIC coverage rate, children living in poverty, and concentrated disadvantage. The WIC coverage rate is the share of people eligible for WIC who receive benefits. Here, Georgia (49.2%) has a lower coverage rate than what is seen in the U.S. (57.4%). This presents an area of opportunity to educate and promote enrollment for WIC services to those who are eligible.

Socioeconomic	Overall Service Area	Georgia	U.S.
Employment			
Proportion of children living with at least 1 parent employed	96.1	95.8	95.8
Unemployment rate			
Income			
Median household income			
Percentage of children that live in a household headed by a single parent	30.4	33.5	29.9
Government benefits			
Children eligible for free or reduced-price lunch	51.1	60	-
WIC eligibility rate	-	46.7	42.1
WIC coverage rate	-	49.2	57.4
Economic stability			
Percentage of people under age 18 in poverty	16	20.1	17.5
Percentage of households living below 150% federal poverty level	15.2	18.5	16
Concentrated disadvantage	-	32.5	25.1

Georgia (18.5%) has a higher percent of families below 150% of the poverty line compared to the U.S. (16%). It can be highlighted that Children's overall service area has a percentage lower than what is seen in the U.S.

Families below 150% of the poverty line		%	n
U.S.		**16**	**12,792,044**
Georgia		**18.5**	**475,547**
Overall Service Area		**15.2**	**210,933**
Primary Service Area		15.0	160161
	Highest Performing	6.3	4,073
	Lowest Performing	27.6	17,960
Secondary Service Area		15.7	50,772
	Highest Performing	7.2	2,299
	Lowest Performing	22.2	5,031

Source: 2016-2020 American Community Survey

The same is shown for youth under 18 in poverty. Georgia has a higher percentage of people under 18 living in poverty compared to the U.S. (20.1 vs. 17.5). Both these indicators are associated amongst themselves, but they also impact other indicators mentioned above.

People under 18 in poverty *Below poverty level*		%	n
U.S.		17.5	12,598,699
Georgia		20.1	495,477
Overall Service Area		16.0	223,982
Primary Service Area		16.1	174,245
	Highest Performing	6.4	4,104
	Lowest Performing	24.4	19,200
Secondary Service Area		15.9	49,737
	Highest Performing	4.6	1,176
	Lowest Performing	23.1	6,379

Source: 2016-2020 American Community Survey Estimates

The concentrated disadvantage indicator looks to present the percentage of households located in census tracts whose averaged z-scores of family households below the poverty line, individuals receiving public assistance, female-headed households, unemployed ages 16 and older, and population younger than 18 fall within the 75th percentile. It is an index that shows concentrated disparities. Importantly, Georgia is 1.29 times more likely to have concentrated disadvantage compared to the U.S.

Concentrated Disadvantage	%
U.S.	25.1
Georgia	32.5

Source: 2015-2019 America's Health Rankings; Compilation from American Community Survey

Note: Percentage of households located in census tracts whose averaged z-scores of family households below the poverty line, individuals receiving public assistance, female-headed households, unemployed ages 16 and older and population younger than 18 fall within the 75th percentile

It is also important to highlight that across all indicators where county level information was available, highest and lowest performing counties tended to be the same. It is helpful to identify geographical areas that are part of our service area that require more support and programming. It also shows how all social determinants are interlinked and that to achieve overall progress, all issues have to be tackled from multiple levels.

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Appendix H: Definitions

Egleston Children's Hospital at Emory University Inc. is referred to as "Egleston hospital" and "Egleston." The Board of Directors of Egleston has approved this Community Health Needs Assessment.

Scottish Rite Children's Medical Center Inc. is referred to as "Scottish Rite hospital" and "Scottish Rite." The Board of Directors of Scottish Rite has approved this Community Health Needs Assessment.

Marcus Autism Center Inc. is referred to as "Marcus Autism Center."

Emory-Egleston Children's Heart Center Inc. is referred to as "Sibley Heart Center Cardiology" and "Sibley Heart Center."

Children's also wholly owns HSOC Inc., which manages Children's Hughes Spalding hospital, referred to in this document as "Hughes Spalding Children's Hospital" and "Hughes Spalding."

The Children's Care Network is referred to as "TCCN."

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Main locations

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1405 Clifton Road NE
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Scottish Rite hospital
1001 Johnson Ferry Road NE
Atlanta, GA 30342
404-785-KIDS (5437)

Hughes Spalding hospital
35 Jesse Hill Jr. Drive SE
Atlanta, GA 30303
404-785-KIDS (5437)

Children's Support Center
Administration
1575 Northeast Expressway
Atlanta, GA 30329

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