*Jax*HATS Business Plan:

A Medical Home Program for Transitioning Youth and Young Adults with Disabilities or Special Health Care Needs

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This document, developed on behalf of FloridaHATS **(H**ealth **A**nd **T**ransition **S**ervices), provides a prototype business plan for medical home programs modeled after *Jax*HATS in Jacksonville, Florida. Communities or organizations interested in learning more about *Jax*HATS may contact:

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To learn more about FloridaHATs, visit www.FloridaHATS.org.
You may also visit the *Jax*HATS web site at www.JaxHATS.ufl.edu.

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1. Executive Summary

Assessment of Need

An estimated 15-20% of the 20 million youth and young adults (Y/YA) ages 14-26 living in the U.S. have disabilities or other special health care needs that necessitate utilization of health care services across the lifespan at much higher rates than the general population. In Florida, approximately 450,000 young people comprise this population; in Northeast Florida, the number approaches 40,000. Interruption in service provision during transition from pediatric to adult health care puts these young people at risk for acute episodes and/or death due to their primary condition, development of secondary disabling conditions, and increased cost to both the individual and systems. Florida ranks below the national average for health care transition measures, as reported in the *2005-2006 National Survey of Children with Special Health Care Needs* (34% of youth in Florida versus 41% nationally received needed transition services). In addition, approximately 30% of 18-24 year olds lack a payment source for needed health care.

Mission, Goals, Objectives & Strategies

Launched in 2005, *Jax*HATS is a collaborative program of the University of Florida (UF) Health Sciences Center-Jacksonville, Shands Jacksonville Hospital, and the Florida Department of Health/Children's Medical Services (CMS). The *Jax*HATS mission is to be a model of excellence in supporting the continuum of care for Y/YA with disabilities or chronic conditions as they transition to adulthood. The program's 3 overarching goals are to:

- Provide age-appropriate primary care, including preventive services, in a comprehensive medical home,
- Promote disease self-management, independent living, and inclusive participation in the community, and
- Support access to adult-based health care and other needed services

Measurable, outcome-oriented objectives have been developed to achieve these goals. Major program outcomes are to reduce episodes of disease complications, ER visits, and hospitalizations among Y/YA; improve acquisition of life skills such as taking medicine independently, communicating with physicians, arranging medical appointments, and meeting educational/vocational goals; and increase linkages to appropriate adult service providers. Strategies are grounded in evidence-based research, which include:

- Utilizing age appropriate, condition-specific standards of patient care,
- Providing culturally competent patient and family education,
- Employing highly qualified program staff,
- Providing educational support and consultation to adult physicians, and
- Developing medical home policies that support patient access to staff 24/7, short waiting times, adequate time with physicians, and care coordination

Among the tools used to measure performance are an internally developed transition readiness assessment called TRAQ-4.1 and a 16-item patient satisfaction survey.

Target Markets

The population served by *Jax*HATS is Y/YA ages 16-26 with complex health or developmental conditions living in Duval, Nassau, Baker, Clay, and St. Johns Counties. Patients include enrollees of CMS and referrals from Nemours Clinic, the Duval County School District, general pediatricians, and other health providers. Though all diagnoses are accepted, the most common diagnoses are sickle cell, diabetes, cerebral palsy, seizure disorders, spina bifida, intellectual disabilities and mental health disorders.

While the typical *Jax*HATS patient has a high level of need for comprehensive services, plans are underway to expand the case mix to include more "lower level" patients. These patients may include Y/YA who already have a pediatrician or other primary care provider, but the provider is not equipped to assist in transition-related support; or the Y/YA may simply need information and referrals to adult services. This will allow the program to serve a broader base of patients in Northeast Florida. *Jax*HATS also expects to begin enrolling transitioning foster care youth ages 16-23 in 2010 as part of a collaborative program between the Department of Children and Families and CMS. While most of these patients likely will not be physically medically complex, they will require a significant level of mental health and transition support.

Services & Operations

The program' s Medical Co-Directors are physicians at UF College of Medicine-Jacksonville, one from the Department of Pediatrics and one from Internal Medicine. As part of a teaching hospital, *Jax*HATS provides medical education as well as clinical care. The multi-disciplinary staff includes a nurse practitioner, nurse care coordinator, social worker/transition specialist, medical assistant, and administrative assistant. Services are currently expanding from 4 half-day clinics to 8 half-day clinics per week. Because the clinic serves as the youths' medical home during transition, all the services usually offered by primary care providers are offered. The program is designed to offer services for a limited period of time, while the youth is transitioning to adult care. This time period can vary from months to years. Graduation from the transition clinic is a function of a number of factors that interact in a very complex fashion, including developmental level of the youth, status of health insurance coverage, and availability of adult health care providers. *Jax*HATS' role is to provide the medical care and education to help youth overcome these obstacles.

Overall, service utilization and number of patients enrolled in *Jax*HATS have steadily increased from 2005-2009. In 2008-2009, a total of 272 Y/YA were served, compared to 196 in the prior year. Among those patients, approximately 50% were ages 20-25, 48% were ages 17-19, and 2% were age 16. The majority of patients who completed a satisfaction survey had positive feedback about *Jax*HATS. Importantly, self-reports of complications, ER visits, and hospitalizations show a significant reduction over time. For example, prior to enrollment in *Jax*HATS in 2005, the average number of ER visits per patient per year was 0.90. That figure decreased to 0.38 visits per patient after 1 year in the program, and has continued to a current average of 0.22. An area for improvement is the number of missed appointments, which rose in 2008-2009.

Marketing & Financial Plans

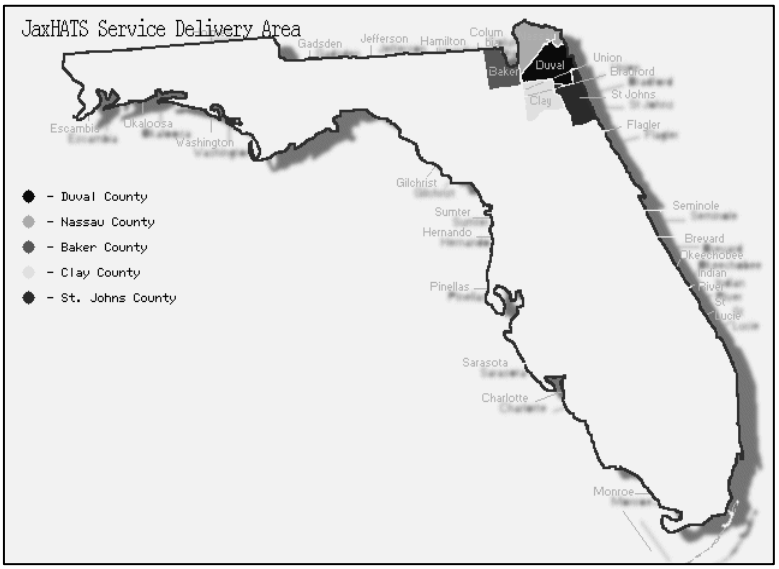
Because third party insurers such as Medicaid and private insurance do not cover many of the transition supports and care coordination services it provides, *Jax*HATS is dependent on external funding to cover staff salaries as well as in-kind support from Shands for clinical operations. The clinic relies heavily on year-to-year legislative appropriations from the state; currently, approximately 60% of the funding is from CMS and 40% is from UF. As such, its fiscal year runs July 1 – June 30. A key program objective is to secure additional extramural funds from private foundations and/or federal agencies. The program will continue to work towards self-sustainability by advocating for service payment policies that reflect the time and resources required for appropriate care, including reimbursement for care coordination and related services.

Given the challenges in identifying qualified, appropriate adult health care providers for transfer of care, future marketing efforts will focus on expanding the program's network of partners and increasing the capacity of the regional community to serve Y/YA with special health care needs. To that end, *Jax*HATS currently is taking a leadership role in the development of a community-wide health care transition coalition in Northeast Florida.

Conclusion

"A poor transition in health care can threaten health and undermine other transitions, for example in education, work, social relationships, and independent living."

This quote from the Institute of Medicine's 2007 report entitled *The Future of Disability in America* captures both the challenge and the vision embraced by *Jax*HATS: all youth with special health care needs will successfully transition to all aspects of adult life. During its 4 years of operation, *Jax*HATS has demonstrated its ability to effectively serve this population, and has formulated a plan to continue improving the continuum of care and quality of life for Y/YA and in Northeast Florida.



2. *Jax*HATS Basic Information

Program Name:	Jacksonville Health And Transition Services (*Jax*HATS)
Name of Parent Company:	University of Florida Health System UF Health Science Center-Jacksonville
Program Co-Directors:	David Wood, MD, MPH Division of Community Pediatrics Linda R. Edwards, MD Division of General Internal Medicine
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3. Assessment of Need

Youth and young adults (Y/YA) with disabilities or chronic health conditions aspire to be productive, employed, and self-sufficient. Youth want the same things in life that those without disabilities want – such as marriage, children, their own home, a fulfilling job - but their disease or health condition may present barriers to achieving those goals. An estimated 15-20% of the 20 million Y/YA ages 14-26 living in the U.S. have disabilities or other special health care needs that necessitate utilization of health care services across the lifespan at much higher rates than the general population. In Florida, approximately 450,000 young people comprise this population; in Northeast Florida, the number approaches 40,000 (see County-Level Prevalence Data on page 52 in Appendix 5). Interruption in service provision during transition from pediatric to adult providers puts these young people at risk for acute episodes and/or death due to their primary condition, development of secondary disabling conditions, and increased cost to both the individual and systems.

3.1. Burden of Illness

According to the *2005-2006 National Survey of Children with Special Health Care Needs* (NS-CSHCN), only 34% of 12-17 year olds in Florida receive the transition services they need; that figures drops to 16% in rural counties. Young people who do not receive age-appropriate health care, including preventive care, are more likely to experience disease complications, resulting in a higher number of ER visits and hospitalizations. In addition, approximately 30% of 18-24 year olds lack a payment source for needed health care. Overall, people with disabilities have lower household income levels and greater reliance on public assistance than the general population.

3.2. Barriers to Care

Comprehensive health care for people with disabilities or chronic health conditions can be expensive and time consuming, e.g., care coordination and co-management services may not be reimbursed, office visits are long, and the patient's health needs are complex. While many in this population receive services through Medicaid, the majority of adult-based physicians – particularly specialists - will not accept Medicaid (and, increasingly, Medicare) due to low reimbursement rates. Moreover, many providers in the adult health care community are not comfortable serving adults with pediatric onset health conditions because they do not have appropriate training to treat them

Finally, young adults as a group have the highest uninsurance rates of any age group, which can result in delays and critical gaps in receiving needed care. For many Y/YA, the issues first become a problem when they turn age 18 or 21, their health care insurance coverage changes, and they either are not eligible for or cannot afford other insurance options, e.g., they no longer are eligible for coverage under their parents' policy.

3.3. Evidence of Improved Outcomes

There are numerous studies that demonstrate positive health outcomes and long-term cost savings associated with providing medical homes for children and adults with chronic health conditions. Data from the NS-CSHCN show that youth who have a medical home are more likely to have received needed transition services. Though little research has focused specifically on cost savings from improved transition, there are clear benefits from reduced disease complications, hospitalizations, and ER visits. While it is difficult to assess long-term outcomes associated with transition practices (i.e., tracking employment, participation in community living, etc. requires expensive longitudinal studies), there is substantial evidence that the alternative - doing nothing – leads to increased costs and poorer performance on key health indicators.

3.4. A Multi-Level Approach to Health Care

Employing both a national and local approach are critical to improved transition. National efforts can ensure that there are mechanisms and policies for affordable health care in all states/territories; training tools and opportunities for health care professionals; and consistent, evidence-based clinical guidelines for patients during transition-age years. A number of organizations and agencies are currently addressing health care transition at the federal level, including the American Academy of Pediatrics (AAP) and other professional associations, the Maternal and Child Health Bureau (MCHB), National Council on Disability, and the Healthy People 2020 Consortium. In addition, the NS-CSHCN provides important national and state-level transition data that are used in program planning and policy development.

Because service systems and populations vary by community, it also is crucial to assess issues and conditions specific to local regions. For example, access to specialists or acute care hospitals in rural areas is significantly different than in urban areas. *Jax*HATS serves both the metro Jacksonville area and surrounding rural counties in Northeast Florida, so program staff must be familiar with the diverse demographic and socio-economic characteristics of its target population, knowledgeable about the resources available in its broad service delivery area, and proficient in making referrals based on the patients' geographic location and network of providers (e.g., health insurance network). Given the growing number of young people with disabilities or special health care needs, it is increasingly important for *Jax*HATS to engage additional community partners in its regional network of providers.

4. Mission, Strategies etc.

*Jax*HATS provides a medical home for Y/YA ages 16-26 with chronic medical or developmental problems in Northeast Florida. It is a collaborative program of the University of Florida (UF) Health Sciences Center-Jacksonville, Shands Jacksonville Hospital, and the Florida Department of Health/Children's Medical Services (CMS). The UF Health Science Center-Jacksonville encompasses four colleges: Medicine, Dentistry, Nursing and Pharmacy. Shands at UF-Jacksonville is a private, not-for-profit hospital that specializes in tertiary care for critically ill patients. Shands is one of the leading referral medical centers in the Southeast and is the primary teaching hospital for the UF College of Medicine. With more than 400 physicians representing 110 medical specialties working with a team of healthcare professionals, Shands' affiliation with UF allows patients to benefit from the latest medical knowledge and technology. While the program officially resides within UF College of Medicine-Jacksonville, it is financially supported by all three partners: UF, Shands, and CMS.

*Jax*HATS serves the counties of Duval, Nassau, Baker, Clay, and St. Johns. Its multi-disciplinary staff includes a pediatrician, internist, nurse practitioner, nurse care coordinators (RNs), and a social worker/transition specialist. Launched in 2005, the *Jax*HATS team provides primary medical care to address the young person's immediate medical needs, and helps transition them to appropriate primary care providers and specialists in the adult health care system. The *Jax*HATS team also works with youth over time, to help them gain the knowledge and skills they need to achieve their long term life goals. MCHB has identified *Jax*HATS as one of 7 model health care transition practices in the U.S.

4.1. Vision

All youth with disabilities or special health care needs will successfully transition to all aspects of adult life, including adult health care, work, and independence.

4.2. Mission

To be a model of excellence in supporting the continuum of care for youth with disabilities or special health care needs as they transition to adulthood.

4.3. Values

- Y/YA and their families or caregivers will participate in decision-making at all levels, and be satisfied with the services they receive.

- Y/YA will receive coordinated, ongoing, comprehensive care within a medical home.

- Y/YA will have adequate private and/or public insurance to pay for the services they need.

- Y/YA will be continuously screened to detect other conditions and prevent secondary disabilities.

- Community-based systems will be integrated, collaborative, and organized so Y/YA and their families can use them easily.

- Y/YA will receive services that meet their physical, social, and developmental needs.

4.4.SWOT

Strengths, Weaknesses, Opportunities, Threats:

Internal	External
Strengths: • Knowledgeable, committed leaders • Association with UF/Shands provides credibility and perceived high quality of care • Recognized at both the state and national level as a promising model • High need for the program • Collaborative infrastructure ensures engagement of key partners (UF-Jacksonville, Shands)	Opportunities: • Growing national and state interest in transition within the health field • Potential to secure legislative support • Can serve as model for replication in other regions of state and nation • Health care reform may provide support for the program • Interest among community partners • Growing population
Weaknesses: • Unstable funding • Population is difficult to engage and transitory • Difficulty securing experienced staff for operating core • Difficult to engage providers in adult-based health care • Service provision for this population is very expensive and time-consuming, and some services are not reimbursable (e.g., care coordination, co-management) • Collaborative infrastructure can create delays and/or barriers to decision-making • Role as teaching clinic is time-consuming. • Inner city location not easily accessible to all youth.	Threats: • Competing for resources at all levels (within university, state, U.S.) • Competing for media exposure/ public attention to the issue • Uncertain political environment • Salaries of selected positions are higher in other programs • Several community partners currently are not part of the collaboration

4.5. Goals

- Provide age-appropriate primary care, including preventive services, in a comprehensive medical home
- Promote disease self-management, independent living, and inclusive participation in the community
- Support access to adult-based health care and other needed services

4.6. Objectives

By the end of FY 2010-2011:

Indicator	Current Performance Level	Target Performance Level	Percent Change
1. Reduce incidence of reported disease complications among patients	31%	26%	5%
2. Reduce incidence of reported ER visits among patients	23%	18%	5%
3. Reduce incidence of hospitalizations among patients	16%	11%	5%
4. Reduce incidence of missed appointments among patients	28%	23%	5%
5. Increase patient satisfaction with the services they receive			
6. Increase percentage of patients who have completed a transition plan	50%	75%	50%
7. Increase number of referrals to community services/providers	586	675	15%
8. Increase number of patient transfers to adult primary care providers	12	20	65%
9. Increase level of self-care among patients who have been enrolled in the program at least 12 months * As measured by TRAQ-4.1 scores (actively take own medicine, talk to physicians independently, recognize atypical symptoms, arrange medical appointments and transportation, etc.)	3.8	4.0	5%
10. Increase amount of extramural funding from private and/or public organizations in order to support and expand program operations	$150,000	$250,000	65%

4.7. Strategies

The following strategies are grounded in evidence-based research; literature references are listed on pages 29 and 30 in the Bibliography section.

- Utilize age appropriate, condition-specific standards of patient care
- Provide comprehensive, culturally competent and linguistically appropriate patient and family education
- Employ experienced, credentialed, and highly qualified program staff
- Provide on-going professional development and training for staff, including training on how to:
    - educate patients about disease self-management
    - communicate effectively
    - develop efficient operating systems
- Employ a range of data collection and surveillance tools, including an electronic health information system, to measure, analyze and report performance data
- Provide educational support and consultation to adult physicians during the transition process (e.g., provide clinical guidance)
- Develop medical home policies that support patient access to staff 24/7, short waiting time for appointments, adequate face time with physicians, care coordination and referrals, as needed.
- Engage and empower patients through mechanisms such as establishing a Y/YA-family advisory body and hiring a paid Y/YA advocate.
- Facilitate the development of a regional health care transition coalition; support improved coordination, communication, and training among community-based providers.
- Utilize new sources of funding to expand the program's patient mix, i.e., increase the number of "low level" patients.
- Work with state agencies and insurers to advocate for and develop service payment policies that reflect the time and resources required for appropriate care, including reimbursement for care coordination and related services.

5. Service Description

The purpose of *Jax*HATS, as reflected in its 3 overarching goals, is to provide a system of health care in Northeast Florida that facilitates continuity of care between childhood and adulthood. A medical home for children and youth with disabilities or special health care needs is an essential component of this system.

Also known as a health care home or "Patient Centered Medical Home," a medical home is more than just a personal doctor or source of usual care. It includes a primary care provider (PCP), such as a physician, nurse practitioner or other medical professional, who cares for patients over an extended period of time; provides screening and preventive services; takes care of routine health problems; is accessible 24/7; and makes referrals to specialty care providers or community resources. The medical home functions as the central point for coordinating care around the patient's needs and preferences. It coordinates between all of the various team members, which include the patient, family members and caregivers, specialists, other healthcare services (public and private), and non-clinical services that are needed and desired by the patient. Integrated into the *Jax*HATS medical home model is a tool that assesses readiness for transition, and an evaluation component that measures interpersonal aspects of the program and patient satisfaction.

5.1. General Description

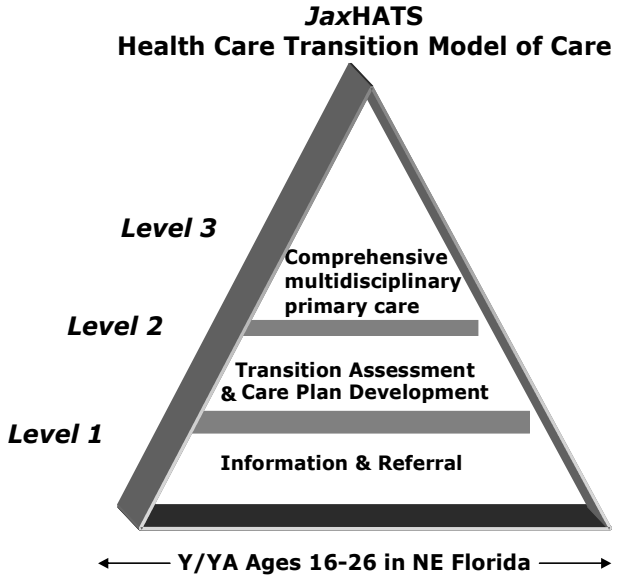
The *Jax*HATS team is lead by a pediatrician and internist who work together as Co-Directors. This structure leverages the expertise of each to address a wide range of health issues faced by both children and adults. In addition to providing primary medical care and referral to specialists, program staff assesses the readiness of patients to transition to adult health care services; identifies individual barriers to educational and vocational transition readiness; and provides supports to remove health-related barriers and promote engagement in transition planning to meet their educational and vocational goals.

The clinic serves as the youths' primary care provider during transition and provides all services usually offered by primary care providers. The program is designed to offer services for a limited period of time, while the youth is transitioning to adult care. This period of time can vary from months to years. Graduation from the transition clinic is a function of a number of factors that interact in a very complex fashion. *Jax*HATS' role is to provide the medical care and education to help youth overcome these obstacles:

- *Developmental level of the youth.* Adolescents and young adults may not be ready or willing to become independent in their own self management or in use of the adult health care system. The staff provides education and supports, and monitors these issues through the use of a transition readiness questionnaire.
- *Insurance coverage.* Loss of health insurance is very common in this age group, and disrupts successful transition. The staff works actively with the youth and their families to help them keep health insurance.
- *Availability of adult health providers*. For some conditions there are few adult providers who are trained to care for youth with these conditions. For example, it is very difficult to find adult primary care providers willing to care for youth with autism, behavioral problems, cerebral palsy or spina bifida.

- *Disconnected youth.* Due to a variety of factors, many youth with chronic medical or mental health problems drop out of school and do not enter the work force. Without these activities or life goals, youth may lose their motivation to take care of other issues critical to their health and health care.

The diagram below illustrates how *Jax*HATS serves the population of young people with complex needs who require a high level of services and supports. While many Y/YA needs may require only information and referral to adult services, *Jax*HATS provides comprehensive, multidisciplinary primary care to Y/YA with significant health care needs and simultaneously supports their transition to adulthood. The majority of patients are Level 3 clients.



5.2. Transition Readiness Assessment

Because transition assessment instruments with established psychometric properties are not available, *Jax*HATS developed and is currently testing a new tool using the Stages of Change model called the Transition Readiness Assessment Questionnaire (TRAQ-4.1). The questionnaire and more information about Stages of Change are located on page 32 in Appendix 2. The purpose of TRAQ-4.1 is to:

- Assess knowledge and skills that patients and their caregivers need for effective transition, such as disease understanding, medication management, and understanding of and access to adequate financing for health care services. Identification of problematic areas can assist providers in developing a care plan that is tailored to the patients/caregiver's strengths and weaknesses in areas vital to transition into adult-based medicine.
- Identify *Jax*HATS program activities and components that can mediate effective provision of a medical home to Y/YA with special health care needs and their caregivers; and

- Determine the impact of J*ax*HATS program components (i.e., care coordination, adult health care planning, educational needs assessment, vocational planning and referral, habilitation/ independent adult living services and goals, etc.) on the patient's and/or caregiver's transition-related knowledge and skills.

5.3. Assessment of Patient Satisfaction

*Jax*HATS utilizes a 16-item satisfaction survey that enables patients and caregivers to assess important aspects of their care, such as getting needed care quickly; ease and quality of communication with doctors; and courtesy, respect, and helpfulness of program staff. The survey was adapted from the CAHPS Health Plan Survey, which has been widely used to evaluate the interpersonal aspects of health care programs and is reported to be reliable and valid. Sixteen items are rated on a 5-point Likert scale, and take about 3 minutes to complete. Response categories range from "1-Strongly Disagree" to "5-Strongly Agree." (see page 36 in Appendix 3). The staff regularly revisits the questionnaire to ensure all aspects of the patient experience is captured and assessed.

5.4. Competitive Assessment

Because service provision for this population is very expensive and time-consuming, there is little concern about invading the turf of others. Of more concern is that adult primary care providers may feel threatened or overwhelmed with the number of complex patients referred from *Jax*HATS. Consequently, it is imperative that the network of program partners is expanded to increase the capacity of the regional community to serve Y/YA with disabilities or other special health care needs.

6. Present Performance

Overall, service utilization and number of patients enrolled in JaxHATS have steadily increased from 2005-2009. In 2008-2009, a total of 272 Y/YA were served, compared to 196 in the prior year. Among those patients, approximately 50% were ages 20-25, 48% were ages 17-29, and 2% were age 16. A 4-year program summary is provided on page 31 in Appendix 1.

A total of 45 patients and caregivers were asked to complete the Satisfaction Survey in 2008-2009. Patients were advised of the anonymity of their responses and that completion or non-completion of the survey would not affect the services they receive from JaxHATS. Over half of the respondents were female (62.2%) and the average age was 19 years. The majority of patients surveyed indicated their experiences were positive; responses across all items were most frequently rated 4 (agree) or 5 (strongly agree). A detailed summary of Satisfaction Survey results is found on page 37 in Appendix 3.

Given the importance of care coordination as a key component of the JaxHATS medical home, a future consideration is to add a question about satisfaction with referrals and coordination of care. The program also is exploring a mechanism for staff members to report their observations about service provision and patient experiences. The planning matrices on pages 43 and 44 in Appendix 4 outlines several important aspects of assessing patient satisfaction, including developing satisfaction-related program objectives and identifying staff members with responsibility for managing and analyzing survey data.

In addition, a number of medical homes for children with special health care needs have found that family advisory bodies are very effective in engaging and empowering families. As such, *Jax*HATS hopes to form a Y/YA-Family Advisory Committee by next year that provides feedback and guidance on program policies and procedures. Stipends and incentives would be provided to Y/YA and families willing to serve on the committee.

Among 126 Y/YA who completed the transition readiness assessment in 2008-2009, average score on the 5-point scale for *Skills for Chronic Condition Self-Management* was 3.21; for *Skills for Self-Determination and Health Care Utilization*, the average was 3.65 (both scores fall within the "Preparation" stage). Complete results are found on page 34 in Appendix 2. The goal is to increase patient self-care scores by an average 0.5 points or more over the next year. More in-depth analysis of the data (e.g., quartile analysis) could be useful in determining where high risk response patterns exist.

Almost all patients were referred to adult medical specialists in 2008-2009, though only 12 were transitioned to an adult PCP. Factors that have limited the program's ability to "graduate" more patients include a contractual requirement to serve all CMS patients until age 21, and difficulty in identifying adult PCPs for individuals with development disabilities. As a relatively new program, many patients also are not yet ready to transition. However, a key program objective is to increase the number of patients who graduate in 2011-2012.

Self-reports of complications, ER visits, and hospitalizations show a significant reduction over time. Prior to enrollment in *Jax*HATS in 2005, patients averaged 0.90 ER visits per year. That figure decreased to 0.38 visits per patient after 1 year in the program, and has continued to a current average of 0.22. Similarly, the proportion of patients who are hospitalized annually has dropped from 44% prior to program enrollment in 2005, to a current figure of 16%. While the number of missed appointments (e.g., patient "no shows") dropped considerably early in the program, that figure increased from 2007 to 2009. As a result, the program currently is looking at ways to improve performance, such as revisiting protocols for patient scheduling and reminders.

The following table shows data from pre-enrollment to present day:

	2005 N=112	2006-2007 N=114	2007-2008 N=41	2008-2009 N=97
ER Visits Reported	90.2% (101)	37.7% (43)	26.8% (11)	22.7% (22)
Hospitalizations Reported	43.8% (49)	31.6% (36)	31.7% (13)	15.5% (15)
Complications Reported	n/a	n/a	n/a	30.9% (30)
Missed Appointments	n/a	30.8% (146)	17.3% (109)	27.4% (228)

n/a = Not available

7. Target Markets

The population served by JaxHATS is Y/YA ages 16-26 with significant chronic health or developmental conditions. Due to Joint Commission accreditation rules, the clinic cannot see individuals younger than age 16 (as mentioned earlier, 16 year olds account for only 2% of patients). Patients include enrollees of CMS and referrals from Nemours Clinic, the Duval County School District, general pediatricians, and other health providers. Though all diagnoses are accepted, the most common diagnoses are sickle cell, diabetes, cerebral palsy, seizure disorders, spina bifida, intellectual disabilities and mental health disorders. Individuals served in the program generally have coverage with Medicaid, KidCare, CMS SafetyNet, or private insurance, though some are uninsured.

The following shows *Jax*HATS patients' diagnostic categories and percentage of case mix in 2008-2009:

Cerebral Palsy	16.9%
Developmental Disability/ Congenital Disorder	15.4%
Sickle Cell Disease/ Other blood disorder	11.4%
Autism	9.6%
Neuromuscular Disorder	7.4%
Mental Health Disorder	6.3%
Diabetes Type 1	5.9%
Pulmonary	3.7%
Diabetes Type 2	2.9%
Spina Bifida	2.9%
Seizure Disorder	2.6%

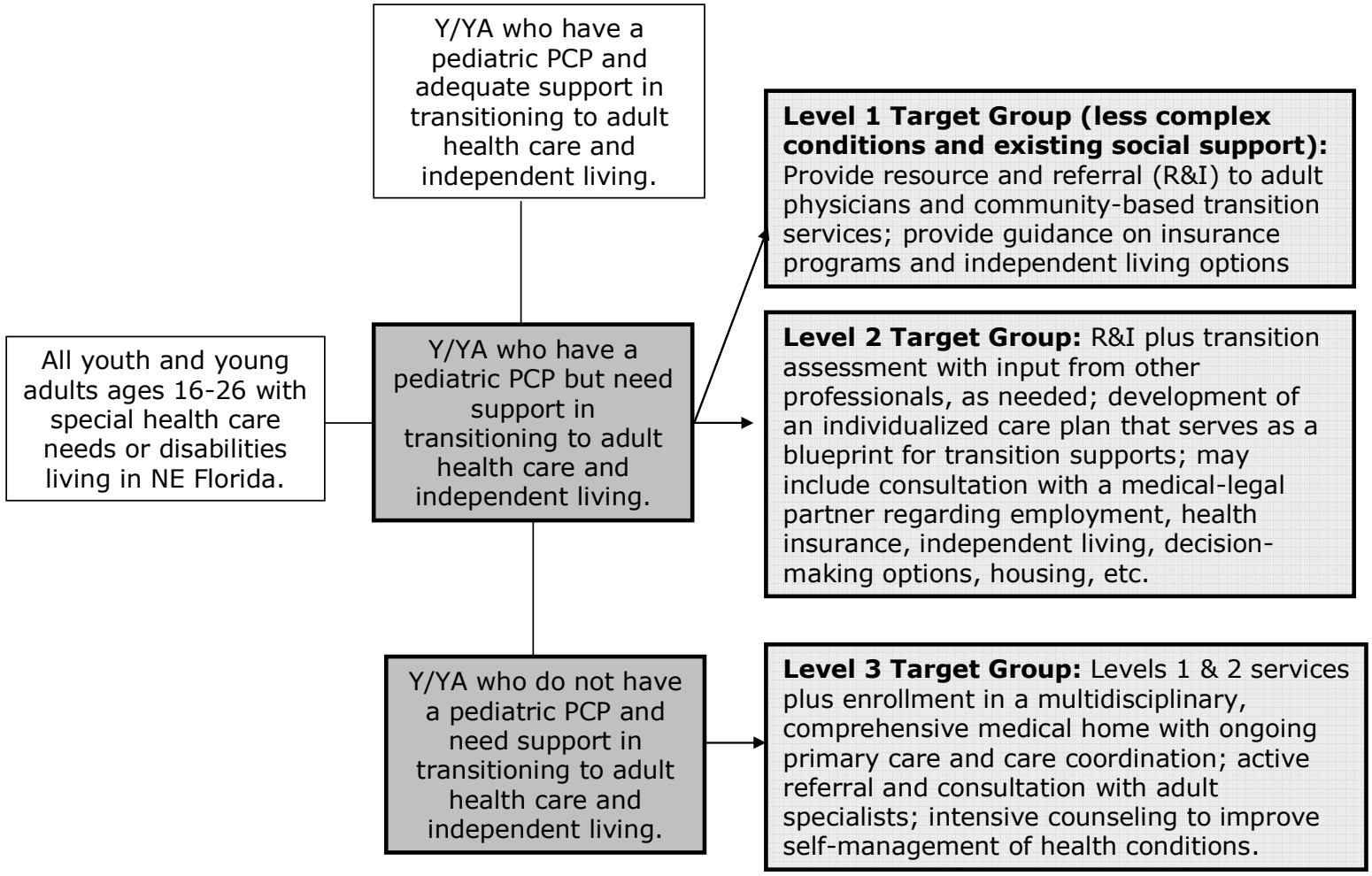
Autoimmune/S/P Transplant	2.2%
Other Endocrine Disease/ benign tumor	2.2%
Traumatic Brain Injury	2.2%
Cancer	1.8%
Cardiovascular	1.5%
Musculoskeletal Disorder	1.1%
Obesity	1.1%
Urologic Problem/GU/GYN	1.1%
Renal Disease/Transplant	.7%
Spinal Cord Injury	.7%
Bone	.4%

While most current *Jax*HATS patients have a high level of need for comprehensive services, plans are underway to expand the case mix to include more "lower level" patients. These patients may include Y/YA who already have a pediatric PCP (and don't require medical home services) but the PCP is not equipped to assist in transition-related support such as identifying adult providers in the community, helping Y/YA access insurance coverage, or linking them to other community services they might need for independent living. They may simply need information and referrals (see "Level 1" patients in the illustration on page 16) or help in developing a transition plan and with systems navigation ("Level 2" patients). By expanding the consultative role of *Jax*HATS for Levels 1 and 2 patients and their respective PCPs, the program will be able to serve a broader population of Y/YA in Northeast Florida. However, Y/YA who need a medical home and all of its accompanying services (Level 3 patients) would continue to be the foundation of *Jax*HATS.

The program also anticipates starting to enroll transitioning foster care youth ages 16-23 in 2010 as part of a collaborative program between the Department of Children and Families (DCF) and CMS (funded by DCF). These Y/YA will likely require a mix of all 3 service levels; while most will not be physically medically complex, they will need a significant level of mental health and transition support to meet their independent living and vocational goals.

The diagram on the following page shows the target groups and types of services provided.

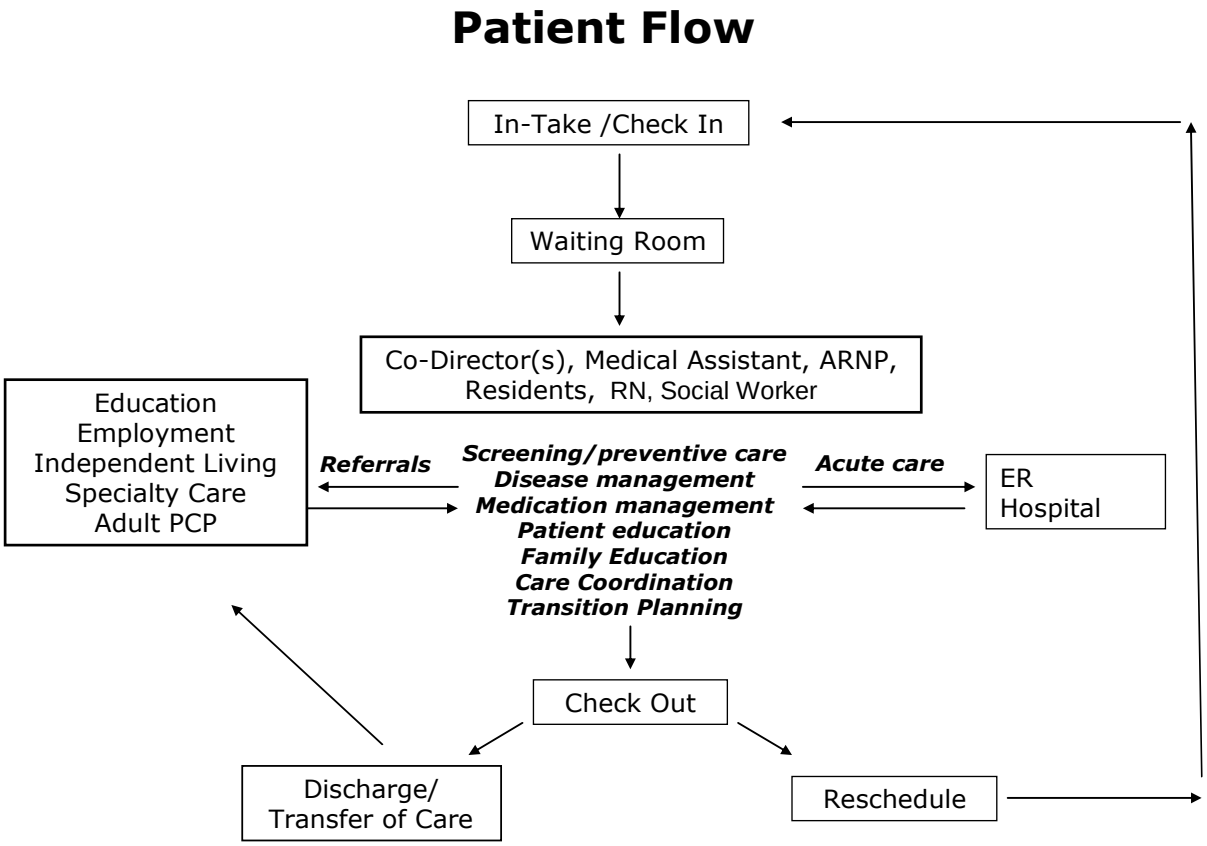
Target Groups



8. Operations

8.1. Operating Procedures

*Jax*HATS services currently are provided in 4 half-day clinics each week at the Shands Jacksonville Adult Ambulatory Care Center, but will expand to 8 half-day clinics/week to accommodate increasing program enrollment. Each clinic averages 6-7 patients. The primary care team is staffed with at least one Co-Director, ARNP, Medical Assistant and medical residents, while the Nurse Care Coordinator (RN) and Social Worker/Transition Specialist handle the patient's transition support needs. Patient visits are scheduled every 3 months. The following diagram illustrates the steps/stages taken in providing care from point of initial contact to referral or release of the patient.



8.2. Outcome Flowchart

The flowchart on the following page illustrates how *Jax*HATS resources and activities are operationalized to achieve short and long term outcomes/program goals.

Inputs →	Processes →	Short Term Outcomes →	Long Term Outcomes
Resources - Pediatric PCP - Adult PCP - ARNP - Nurse Care Coordinator (RN) - Social Worker/ Transition - Specialist -- Administrative Assistant -- Medical Assistant - HIT infrastructure (billing, EMR, tracking) - Facilities - Community providers: pediatric specialists, adult PCPs and specialists, social services, education, independent living	**Activities** - Direct patient care - Patient/family education and transition planning - Training (staff and community providers) - Coordinate community-wide - health care transition - coalition - Facilitate improved coordination and communication among providers -- Facilitate change in the adult - health care system	- Reduce episodes of disease complication (ER visits and hospitalizations) - Increase patient satisfaction	Patient will receive age-appropriate primary health care (including preventive services) in a comprehensive medical home.
		- Increase number and scope of self-care skills (medication compliance, appointment compliance, communication, etc.)	Patient will acquire the knowledge and skills for disease self-management, independent living, and inclusive participation in the community, including achieving educational and vocational goals.
		- Increase number of referrals to community services/providers - Increase number of completed transition plans - Increase number of patient transfers of care to adult providers	Patient will access necessary adult-based health care and related services that they need.

9. Management & Administration

9.1. Management Structure

The program's Medical Co-Directors are physicians at UF College of Medicine-Jacksonville, one from the Department of Pediatrics and one from Department of Medicine-Division of General Internal Medicine. While *Jax*HATS is formally a program of UF-Jacksonville, informal decision-making is shared between the UF-Jacksonville and its partners, Shands and CMS.

9.2. Key Management Profiles

David L. Wood, MD, MPH, is a Professor in the Division of Community Pediatrics in the Department of Pediatrics at the College of Medicine in Jacksonville. Dr. Wood earned his MD and MPH degrees at the University of California Los Angeles (UCLA) Schools of Medicine and Public Health, and completed residencies in Pediatrics and in Preventive Medicine/Public Health. He completed a combined fellowship in health services research and primary care pediatrics at RAND and UCLA. Dr. Wood has served as chair and/or member of a number of national, state or local committees, including the Board of the Partnership for Children, Healthy Jacksonville 2010, the American Academy of Pediatrics' Council on Community Pediatrics, and the Florida Developmental Disabilities Council. He has published more than 100 peer reviewed publications, reports, book chapters, and Web-based materials primarily focused on health services for poor, minority and disadvantaged children.

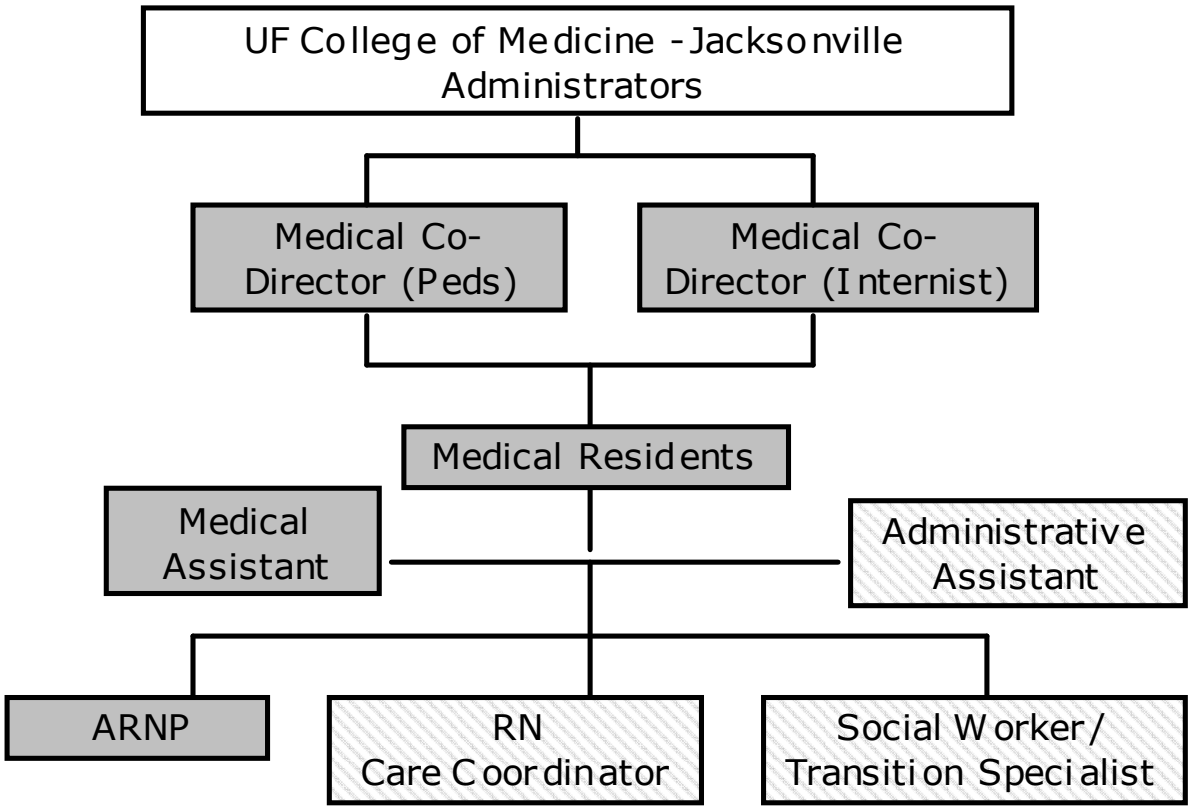
Linda R. Edwards, M.D. is an Associate Professor in the Department of Medicine-Division of General Internal Medicine; Chief, Division of General Internal Medicine; and Associate Chair, Department of Medicine. Dr. Edwards earned her MD degree at East Carolina University, Greenville, NC, and completed her residency in Internal Medicine at the Jacksonville Health Education Programs (JHEP). She is Board Certified in Internal Medicine, and her clinical interests include domestic violence along with transition healthcare issues for youth and adolescents.

9.3. Administration & Systems

The chart on the following page identifies current *Jax*HATS program positions within the context of primary care and transition support functions. Because the clinic provides medical education as well as clinical care, clinics typically include medical residents from UF-Jacksonville College of Medicine.

Many organizations have found that employing a Family Advocate is an effective strategy to engage their clients. Given additional funding, the program anticipates adopting a similar approach by hiring a paid Y/YA Advocate (could be part-time, and. ideally, a *Jax*HATS "graduate") to assist, advise, and help empower *Jax*HATS patients.

Organizational Chart



Primary Care

Transition Support

10. Marketing & Outreach

*Jax*HATS' primary marketing effort to-date has been the development of a consumer-friendly web site (www.jaxhats.ufl.edu). Given the challenges in identifying qualified, appropriate adult health care providers for transfer of care, future efforts should focus on expanding its network of partners and increasing the capacity of the regional community to serve Y/YA with disabilities or other special health care needs. In addition, the program needs to increase outreach to organizations that serve children with complex needs, such as Nemours Hospital.

To that end, *Jax*HATS currently is taking a leadership role in the development of a community-wide health care transition coalition in Northeast Florida. With support and guidance from FloridaHATS, a collaborative program of CMS and other state agencies, the regional coalition will utilize a public health strategic planning model (MAPP*: Mobilizing for Action through Planning and Partnership*) to continue building a system that effectively provides continuity of care for Y/YA. The flowchart below outlines the MAPP process:

Activity: Develop a NE Florida health care transition coalition and strategic plan using the MAPP approach	**9-Month Schedule**								
	1	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**
JaxHATS organizes Steering Committee (5-10 people): Address facilitation and/or funding needs Develop participant invitation list (15-30 people) Develop timeline of planning activities Identify meeting location(s) and dates Send invitation letter									
Coalition Meeting #1: Introduction and Visioning Homework for Participants: Resource Mapping Survey									
Compile survey results									
Coalition Meeting #2: Community Themes & Strengths- Health Care Transition System Assessment									
Format Community Resources/Asset Map									
Coalition Meeting #3: Youth/Young Adult Health Status Assessment Forces of Change Assessment									
Format health profile report, indicators, & measures									
Coalition Meeting #4: Identify Strategic Issues, Formulate Goals & Strategies									
Draft the planning report									
Coalition Meeting #5: Action Cycle Next Steps									
Format final plan									

A potential outcome of the MAPP process is an outreach campaign sponsored by the coalition to engage more adult health care providers in the care of Y/YA. This could include training symposiums to educate providers about childhood onset conditions, and/or a coordinated social marketing campaign. The following provides a sample marketing budget for such an activity:

Target: Adult Primary and Specialty Care Providers in NE Florida

Objective: By 2011, increase number of providers in NE Florida who serve youth & young adults with disabilities or special health care needs by 40%.

Activity/ Budget Item/ Month	1	2	3	4	5	6	7	8	9	10	11	12
Gather data: Marketing consultant, staff	X	X										
Set Goals/Objectives: Consultant, staff	X	X										
Formulate Messages: Focus group/survey, consultant			X	X								
Select Channels: Consultant, staff, focus group feedback			X	X								
Pretest Messages: Focus group, materials, consultant					X	X						
Communicate Messages: Print brochures, ads, PR, oral presentations, consultant							X	X	X	X	X	X
Evaluate: Staff, consultant, focus group/surveys, materials							X	X	X	X	X	X
Cost: Marketing Consultant $10,000 Focus Group/Survey Incentives (refreshments, stipends) $1,000 Material production (design, printing) $18,000 Journal ads (media cost) $3,500 Travel $1,000 Office Supplies $1,500 Staff time In-Kind **$35,000** ** Completed materials could be adapted and utilized by other communities in a statewide campaign*												

Given the proposed expansion of *Jax*HATS' case mix to include more low-level patients (e.g., Y/YA who have a PCP but need assistance with transition-related issues), the program also will explore development of an outreach effort targeted to pediatric primary care providers who may refer Y/YA to *Jax*HATS for transition planning and support services (without medical primary care).

Finally, *Jax*HATS introduced a patient recognition event last year that was very well received by families and the community, and so will continue the activity as an annual event. All patients who graduated from high school (21 in 2009) were honored in a special ceremony that included award presentations by state legislators, UF and CMS administrators, and *Jax*HATS staff. For most patients, this represents a monumental accomplishment that was attained by overcoming significant health and related challenges.

11. Financial Plan

Because third party insurers such as Medicaid and private insurance do not cover many of the transition supports and care coordination services it provides, JaxHATS is dependent on external funding to cover staff salaries, including a portion of physician time. The program relies heavily on year-to-year legislative appropriations from the state, and has experienced decreased funding recently due to the economic downturn. Approximately 60% of its funding comes from CMS and 40% from UF, with in-kind contributions from Shands to support clinical operations. Despite increases in service utilization and billings since its launch in 2005, patient revenue has remained stagnant and the overall collection rate declined from approximately 30% to 24% in the last year. As a state-funded program, *Jax*HATS' fiscal year runs July 1 – June 30.

A key program objective is to secure additional extramural funds, either from a private foundation and/or federal agency. *Jax*HATS will continue to work towards self-sustainability by advocating for service payment policies that reflect the time and resources required for appropriate care, including reimbursement for care coordination and related services.

The 2009-2010 budget outlined below can support services for approximately 500 patients, based on a case mix of minimum 200 Level 3 patients. Note that this budget does not include in-kind contributions from Shands or allocations for marketing, outreach, or promotion. Marketing funds will be pursued through grants and/or through community-wide initiatives with the regional coalition.

Item	Percent	Budget
Salaries Medical Co-Director (Peds), 0.4 FTE Medical Co-Director (Int), 0.1 FTE ARNP, 1.0 FTE RN, 1.0 FTE Transition Specialist, 1.0 FTE Medical Assistant, 1.0 FTE Administrative Assistant, 1.0 FTE	88%	$378,000.00
Contracted Services (AmeriCorps)	4%	$18,400.00
Supplies	.6%	$2,700.00
Data Processing	1%	$5,000.00
Real Estate/Facilities	4%	$17,250.00
Travel	.1%	$300.00
Telephone	.3%	$1,000.00
Contract Fees	1.7%	$7,500.00
Total Budget		**$430,150.00**

* Does not include in-kind contributions from Shands to support clinical functions.

12. Bibliography

American Academy of Pediatrics, American Academy of Family Physicians, and the American College of Physicians – American Society of Internal Medicine. A consensus statement on health care transitions for young adults with special health care needs. *Pediatrics.* 2002; 110:1304-1306.

Anderson, B.J., & Wolpert, H.A. (2004). A developmental perspective on the challenges of diabetes education and care during the young adult period. *Patient Education and Counseling, 53*, 347-352.

Arnett, J. (2004). *Emerging Adulthood: The Winding Road from Late Teens through the Twenties*. Oxford University Press: Oxford, UK.

Betz, D.L. (2004). Transition of adolescents with special health care needs: Review and analysis of the literature. *Issues in Comprehensive Pediatric Nursing, 27,* 179-241.

Blum, R.W., Garrell, D., Hodgman, C.H., & Slap, G.B. (1993). Transition from child-centered to adult health-care systems for adolescents with chronic conditions: A position paper of the Society of Adolescent Medicine. *Journal of Adolescent Health, 14(7),* 570-576.

Callahan, S.T., & Cooper, W.O. (2007). Continuity of health insurance coverage among young adults with disabilities. *Pediatrics*, *119(6),* 1175-1180.

Child and Adolescent Health Management Initiative. *2005-2006 National Survey of Children with Special Health Care Needs.* Retrieved December 18, 2008, from http://cshcndata.org

Cooley, C, McAllister, J., Sherrieb, K., & Kuhlthau, K., 2008. Improved outcomes associated with medical home implementation in pediatric primary care. *Pediatrics, 124,* 358-364.

Greenen, S.J., Powers, L.E., & Sells, W. (2003). Understanding the role of health care providers during the transition of adolescents with disabilities and special health care needs. *Journal of Adolescent Health, 32(3),* 225-233.

Healthy & Ready to Work National Center [Web site]. Department of Health and Human Services, Health Resources and Service Administration, Maternal and Child Health Bureau, Division of Services for Children with Special Health Care Needs, Washington, D.C. http://www.hrtw.org.

*Jax*HATS. (2008-2009, 2007-2008). *JaxHATS Annual Report.* Jacksonville, FL: Author.

Rosen, D.S., Blum, R.W., Britto, M., Sawyer, S.M., & Siegel, D.M. (2003). Transition to adult health care for adolescents and young adults with chronic conditions: Position paper of the Society for Adolescent Medicine. *Journal of Adolescent Health, 33(4),* 309-311.

Scal, P., & Ireland, M. (2005). Addressing transition to adult health care for adolescents with special health care needs. *Pediatrics, 115(6),* 1607-1612.

U.S. Census Bureau. 2008 American Community Survey: U.S., Florida and Duval County. Available at http://factfinder.census.gov

U.S. Department of Education, Office of Special Education Programs. *An overview of findings from wave-2 of the National Longitudinal Transition Study-2.* Menlo Park, CA; 2006. Available at http://policyweb.sri.com/cehs/publications/publications.jsp.

U.S. Department of Health and Human Services, Health Resources and Services Administration, Maternal and Child Health Bureau. *The National Survey of Children with Special Health Care Needs Chartbook 2005–2006.* Rockville, Maryland. [online database available at http://cshcndata.org]

U.S. Department of Health and Human Services. *The Surgeon General's Call To Action To Improve The Health And Wellness Of Persons With Disabilities.* July 2005. Available at http://www.surgeongeneral.gov/library/disabilities.

U.S. Department of Health and Human Services. *Healthy People 2010: Volume I* (2nd ed.); 2000. Available at http://www.healthypeople.gov/Document/tableofcontents.htm#volume1

13. Appendices

Appendix 1: 2005-2009 Program Summary

	2005-2006		2006-2007		2007-2008		2008-2009	
	Total	**Mean**	**Total**	**Mean**	**Total**	**Mean**	**Total**	**Mean**
Number of clinics held per month	30	4.28	103	8.58	97	8.08	122	10.17
Type of Clinic								
Primary Transition Clinic	30	4.28	94	7.83	97	8.08	122	10.16
Specialty Care Transition Clinic	n/a	n/a	9	0.75	n/a	n/a	n/a	n/a
Applicants / Enrollment								
Total number of enrollees	n/a		n/a		196		272	
Number of individuals who requested admission	81	11.57	128	10.66	137	11.42	120	10
Number that did not finish enrollment process	17	2.42	26	2.17	28	2.33	19	1.5
Visits								
Number of visits to the transition clinic	127	18.14	474	39.5	630	52.5	833	69.42
Number of follow-up visits to the transition clinic	58	8.28	370	30.83	519	43.25	731	60.92
Number of no-shows for transition clinic	26	3.71	146	12.17	109	9.08	228	19
Ages served By Visit	**N=99**		**N=482**		**N=620**		**N=841**	
16 years old	12	12%	17	4%	25	4%	17	2%
17-19 years old	73	74%	305	63%	361	58%	406	48%
20-25 years old	14	14%	160	33%	234	38%	418	50%
Referrals Made to:								
Medical Specialists	58	8.28	353	29.57	510	42.5	421	35.08
Other Providers	25		95		150	12.5	165	13.75

Year 1 - December 2005 to June 2006
Year 2 – July 2006 to June 2007
Year 3 – July 2007 to June 2008
Year 4- July 2008 to June 2009

Mean = total number / number of months
n/a = Not available

Appendix 2: TRAQ-4.1 (Transition Readiness Assessment Questionnaire)

Subject Number: _____ Date _____
Person Completing Survey: _____

Directions: We would like to know how you describe your skills in the areas that are important in your care. Your answers will help us provide services and education that will be important in preparing you to transition to adult health care. There is no right or wrong answer and your answers will remain confidential and private. Please check the box ☑ that you feel best describes you.

	Not needed for my care	No, I do not know how	No, I do not know how but I want to learn	No, but I am learning to do this	Yes, I have started doing this	Yes, I always do this when I need to
Skills for Chronic Condition Self-Management						
1. Do you fill a prescription if you need to?						
2. Do you know what to do if you are having a bad reaction to your medications?						
3. Do you pay or arrange payments for your medications?						
4. Do you take medications correctly and on your own?						
5. Do you reorder medications before they run out?						
6. Do you take care of your medical equipment and supplies?						
7. Do you call the suppliers when there is a problem with the equipment?						
8. Do you order medical equipment before they run out?						
9. Do you arrange payment for the medical equipment and supplies?						
10. Do you call the doctor's office to make an appointment?						
11. Do you follow-up on any referral for tests or check-ups or labs?						
12. Do you arrange for your ride to medical appointments?						
13. Do you call the doctor about unusual changes in your health (For example: Allergic reactions)?						
14. Do you apply for health insurance if you lose your current coverage?						
15. Do you know what your health insurance covers?						
16. Do you manage your money & budget household expenses (For example: use checking/debit card)?						

	Not needed for my care	No, I do not know how	No, I do not know how but I want to learn	No, but I am learning to do this	Yes, I have started doing this	Yes, I always do this when I need to
Skills for Self-Advocacy and Health Care Utilization						
17. Do you fill out the medical history form, including a list of your allergies?						
18. Do you keep a calendar or list of medical and other appointments?						
19. Do you tell the doctor or nurse what you are feeling?						
20. Do you answer questions that are asked by the doctor, nurse or clinic staff?						
21. Do you ask questions of the doctor, nurse or clinic staff (For example: What medications or treatments are best for you)?						
22. Do you make a list of questions before the doctor's visit?						
23. Do you request the accommodations & support you need at school or work?						
24. Do you apply for a job or work or vocational services?						
25. Do you get financial help with school or work						
26. Do you help plan or prepare meals/food?						
27. Do you keep home/room clean or clean-up after meals?						
28. Do you use neighborhood stores and services (For example: Grocery stores and pharmacy stores)?						
29. Do you use community support services (For example: After school programs) or advocacy services (For example: Legal services) when you need them?						

2008-2009 TRAQ-3.0 Summary
By Patients' Responses and Stage of Change (SOC)

** 5-Point Scale in TRAQ-3.0 Version (versus 6-Point Scale in new TRAQ-4.1)*

	Number Patients (N)	Overall SOC (Mean)	Stage of Change
Skills for Chronic Condition Self-Management	**126**	**3.21**	**Preparation**
1. Do you fill a prescription if you need to?	130	4.34	Action
2. Do you know what to do if you are having a bad reaction to your medications?	126	4.00	Action
3. Do you pay or arrange payments for your medications?	126	4.03	Action
4. Do you take medications correctly and on your own?	120	3.97	Preparation
5. Do you reorder medications before they run out?	128	3.86	Preparation
6. Do you take care of your medical equipment and supplies?	89	4.22	Action
7. Do you call the suppliers when there is a problem with the equipment?	125	3.85	Preparation
8. Do you order medical equipment before they run out?	122	3.87	Preparation
9. Do you arrange payment for the medical equipment and supplies?	128	3.81	Preparation
10. Do you call the doctor's office to make an appointment?	123	3.60	Preparation
11. Do you follow-up on any referral for tests or check-ups or labs?	107	3.42	Preparation
12. Do you arrange for your ride to medical appointments?	123	3.22	Preparation
13. Do you call the doctor about unusual changes in your health (For example: Allergic reactions)?	79	3.75	Preparation
14. Do you apply for health insurance if you lose your current coverage?	83	3.64	Preparation
15. Do you know what your health insurance covers?	108	2.94	Contemplation
16. Do you manage your money & budget household expenses (For example: use checking/debit card)?	74	3.38	Preparation

Skills for Self-Determination and Health Care Utilization	**126**	**3.65**	**Preparation**
17. Do you fill out the medical history form, including a list of your allergies?	131	4.55	Action
18. Do you keep a calendar or list of medical and other appointments?	132	4.39	Action
19. Do you tell the doctor or nurse what you are feeling?	129	4.41	Action
20. Do you answer questions that are asked by the doctor, nurse or clinic staff?	129	4.40	Action
21. Do you ask questions of the doctor, nurse or clinic staff (For example: What medications or treatments are best for you)?	131	4.27	Action
22. Do you make a list of questions before the doctor's visit?	133	4.25	Action
23. Do you request and get the accommodations & support you need at school or work?	122	3.84	Preparation
24. Do you apply for a job or work or vocational services?	129	3.87	Preparation
25. Do you get financial help with school or work	105	3.81	Preparation
26. Do you help plan or prepare meals/food?	112	3.57	Preparation
27. Do you keep home/room clean or clean-up after meals?	100	3.48	Preparation
28. Do you use neighborhood stores and services (For example: Grocery stores/pharmacy stores)?	107	3.15	Preparation
29. Do you use community support services (For example: After school programs) or advocacy services (For example: Legal services) when you need them?	125	3.38	Preparation

The response categories of the transition readiness tool represent each of the five Stages of Change model:

Stages of Change Model		
Stage	**Definition**	**Survey Response Categories**
Precontemplation	Has no intention of taking action within the next 6 months	I do not need to do this
Contemplation	Intends to take action in the next 6 months	I do not know how but want to learn
Preparation	Intends to take action within 30 days and has taken some steps in this direction	I am learning to do this
Action	Has changed behavior for less than 6 months	I have started doing this
Maintenance	Has changed behavior for more than 6 months	I always do this when I need to

Appendix 3: Patient Satisfaction Survey

Today's Date_____ Male_____ Female_____ Age _____

Thank you for choosing *Jax*HATS for your transition services. We are committed to provide you with the best care possible while you are here. To assure that we are providing the best services, we ask that you take a few moments to complete this survey about the intake process and return it to a JaxHATS staff member before you leave today.

P*lease rate each item listed below by circling the number that best reflects your assessment. If you have an additional opinion or suggestion, please write on the back of this sheet.*

	Strongly Agree	**Agree**	**Neither Agree nor Disagree or N/A**	**Disagree**	**Strongly Disagree**
1. The history forms sent to you were easy to fill out.					
2. The first clinic appointment was offered in a reasonable amount of time.					
3. Appointments were *not* available at times that fit your schedule.					
4. The Clinic's location was easily accessible to you /your family.					
5. You were taken to the examination room in a reasonable amount of time.					
6. You were comfortable with the doctor(s) and professional staff providing your care.					
7. The JaxHATS physicians and professional staff spent as much time with you as you thought was necessary.					
8. The doctor and professional staff did not explain clinical findings, care plan and follow-up recommendations in a way you could understand.					
9. The doctor(s) or professional staff offered you choices about your health care.					
10. The doctor(s) or professional staff discussed the good and bad things about each of the different choices you were given.					
11. The doctor(s) or professional staff did not involve you in making choices about your health care as much as you wanted.					
12. The doctor(s) or professional staff involved your family (primary caregiver) in making choices about your health care as much as you wanted.					
13. The information you received about financial arrangements was easy to understand.					
14. The office staff treated you with courtesy and respect.					
15. The office staff was as helpful as you thought they should have been on your first visit to the clinic.					
16. You would recommend JaxHATS to other youth and families in need of services.					

2008-2009 Patients' Responses to Satisfaction Survey

	Percent	Average	SD
Age (16-26 years)		19.33	1.490
Gender			
Female	62.2		
Male	37.8		
1) The history forms sent to you were easy to fill out.			
		3.91	1.310
1 = Strongly Disagree	9.1		
2 = Disagree	9.1		
3 = Neither Agree nor disagree or N/A	6.8		
4 = Agree	31.8		
5 = Strongly Agree	43.2		
2) First clinic appointment was offered in a reasonable amount of time.			
		3.78	1.43
1 = Strongly Disagree	11.1		
2 = Disagree	11.1		
3 = Neither Agree nor disagree or N/A	13.3		
4 = Agree	17.8		
5 = Strongly Agree	46.7		
3) Appointments were NOT available at times that fit your schedule.			
		2.84	1.51
1 = Strongly Disagree	25.6		
2 = Disagree	23.3		
3 = Neither Agree nor disagree or N/A	14.0		
4 = Agree	16.3		
5 = Strongly Agree	20.9		

4) The Clinic's location was easily accessible to you/your family?			
		4.02	1.37
1 = Strongly Disagree	11.1		
2 = Disagree	6.7		
3 = Neither Agree nor disagree or N/A	4.4		
4 = Agree	24.4		
5 = Strongly Agree	53.3		
5) You were taken to the examination room within 15 minutes of your appointment?			
		3.82	1.39
1 = Strongly Disagree	11.4		
2 = Disagree	9.1		
3 = Neither Agree nor disagree or N/A	9.1		
4 = Agree	27.3		
5 = Strongly Agree	43.2		
6) You were comfortable with the doctor(s) and professional staff providing your care?			
		4.20	1.44
1 = Strongly Disagree	11.4		
2 = Disagree	6.8		
3 = Neither Agree nor disagree or N/A	4.5		
4 = Agree	4.5		
5 = Strongly Agree	72.7		
7) The JaxHATS physicians and professional staff spent as much time with you as you thought was necessary?			
		4.31	1.33
1 = Strongly Disagree	8.9		
2 = Disagree	6.7		
3 = Neither Agree nor disagree or N/A	2.2		
4 = Agree	8.9		
5 = Strongly Agree	73.3		

8) The doctor and professional staff did NOT explain clinical findings, care plan and follow-up recommendations in a way you could understand.			
		2.50	1.52
1 = Strongly Disagree	31.8		
2 = Disagree	34.1		
3 = Neither Agree nor disagree or N/A	6.8		
4 = Agree	6.8		
5 = Strongly Agree	20.5		
9) The doctor(s) or professional staff offered you choices about your health care.			
		3.93	1.33
1 = Strongly Disagree	9.5		
2 = Disagree	7.1		
3 = Neither Agree nor disagree or N/A	11.9		
4 = Agree	23.8		
5 = Strongly Agree	47.6		
10) The doctor(s) or professional staff discussed the good and bad things about each of the different choices you were given.			
		3.91	1.33
1 = Strongly Disagree	11.1		
2 = Disagree	4.4		
3 = Neither Agree nor disagree or N/A	11.1		
4 = Agree	28.9		
5 = Strongly Agree	44.4		
11) The doctor(s) or professional staff did NOT involve you in making choices about your health care as much as you wanted.			
		2.68	1.61
1 = Strongly Disagree	36.4		
2 = Disagree	15.9		
3 = Neither Agree nor disagree or N/A	13.6		
4 = Agree	11.4		
5 = Strongly Agree	22.7		

12) The doctor(s) or professional staff involved your family or your primary caregiver in making choices about your health care as much as you wanted.			
		3.91	1.46
1 = Strongly Disagree	13.6		
2 = Disagree	6.8		
3 = Neither Agree nor disagree or N/A	6.8		
4 = Agree	20.5		
5 = Strongly Agree	52.3		
13) The information you received about financial arrangements was easy to understand.			
		3.75	1.38
1 = Strongly Disagree	13.6		
2 = Disagree	2.3		
3 = Neither Agree nor disagree or N/A	20.5		
4 = Agree	22.7		
5 = Strongly Agree	40.9		
14) The office staff treated you with the courtesy and respect.			
		4.16	1.36
1 = Strongly Disagree	11.4		
2 = Disagree	2.3		
3 = Neither Agree nor disagree or N/A	9.1		
4 = Agree	13.6		
5 = Strongly Agree	63.6		
15) The office staff was as helpful as you thought they should have been on your first visit to the clinic.			
		4.07	1.50
1 = Strongly Disagree	15.6		
2 = Disagree	2.2		
3 = Neither Agree nor disagree or N/A	6.7		
4 = Agree	11.1		
5 = Strongly Agree	64.4		

16) You would recommend JaxHATS to other youth and families in need or services.			
		4.16	1.46
1 = Strongly Disagree	13.3		
2 = Disagree	4.4		
3 = Neither Agree nor disagree or N/A	4.4		
4 = Agree	8.9		
5 = Strongly Agree	68.9		

Appendix 4: Program Planning Tools

Program Overview

Components	Description
Quality of Life – Health/Social Issues	Youth and young adults with disabilities or chronic health conditions aspire to be productive, employed, and self-sufficient. They want the same things in life that those w/out disabilities want (e.g., marriage, children, their own home, a fulfilling job), but their disease or health condition may present barriers to achieving those goals.
Organization Vision, Mission, Goals	**Mission:** To be a model of excellence in supporting the continuum of care for youth with disabilities or special health care needs as they transition to adulthood. **Vision:** All youth with disabilities or special health care needs will successfully transition to all aspects of adult life, including adult health care, work, and independence. **Goals:** 1) Provide age-appropriate primary care in a comprehensive medical home, 2) Promote independence in disease self-management, 3) Support access to adult-based health care services
Brief Summary of Program Objectives	**Medical home objectives** include reducing episodes of disease complications, ER visits, and hospitalizations, as well as increasing patient satisfaction with services. **Self-care objectives** include patient acquisition of skills such as taking own medicine, talking to physicians independently, recognizing atypical symptoms, arranging medical appointments and transportation, etc. **Objectives for transition to adult services** include increasing # of service referrals; # of patients who have a transition plan (documented); # of patients 18+ who have adequate health insurance coverage; # of completed patient transfers of care to adult health care providers.
Brief Summary of Community, Institution, Individual Assessment	**Community:** Florida ranks below the national average in transition preparation measures, as reported in the *2005-2006 National Survey of Children with Special Health Care Needs*. A community-wide strategic planning activity would further identify specific transition-related needs, strengths, and service gaps. **Program and patient level assessment:** Indicators such as # patients, patient satisfaction, transition readiness (using a validated tool called TRAQ), #ER visits, hospitalizations, disease complications, etc. show relatively good performance to-date, but there is considerable opportunity for growth &improvement.
Brief Description of Program Services	JaxHATS provides primary medical care to address the young person's immediate medical needs, and helps transition them to appropriate primary care providers and specialists in the adult health care system. The JaxHATS team also works with youth over time, to help them gain the knowledge and skills they need to achieve their long term life goals, such as independent living or employment.

Objective:

By the end of 2011, 90% of patients will report satisfaction with the services they receive from *Jax*HATS, as measured by a response of "agree" or "strongly agree" on all satisfaction survey items (average score 4.0 or higher).

Question	Response
What are the key activities required to achieve this objective?	The overall objective is to increase patient satisfaction with services. This will require CQI activities such as staff training (scheduling appointments/reminders, responding to patient questions, cultural/language competence), developing multi-language and accessible education materials, and modifying scheduling guidelines for office visits.
When expected to be accomplished?	By end of 2011
What evidence do you need to show that each of these activities has been successfully implemented?	Evidence includes number of staff trained, types of training, and number of sessions; number and types of materials produced and disseminated; and implementation of revised scheduling guidelines.
What indicator(s) will you use to show your progress toward this service goal?	Patients will self report that they "strongly agree" or "agree" with satisfaction indicators such as office accessibility, provider communication, short wait time, engagement in health care decision-making, adequate time with the physician, and easy appointment scheduling.
What sources of information will you use?	Satisfaction questionnaire conducted with patients and their families; feedback from JaxHATS staff
Will you use existing data or develop new sources?	An existing 16-item patient questionnaire will be reviewed and modified to ensure that all medical home indicators are included. In addition, a mechanism or instrument will be developed to capture observations from staff.
What methods will you use to collect the information?	Patient/family questionnaire and staff observation
Who will be responsible for developing the data collection tools/procedures? collecting the data? data entry? managing the data?	The Transition Specialist will have primary responsibility for this activity. He/she will collaborate with the Co-Directors and ARNP to revise the patient questionnaire and develop the staff observation tool; will oversee a social worker who administers the questionnaire and an AA who enters the data; and will analyze and interpret the data.

Patient Satisfaction

Operationalizing Concepts

Intent	Observation		Standard	Judgment
Improve patient satisfaction with medical home services	Identified medical home components that need improvement	**Antecedents**	Patient satisfaction questionnaire	JaxHATS management assesses results
JaxHATS develops policies that support access to staff 24/7; short waiting time; adequate face time with doctors; care coordination and referrals, as needed.	JaxHATS provides resources to restructure its scheduling protocol and to offer email communication to patients.	**Transactions**	JaxHATS administrators review policies	JaxHATS management approves changes in policies
Patients report high degree of satisfaction with JaxHATS	Feedback from patients helps to refine policy development over 1 year.	**Outcomes**	Patient satisfaction questionnaire indicates high satisfaction scores.	JaxHATS management decides to re-assess policies every year.

Multi-Level Planning Matrix

	COMMUNITY	INSTITUTIONS	CONSUMER
ENABLING	Good public transportation system Adult health care providers who serve people with disabilities Safety net insurance program for adults with disabilities or chronic health conditions	Extended length of office visit Bilingual staff; translation service Disability-accessible equipment and materials	Ability to communicate with physician Shows up for appointments No substance abuse Insurance coverage
REINFORCING	PSAs that de-stigmatize disability Peer spokesperson Availability of social support groups/networks	Patient satisfaction with services Support from parent organization Recognition of patient accomplishments (awards program)	Support from family and friends Support from school and other service providers
PREDISPOSING	Social Capital Providers who are knowledgeable about health care transition	Highly qualified and trained staff Continuing education/training opportunities for staff	Belief that he/she has some control over health status Positive self image Confidence in ability for self-care

Objective:

By end of 2011, the incidence of reported disease complications, ER visits, and hospitalizations among *Jax*HATS patients will be reduced by 5%.

	Evaluation Measures					
Level	**Target Group**	**Indicator**	**Base-line**	**% Change**	**Time Frame**	**By Whom**
Outcome: Reduce incidence of disease complications among patients	Youth and young adults ages 16-26	Number of episodes of disease complications	Self-report; Patient records (30%)	5%	1 year	JaxHATS patients
Impact: - Reduce number of ER visits, hospitalizations, and missed appointments - Increase patient knowledge and skills	Youth and young adults ages 16-26	-Number of ER visits, missed appointments, hospitalizations -TRAQ scores	Self-report; Patient records; explore securing clinical data	5%	1 year	JaxHATS patients
Output: -Increased number and length of contacts with patients	JaxHATS clinical staff	Number and length of contacts per patient	Clinical data	20%	1 year	JaxHATS clinical staff
Input: - Hire social worker - Train staff to educate patients on disease self-management - Train staff to correctly schedule appts/reminders	JaxHATs management	- Staff hired - Number of staff trained	Program records	100%	1 year	JaxHATS administrators
Structure: - Reorganize patient time slots for office visits - Develop appointment reminder protocol	JaxHATS management	Activities completed	Program Records	100%	1 year	JaxHATS administrators

Goal:

Promote disease self-management, independent living, and inclusive participation in the community

PLANNING ELEMENTS	INDICATORS	MEANS OF VERIFICATION	ASSUMPTIONS
GOAL	Promote disease self-management	Reduced complications, ER visits, and hospitalizations	-Patients vary in their ability for self-care -Staff are trained
OBJECTIVE	By end of 2011, the incidence of reported disease complications, ER visits, and hospitalizations among JaxHATS patients will be reduced by 5%.	- Patient interview and questionnaire (TRAQ*) - Parent interview - Medical examination	TRAQ is administered correctly Patients and parents are truthful and accurate in their reports
EXPECTED RESULT	Patients will be more self-sufficient in managing their own health care.	Improved TRAQ scores	Patients are truthful and accurate in answering TRAQ questions.
PRODUCTS	Patients with well-managed disease/health conditions	- Number of patients who have well-managed conditions - Number of ER visits, hospitalizations	Patient, family, and staff understand importance of medication compliance in managing disease.
ACTIVITIES	- Education sessions/ contacts with patients - Patient/Parent monitors usage at home - Midcourse review w/staff	-Number of education sessions/contacts - Number of participants	-Parents are willing to monitor patient compliance at home - Staff are trained
COMPONENTS	- Pill Box - Medication tracking form	Review of medication tracking form	Resources and materials are available

Goal:

Support access to adult-based health care and other needed services

	Objectively Verifiable Indicators	Means of Verification	Assumptions
Goal	Support access to adult-based health care and other needed services	Patient self-report; explore securing patient records under research protocol	There are not an adequate number of adult providers who are qualified and willing to serve people with disabilities
Purposes	Transition to adult-based providers facilitates provision of age appropriate health care.	Medical literature	Pediatric providers are not trained to provide health care for individuals 18+
Inputs	- Train staff about available adult PCPs, specialists, and other community services/programs - Resources to educate adult providers about childhood onset conditions - Train staff to educate patients about the adult health care system - Resources to develop a regional health care transition coalition of providers	-Number of participants in Coalition - Number of staff trained - Number and type of training in the community	- A regional coalition will help facilitate communication and coordination between providers - Adult providers are willing to participate in a coalition and learn about the issues.
Outputs	-Staff makes appropriate referrals to adult providers and other services, as needed - Staff develops transition policy and posts it in the patient waiting area	- Number of referrals - Number of completed transfers of care	Staff keeps updated, accurate information about community resources

Linking surveillance components to program objectives

Objective	Surveillance Component
By end of 2011, the incidence of disease complications among *Jax*HATS patients will be reduced by 5%.	Patient records, patient self-report (number of ER visits and hospitalizations) Explore securing patient records through research protocol
By end of 2011, 90% of patients will report satisfaction with the services they receive from *Jax*HATS.	Patient satisfaction survey (respond "agree" or "strongly agree" to survey items; average score 4.0 or higher)
By end of 2011, 85% of *Jax*HATS patients will have completed a transition plan.	Patient records (number of transition plans)

Useful employee services for *Jax*HATS

Employee Services	
Service	**Rationale**
Work/Life Services	Employees are happier, more satisfied, and more likely to be productive if they have a balance between work and family life. This could include flex time options, which would not impact the program budget significantly.
Stress Management	Stress is a factor to consider for staff who work with children with chronic conditions and their families. It is important to prevent employee burnout and manage compassion fatigue by helping them develop a range of coping strategies and build a strong support system. This could be done through one-on-one sessions or small group discussions facilitated by a trained counselor.
Individual Coaching	Individual coaching can be a motivational factor as well as a skill building activity for managers. It reflects both the value that is placed on the contributions of staff as well as the organization's commitment to facilitating professional growth among its employees.
Job Description to Skills Linkage	It is important for staff to clearly understand their role in the organization and the qualifications/skills that are needed to perform their responsibilities. It minimizes ambiguity and miscommunication between staff and management, and provides a stronger foundation from which to assess employee performance.

Appendix 5: County-Level Prevalence Data

Population Estimates

Prevalence of Disabilities and Demographic Characteristics

Health Services Manpower

Population Estimates

Table 1

General Population Estimates, 2009				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	1,801.00	1,129.00	727.00	1,935.00
Clay	14,370.00	9,479.00	5,109.00	11,931.00
Duval	59,183.00	37,431.00	24,264.00	67,715.00
Nassau	4,574.00	3,210.00	1,627.00	4,297.00
St. Johns	12,025.00	7,463.00	4,532.00	11,402.00

Table 2

Female Population by County, 2009				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	895	486	339	784
Clay	7,038	4,693	2,417	5,807
Duval	7,038	18,321	11,976	32,898
Nassau	2,244	1,584	765	2,100
St. Johns	5,871	3,569	2,283	5,588

Table 3

Male Population by County, 2009				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	906	643	388	1,151
Clay	7,332	4,786	2,692	6,124
Duval	7,332	19,110	12,288	34,817
Nassau	2,330	1,626	862	2,197
St. Johns	6,154	3,894	2,249	5,814

Household Size

Table 4

Number of Households and Average Household Size, 2007		
County	**Number of Households**	**Average Household Size**
Baker	8,191	2.83
Clay	66,957	2.73
Duval	350,908	2.51
Nassau	27,229	2.53
St. Johns	70,525	2.42

Table 5

Population by Race and Age Group, 2009				
White				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	1,608	938	938	1,441
Clay	12,147	8,111	8,111	10,305
Duval	12,147	19,811	19,811	40,078
Nassau	4,134	2,890	2,890	3,838
St. Johns	10996	6740	6740	10,359
Black				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	179	177	130	459
Clay	1,580	973	545	1,155
Duval	1,580	15,546	9,429	24,370
Nassau	383	279	148	399
St. Johns	829	584	339	843
Other Non-White				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	14	14	11	35
Clay	643	395	222	471
Duval	643	2,074	1,267	3,267
Nassau	57	41	22	60
St. Johns	200	139	80	200
Hispanic				
County	**Age 10-14**	**Age 15-17**	**Age 18-19**	**Age 20-24**
Baker	40	40	40	93
Clay	1,191	830	483	1,103
Duval	1,191	2,747	1,997	4,945
Nassau	161	127	57	181
St. Johns	722	501	210	499

Linguistically Isolated Households

Table 6

Number of Households Linguistically Isolated by Language Group, 2000				
County	**Isolated Spanish Speakers**	**Isolated Other Indo-European Language**	**Isolated Asian and Pacific Island Languages**	**Isolated Other Languages**
Baker	15	6	8	0
Clay	149	110	118	17
Duval	1,884	1,728	1,345	393
Nassau	35	11	10	0
St. Johns	157	211	52	14

Prevalence of Disabilities and Demographic Characteristics

Types of Disability

Table 7

Type of Disability by Gender and Age, 2006										
County	**Any Disability**		**Sensory Disabilities**		**Physical Disabilities**		**Mental Disabilities**		**Self Care Disability**	
	Male	**Female**	**Male**	**Female**	**Male**	**Female**	**Male**	**Female**	**Male**	**Female**
Baker										
Age 5-15	-	-	-	-	-	-	-	-	-	-
Age 16-20	-	-	-	-	-	-	-	-	-	-
Clay										
Age 5-15	1,686	366	298	65	174	50	1,431	301	71	39
Age 16-20	401	407	103	169	66	662	232	176	66	0
Duval										
Age 5-15	6,164	2,553	1,296	526	805	850	5,278	1,519	971	361
Age 16-20	1,857	1,045	269	181	318	280	1,614	884	90	108
Nassau										
Age 5-15	544	49	408	0	0	0	136	49	0	0
Age 16-20	768	0	316	0	0	0	546	0	0	0
St. Johns										
Age 5-15	859	395	118	148	107	158	702	298	147	61
Age 16-20	376	597	296	0	0	89	376	508	0	104

*No data provided for Baker County

Going out of Home and Employment Disability

Table 8

Going Out of Home and Employment Disability, ages 16-20, 2006				
County	**Going out of Home Disability**		**Employment Disability**	
	Male	**Female**	**Male**	**Female**
Baker	-	-	-	-
Clay	0	106	114	106
Duval	229	53	308	76
Nassau	262	0	168	0
St. Johns	0	197	0	321

*No data provided for Baker County

Poverty Level

Table 9

Disabled and Non-Disabled Population, Income below Poverty Level Past 12 Months, 2006								
County	**% Disabled Males Below Poverty**		**% Non-Disabled Males Below Poverty**		**% Disabled Females Below Poverty**		**% Non-Disabled Females Below Poverty**	
	Age 5-15	Age 16-20	Age 5-15	Age 16-20	Age 5-15	Age 16-20	Age 5-15	Age 16-20
Baker	-	-	-	-	-	-	-	-
Clay	27	12	5	7	0	17	10	7
Duval	27	21	22	19	25	10	16	17
Nassau	0	12	22	37	0	0	20	4
St. Johns	54	27	5	10	0	15	16	14

*No data provided for Baker County

Educational Attainment – Disabled and Non-Disabled Individuals

Table 10-1

Educational Attainment of Disabled Individuals Ages 18-36, 2006													
County	# Disabled 18-36 Years	Enrolled in School				Not in School							
		Below College		College or Graduate School		Less than High School		High School Graduate/GED		Some College or Associate's		Bachelor's or Higher	
		#	%	#	%	#	%	#	%	#	%	#	%
Baker	-	-	-	-	-	-	-	-	-	-	-	-	-
Clay	2,860	148	5	439	15	369	13	893	31	694	24	317	11
Duval	13,208	451	3	2,094	16	2,864	22	4,890	37	2,317	18	592	4
Nassau	1,775	262	15	169	10	508	29	836	47	0	0	0	0
St. Johns	1,456	328	23	605	42	0	0	268	18	125	9	130	9

*No data provided for Baker County

Table 10-2

Educational Attainment of Non-Disabled Individuals Ages 18-36, 2006													
County	# Non-Disabled 18-36 Years	Enrolled in School				Not in School							
		Below College		College or Graduate School		Less than High School		High School Graduate/GED		Some College or Associate's		Bachelor's or Higher	
		#	%	#	%	#	%	#	%	#	%	#	%
Baker	-	-	-	-	-	-	-	-	-	-	-	-	-
Clay	36,435	2,307	6	7,811	21	2,775	8	11,547	32	7,770	21	4,225	12
Duval	163,667	5,461	3	33,768	21	15,949	10	51,053	31	32,658	20	24,778	15
Nassau	11,705	1,251	11	1,435	12	292	2	4,347	37	2,968	25	1,412	12
St. Johns	34,442	1,174	3	9,162	27	2,314	7	9,998	29	5,621	16	6,173	18

*No data provided for Baker County

Children in Out-of-Home Care – Number and Type of Diagnosis

Table 11

Children Age 14-17 in Out-of Home Care, Number with Clinical Diagnosis and Type of Diagnosis, FY 2008-09							
County	Total Children in Out-of-Home Care Age 14-17	Out-of-Home Care Age 14-17 with Clinical Diagnosis	Type of Clinical Diagnosis				
			Mentally Retarded	Visual or Hearing Impaired	Physical Disability	Emotional Disability	Other Medically Diagnosed Condition
Baker	7	2	1	1	1	2	2
Clay	78	13	1	1	2	9	10
Duval	479	49	9	6	6	35	14
Nassau	24	15	4	3	1	9	9
St. Johns	104	9	0	0	0	6	4

Children's Medical Service Clients – By Age and Gender

Table 12

Children's Medical Service Clients by Age and Gender, As of October 19, 2009						
County	Total Age 14-21	Age		Gender		Total CMS Clients
		14-17	18-21	Male	Female	
Baker	30	15	15	19	11	95
Clay	229	159	70	120	107	729
Duval	1,121	793	328	591	526	4,116
Nassau	69	48	21	43	26	235
St. Johns	107	68	39	63	44	401

SSI Enrollment

Table 13

SSI Enrollment by Race, Ethnicity and Sex, 2009														
	Ages 14-17													
County	White		Black		American Indian		Asian		Hispanic		Other		Unknown	
	M	F	M	F	M	F	M	F	M	F	M	F	M	F
Baker	4	1	5	2	0	0	0	0	0	0	0	0	5	10
Clay	13	6	16	6	0	0	2	0	6	3	0	0	73	31
Duval	72	40	362	192	1	0	2	3	24	9	1	0	427	252
Nassau	7	2	3	3	0	0	0	0	0	1	0	0	15	12
St. Johns	14	9	13	8	0	0	1	0	3	1	0	0	45	25
	Ages 18-26													
Baker	23	16	7	4	0	0	0	0	1	0	0	0	15	8
Clay	91	71	36	22	0	1	6	1	7	3	0	0	55	29
Duval	324	286	592	477	3	0	20	8	43	35	0	0	395	224
Nassau	30	22	13	7	0	0	1	0	0	1	0	0	26	12
St. Johns	86	56	37	24	0	1	2	4	14	5	1	0	42	22

Mental Health Services to Non-Medicaid Enrollees

Table 14

Mental Health Services Provided by Department of Children and Family Services to Non-Medicaid Population, FY 2008-09										
County	Age 14-17	Age 18-26	White	Black	American Indian	Asian	Native American or Pacific Islander	Multi-Racial	Sex	
									Male	Female
Baker	22	2	23	1	0	0	0	0	10	14
Clay	216	26	177	40	3	2	3	13	128	114
Duval	1,680	122	864	777	3	13	30	80	987	817
Nassau	119	17	125	11	0	0	0	0	78	58
St. Johns	146	15	133	15	0	4	1	8	45	38

Most Common Mental Health Disorders

Table 15

Top Six Mental Health Disorders by Age, 2009												
County	**Anxiety (Children and Adults)**		**Attention Deficit**		**Bipolar**		**Conduct**		**Other Childhood Disorder**		**Other Non-Psychotic Mental Disorder**	
	14-17	**18-26**	**14-17**	**18-26**	**14-17**	**18-26**	**14-17**	**18-26**	**14-17**	**18-26**	**14-17**	**18-26**
Baker	4	0	3	0	0	0	0	0	0	3	1	0
Clay	23	2	67	10	20	1	0	8	45	8	8	2
Duval	130	15	277	115	171	6	5	23	324	29	214	12
Nassau	9	1	40	5	9	3	0	3	32	9	0	0
St. Johns	15	0	31	4	8	2	0	2	42	8	6	2

Number of Students with Disabilities and Percent in Support Level 4 or 5

Table 16

Number of Students Age 14 and Older With a Disability and Percent of Students with Disabilities Reported In Support Level 4 or 5, as of October 2008		
County	**# Students with Disabilities Age 14+**	**% of Students with Disabilities Reported in Support Level 4 or 5**
Baker	189	4.18
Clay	2,200	5.41
Duval	5,548	6.95
Nassau	551	4.39
St. Johns	1,343	6.36

Health Services Manpower

Medical Doctors and Osteopaths

Table 17

Number of Medical Doctors and Doctors of Osteopathic Medicine, Rate per 100,000 Population, FY 2008-09				
County	**MD**	**DO**	**Totals**	**Combined Rate per 100,000**
Baker	1	0	1	3.9
Clay	197	26	223	119.9
Duval	1008	62	1070	118.8
Nassau	37	6	43	61.7
St. Johns	604	11	615	350.4

Number of Doctors by Specialty

Table 18

Doctors by Specialty, 2007 [Number, (Rate per 100,000)]				
County	**Family Practice**	**Internist**	**OB/GYN**	**Pediatrician**
Baker	7 (27.2)	1 (3.9)	0 (0)	2 (7.8)
Clay	29 (15.6)	39 (21)	9 (4.8)	20 (10.8)
Duval	212 (23.5)	449 (49.9)	1,010 (112.1)	215 (23.9)
Nassau	13 (18.6)	8 (11.5)	3 (4.3)	6 (8.6)
St. Johns	34 (19.4)	62 (35.3)	10 (5.7)	27 (15.4)

Physician's Assistants and Nurse Practitioners

Table 19

Number of Physician Assistants and Advanced Registered Nurse Practitioners and Combined Rate per 100,000 Population, FY 2008-09				
County	**PA**	**ARNP**	**Totals**	**Combined Rate per 100,000**
Baker	0	2	2	7.8
Clay	40	38	78	41.9
Duval	123	144	267	29.6
Nassau	8	11	19	27.2
St. Johns	38	50	88	50.1

Mental Health Professionals

Table 20

Number of Mental Health Professionals and Combined Rate per 100,000 Population, FY 2008-09						
County	**Psychologist**	**Marriage and Family Therapist**	**Licensed Mental Health Counselor**	**Licensed Clinical Social Worker**	**All Mental Health Professionals**	**Combined Rate per 100,000**
Baker	10	2	16	8	36	140.1
Clay	25	11	96	67	199	107.0
Duval	179	93	512	404	1188	131.9
Nassau	6	4	23	18	51	73.1
St. Johns	64	29	146	129	368	209.7

Registered Nurses and Licensed Practical Nurses

Table 21

Number of Registered Nurses and Licensed Practical Nurses and Combined Rate by 100,000 population, 2009				
County	**RN**	**LPN**	**Total**	**Combined Rate per 100,000**
Baker	398	196	594	2,312.0
Clay	3,810	1,111	4,921	2,645.5
Duval	15,662	4,294	19,956	2,215.8
Nassau	1,097	296	1,393	1,997.3
St. Johns	3,404	846	4,250	2,421.4

Dentists

Table 22

Number of Licensed Dentists and Rate per 100,000 Population, 2009		
County	**# of Dentists**	**Rate per 100,000**
Baker	7	27.0
Clay	100	54.0
Duval	429	47.4
Nassau	20	27.7
St. Johns	98	53.8