**Category 2 Project Narrative**

**Central Counties Services – 081771001.2.1**

**Project Area, Option and Title:** 2.2.2 Apply evidenced-based care management model to patients identified as having high-risk care needs

**RHP Project Identification Number**: 081771001.2.1

**Performing Provider Name:** Central Counties Services

**Performing Provider TPI #:** 081771001

**Project Summary:**

* **Provider Description:** Central Counties Services (Center) is an agency of the state providing publicly-funded adult/ child mental health, intellectual and developmental disability (IDD), and early childhood intervention services for 3 RHP 8 Counties (Bell, Lampasas, Milam = 2,789 square miles/352,218 population) and 2 RHP 16 Counties (Coryell, Hamilton = 1,8878 square miles/91,250 population). The Center, as the Single Portal Authority, authorizes state psychiatric hospital and IDD state living Center admissions. In FY2012, we helped 8,000 people with 240,000+ units of service. The Texas Department of State Health Services (DSHS) deemed all Center clinics as serving Medically Underserved Populations (MUP).
* **Intervention:** This project provides education, training, and support by a registered nurse for persons with severe and persistent mental illness (SPMI) having chronic health conditions (hypertension, diabetes, weight gain, etc.) due to prolonged psychiatric medicine use. This project builds the patient’s ability/desire to improve their self-managing of chronic health condition(s), instead of stopping psychotropic medicine that helps their psychiatric symptoms. This project has both personal training sessions and support groups for patients trying to self-manage the same type of chronic health condition.
* **Project Status:** This project is a new service.
* **Project Need:** CN.3.1: Limited coordinated care exists in Bell County for disparity groups with co-occurring behavioral health needs and chronic physical conditions due to prolonged psychiatric medicine use. Studies show people with SPMI die 25 years earlier, on average, than non-mentally ill peers. Factors that lead to the early death of people with SPMI include negative effects caused by medication needed to treat their mental illness (*Morbidity and Mortality in People with Serious Mental Illness.* <http://usatoday30.usatoday.com/news/health/2007-05-03-mental-illness_N.htm>).
* **Target Population:** The prevalence of chronic conditions among our patients is not known at this time, but it is estimated to be around 10% of the patients served at our Killeen, Texas and Temple, Texas clinics, which would be about 140 patients. Actual number to be served is TBD in DY3*.* 97% of all of the Center’s patients are Medicaid (41.89%), uninsured or indigent. We anticipate the same percentages of Medicaid, uninsured and indigent patients will benefit from this project
* **Category 1 or 2 Expected Project Benefit for Patients:** Increase number SPMI patients with chronic condition self-management plans to 50 patients in DY3, 75 patients in DY4 and 100 patients in DY5 (Improvement Milestone I-18.1). We are expecting to provide these services for 100 patients in DY3, 150 patients in DY4, and 200 patients in DY5 under this project, thus the cumulative QPI for this project DY3-5 would be 450 patients served. (See **“Rationale”** paragraph below regarding shortened life expectancy of persons with severe and persistent mental illness).
* **Category 3 Outcome:** IT 1-11: Diabetes Care: BP Control (140/90 mm Hg)

As persons with SPMI taking psychotropic medications are at a high risk for exacerbating or developing chronic health conditions such as diabetes or hypertension, this measure looks at the percentage of patients 18-75 years of age with diabetes (type 1 and type 2) whose most recent blood pressure (BP) reading is, 140/90 mm Hg during the measurement year. The denominator is defined as patients 18-75 years of age by the end of the measurement year who had a diagnosis of diabetes (type 1 or type2) during the measurement year or the year prior to the measurement year. The numerator is defined as patients whose most recent BP reading is, 140/90 mm Hg during the measurement year. It is intended that we will establish a baseline following which we will improve over the established baseline by 5% in DY4. This will then allow for a 10% improvement over established baseline rate during DY5.

* **Collaboration:** Texas A&M Health Science Center (TAMHSC) had a Pass 1 allocation it could not use, since TAMHSC did not have providers in RHP 8. TAMHSC allowed its allocation to be used by local health departments and local mental health authorities (public entities) which had much smaller provider allocations in Pass 1, so these entities could have broader, transformative, regional projects. TAMHSC has not played a role in these projects, other than the role of anchor. There are no impermissible provider-related donations involved. This usage of the TAMHSC allocation ensured these providers, who could self-fund the required IGT, could participate in the waiver. There are several reasons why this project is truly a transformational project and they are: 1) this is the first project to bring physical medicine resources into our behavioral health service delivery system; 2) this is the Center’s first focused effort to address our patient’s physical health problems that are known to shorten the life expectancy of persons with SPMI; 3) providing assistance with managing the negative side effects of strong psychiatric medications needed by our patients is viewed as a strong means to reinforce medication compliance – a major problem with the people we serve; and, 4) this project strongly reinforces the recovery model of psychiatric services promoted by our Center by empowering our patients to take charge of, and master the control of their chronic health condition’s symptoms.

**Project Description:**

*Self-management of chronic conditions resulting from prolonged psychotropic/ antidepressant medication use by adults with severe and persistent mental illness*

The Center has as its priority to serve adults with severe and persistent mental illness in their own community. Antipsychotic and antidepressant medications have made it possible for severely mentally ill persons to reside in their own community as opposed to being held in the asylums of decades gone by. Antipsychotic and antidepressant medications are very strong medications that have a profound effect of being able to reduce many of the negative symptoms of these severe and persistent mental illnesses (Schizophrenia, Major Depressive Disorder, Bipolar Disorder, Schizoaffective, etc. disorders). These powerful and effective medications frequently induce one or more physical side-effects in persons who must take these medications over a prolonged period of time. These side-effects can result in chronic health conditions. Examples of some of these chronic health conditions are: hypertension, diabetes, obesity, nervous ticks, excessive dry mouth, distorted sense of balance, etc. This project is being undertaken to help our patients with severe and persistent mental illnesses understand how these side effects occur, how to monitor the severity of these side-effects, and how to prevent the chronic health conditions caused/aggravated by these powerful medicines from getting progressively worse, and more quality-of-life impairing.

Each patient participating in this project will be offered:

1. An assessment of the severity of their chronic health condition(s),
2. An explanation of how our bodies normally regulate these biological functions which become out of balance (written information in layman’s terms will be given),
3. What common self-help remedies are used to stabilize or reduce the level of these chronic health problems,
4. A mutually developed personal plan with attainable goals for improvement will be given to the patient, documented in the patient’s electronic health record, and self-management progress updated in the health record after each visit, and
5. Professional coaching/feedback on how their plan is going and how to improve the outcome of their plan.

Topics available to the patients will be:

1. Increased knowledge of importance of psychotropic or antidepressant medication compliance despite the potential side effects;
2. Increased knowledge of weight change side effects, strategies for weight loss, and information to manage these effects;
3. Increased knowledge of hypertensive side effects, consequences of long-term hypertension (stroke, MI), how to manage the condition, use of blood pressure measuring devices will be demonstrated, and importance of regular evaluation by a healthcare provider;
4. Increased knowledge of diabetes side effects, importance of management of blood sugars to decrease long-term effects of diabetes (cardiovascular, peripheral, eye, kidney), how to check and track blood sugars will be demonstrated, and the importance of regular evaluation by a healthcare provider; and
5. Increased knowledge about the negative health effects of excessive smoking and caffeine use.

The assessment of the patient’s chronic health condition level and subsequent follow-up contacts when levels are re-checked would be recorded in the patient’s health record, along with each person’s self-management plan to manage/improve his/her chronic health condition. Assistance will be given to our patients for their obtaining a blood pressure monitoring device, and/or glucose testing equipment and supplies. As patients become involved with these efforts to strengthen their ability to self-manage their chronic health conditions, we would envision starting focused support groups among our patients with similar chronic health conditions to encourage their mutually supporting each other in their endeavors to improve their health status (attendance rosters would be kept). It is our longer term goal that some of the patients who really learn how to manage their medication-induced/aggravated chronic health conditions well might become peer facilitators for new patients who are just being referred to this service. We have seen this model work very well with our patients around their acknowledgement and management of their severe and persistent mental illness.

**Goals and Relationship to Regional Goals:**

**Project Goal:**

The goal of this service is to help adult behavioral health patients learn how to stabilize or reduce their chronic health condition(s) caused/aggravated by their prolonged use of psychotropic/antidepressant medications such that their chronic health conditions do not pre-morbidly shorten the patient’s life expectancy or influence the patient to discontinue their psychotropic/antidepressant medications that have helped stabilize their severe and persistent mental illness symptoms.

**This Project meets the following Regional Goals:**

* Increasing coordination of prevention and care for residents, including those with behavioral or mental health needs; and
* Reducing inappropriate utilization of services.

**Challenges**:

* The patient's ability to grasp the instructional information due to their mental illness (disorganized thought patterns).
* The patient's lack of support system or encouragement to maintain healthy changes.
* Client's inability to retain information for extended length of time due to their mental illness.

This project will take these challenges into account as the nurse uses repetition of information with our patients, and reviews written materials as many times as necessary for patients to grasp the information being taught/shared. Our interaction with the patients will be transformed from educator to coach as we strive to help our patients put into practice the information they have learned about the management of their chronic health condition. We anticipate that within the first year of this project we will form chronic health condition specific support groups to assist and support our patients with the life-style changes often needed to successfully stabilize/reduce the severity of their chronic health condition.

**5 Year Expected Outcome:**

The severely and persistently mentally ill adults served by the Temple, TX and Killeen, TX clinics who are experiencing chronic health conditions as a result of prolonged psychotropic/ antidepressant medication use will be offered the opportunity to learn about their chronic health condition(s) and ways to manage/reduce its health impact. It is expected that those patients who effectively engage in this project for 3 or more months will make significant progress at being able to stabilize their chronic health condition and begin to reduce the severity of their chronic health condition. Those participants who are actively engaged in this project for 6 months or more should see a significant reduction in their chronic condition. While adults with severe and persistent mental illness often struggle with their sense of personal worth, improvement of their ability to proactively manage their chronic health condition should give them more sense of control over their life and personal health, thus benefiting their sense of personal worth and well-being. We envision patient support groups being formed among our patients who have similar chronic health conditions to encourage their persistence in managing the lifestyle changes often needed for successful management/reduction of these chronic health conditions. We also will work to groom the patients who achieve the most progress so that they can become peer mentors to new patients just entering the service.

**Starting Point/Baseline:**

This type of service has not been previously performed at the Center. Baseline ratings for the severity of medication induced/aggravated chronic health conditions are therefore not available for this project prior to DY2. As the Center patients are referred to this project, their chronic health condition severity will be evaluated and recorded as the patient’s individual baseline measurement.

**Rationale:**

**Community Need Addressed:**

* Community Need: CN.3 Lack of coordinated care for those with multiple needs
* Specific Community Need: C.N. 3.1 Limited coordinated care exists in Bell County for disparity groups having co-occurring behavioral health needs and chronic physical conditions resulting from prolonged use of psychotropic medications

Persons with severe and persistent mental illness have shorter life expectancy due to many factors. Studies have shown that people with severe and persistent mental illness die 25 years earlier, on average, than their non-mentally ill peers as shown in *Morbidity and Mortality in People with Serious Mental Illness* (authors: Joe Parks, MD, Dale Svendsen, MD, Patricia Singer, MD, Mary Ellen Foti, MD, (<http://usatoday30.usatoday.com/news/health/2007-05-03-mental-illness_N.htm>). Several factors that influence the premature death of people with severe and persistent mental illness include negative effects caused by the medications needed to control their mental illness. Some psychotropic medications can cause weight gain, diabetes, and hypertension. Education on these conditions and ways to manage the effects in a proactive manner can decrease the long-term negative effects of these conditions and increase life expectancy. This project will partner nursing staff from Health District and Center patients to increase patient education about these chronic side effects of psychotropic medications and increase their ability to self-manage these conditions successfully, thus increasing their potential longevity.

While mental disorders are common in the United States, their burden of illness is particularly concentrated among those who experience disability due to serious mental illness (SMI). The National Survey on Drug Use and Health (NSDUH), which defines SMI as:

• A mental, behavioral, or emotional disorder (excluding developmental and substance use disorders)

• Diagnosable currently or within the past year

• Of sufficient duration to meet diagnostic criteria specified within the 4th edition of the Diagnostic and Statistical Manual of Mental Disorders (DSM-IV)

• Resulting in serious functional impairment, which substantially interferes with or limits one or more major life activities

The Substance Abuse and Mental Health Services Administration (SAMHSA) examines the mental health treatment each year through the National Survey on Drug Use and Health (NSDUH). In 2008, 13.4% of adults in the United States received treatment for a mental health problem. This includes all adults who received care in inpatient or outpatient settings and/or used prescription medication for mental or emotional problems. SAMHSA’s NSDUH also found in 2008 that just over half (58.7%) of adults in the United States with a serious mental illness (SMI) received treatment for a mental health problem. Treatment for SMI differed across age groups. The most common types of treatment were outpatient services and prescription medication.

SAMHSA’s NSDUH further found in 2008 that 71% of adults who had major depression used mental health services and treatment to help with their disorder.

Education is essential to managing side effects encountered with any medication, and psychotropic medications are no exception. Behavioral or lifestyle changes are also important to improve chronic health conditions and the personal plan and goal setting involved with this project will help motivate and reinforce positive behavior change among our patients.

**Core Components:**

1. Continuous Quality Improvement: The Center is committed to continuous quality improvement and learning related to this project. We will establish quality improvement activities such as rapid cycle improvement and will perform other activities such as “lessons learned” and identifying project impacts. In addition, we are participating in a regional learning collaborative which shares information such as challenges, lessons learned, and considerations for safety net populations. The CQI efforts connected with this project will focus on improving the educational materials used with the patients, enhancing the recovery culture aspects of taking responsibility for self-improvement, and establishing social support networks to encourage the life-style changes needed to improve many chronic health conditions. The Center is committed to improvement of services and broad-level delivery system transformation. We are willing to participate in learning collaboratives with providers in RHP 8 to share successes, challenges, and lessons learned in order to better serve our target population and meet our community needs. Sharing this information at least on a yearly basis will allow providers to strengthen their partnerships and to continue providing services efficiently so there is maximum positive impact on the healthcare delivery system in RHP 8.

How the project represents a new initiative or significantly enhances an existing delivery system reform initiative: This project does not supplant any services or funds currently provided to the Center through the U.S. Department of Health and Human Services. The services proposed to be provided under this project serve to enhance, but not duplicate, the services provided by our Center to persons with severe and persistent behavioral health problems.

**Related Category 3 Outcome Measure(s):**

IT 1-11: Diabetes Care: BP Control (140/90 mm Hg)

As persons with SPMI taking psychotropic medications are at a high risk for exacerbating or developing chronic health conditions such as diabetes or hypertension, this measure looks at the percentage of patients 18-75 years of age with diabetes (type 1 and type 2) whose most recent blood pressure (BP) reading is, 140/90 mm Hg during the measurement year. The denominator is defined as patients 18-75 years of age by the end of the measurement year who had a diagnosis of diabetes (type 1 or type2) during the measurement year or the year prior to the measurement year. The numerator is defined as patients whose most recent BP reading is, 140/90 mm Hg during the measurement year. It is intended that we will establish a baseline following which we will improve over the established baseline by 5% in DY4. This will then allow for a 10% improvement over established baseline rate during DY5.

**Relationship to Other Projects:**

This project will attempt to empower clients to manage chronic conditions brought on by the long-term use of psychotropic medications. If clients can successfully manage their condition, there will be fewer ED visits from preventable sequelae, and less long-term complications of the chronic conditions. This project also relates to our desire to have improved patient involvement in their behavioral and personal health care, and the patient’s sense of satisfaction that our Center is trying to relate to them as a whole person whose general quality of life is of great importance to our Center and its staff (Temple Day Services Project #081771001.2.3). This project is one of our Center’s first attempts to bring more physical medicine into our behavioral health clinic environment. Our patients are fairly well motivated to come to our clinic for the care they receive, and if we can combine our behavioral health services with more general health services, we are expanding our patients’ experience of having a medical home.

Other Center projects include:

* 081771001.1.1 Establish more primary care clinics
* 081771001.1.2 Implement technology-assisted behavioral health services by psychologists, psychiatrists, and other qualified providers
* 081771001.1.4 Develop and implement crisis stabilization services to address the identified gaps in the current community
* 081771001.1.5 Enhance improvement capacity through technology
* 081771001.2.2 Implement innovative, evidence-based strategies to increase appropriate use of technology and testing for targeted populations
* 081771001.2.3 Design, implement, and evaluate research-supported and evidence-based interventions tailored towards individuals in the target population

**Relationship to Other Performing Providers’ projects and Plan for Learning Collaboratives:**

This project works with the Health Department, who is planning a Sexually Transmitted Disease testing and treatment project (#088334001.2.1) and one to work with women of child-bearing age (#088334001.2.2).

**Project Valuation:**

The valuation of this project takes into account the value of: 1) this is the first project to bring physical medicine resources into our behavioral health service delivery system; 2) this is the Center’s first focused effort to address our patient’s physical health problems that are known to shorten the life expectancy of persons with SPMI; 3) providing assistance with managing the negative side effects of strong psychiatric medications needed by our patients is viewed as a strong means to reinforce medication compliance – a major problem with the people we serve; and, 4) this project strongly reinforces the recovery model of psychiatric services promoted by our Center by empowering our patients to take charge of, and master the control of their chronic health condition’s symptoms. The valuation of the project also takes into consideration the salaries and fringe benefits of the nursing staff performing these services, the informational materials that will be used with patients, the equipment and consumable supplies to assist patients in monitoring their glucose levels and blood pressure levels, as well as the administrative overhead and indirect costs to run the project. The valuation of this project also takes into account the value of extended life expectancy (see Rationale section above) when chronic medical conditions are well managed. It is expected that this project will serve 200+ persons with severe and persistent mental illness per year and that at least half (100) of these individuals will be able to accomplish significant improvement in managing their chronic medical condition.

The valuation of this project also takes into account the quality of life gains and medical cost savings achieved by successful chronic health condition management. If such improvement in chronic health conditions could add 5-10 years to each patient’s life span, that would result in a net gain of 500 - 1,000 person years for each of the 3 full years of this project. The successful management of their chronic health conditions through these extra years of life would also reflect a significant health services cost savings by limiting or avoiding the more extreme health complications that come with the advanced stages of these chronic health conditions.