Promise of Partnership
St. Louis Community
University Health Research
Partnerships
Infant mortality. Poor eating habits. Childhood injury. Addiction relapse. How do we successfully impact serious health issues in our community?

Several universities and community groups in St. Louis have come together in an innovative partnership to help answer some of the most important health care questions we face. By working together as co-project directors in a joint research study, university researchers and community advocates believe they can find new ways to improve health outcomes, reduce health disparities and promote health.

BJC HealthCare, Saint Louis University and Washington University provided $1.5 million in research funding to be administered by the St. Louis Regional Health Commission through a program known as the St. Louis Community/University Health Research Partnerships. Starting in 2010, seven $100,000 grants were awarded to the most promising research proposals as determined by a two-tier review process that evaluated both scientific merit and community need. A second year of funding, up to an additional $100,000, may be provided to projects that demonstrate successful collaboration and the framework for producing important findings.

The overall goal of the partnership is to help identify innovative models of care that have the potential to improve the health of the community and to foster long-term relationships between academic researchers and community organizations.
BJC HealthCare is one of the largest nonprofit health care delivery organizations in the country, and is committed to improving the health and well-being of people and communities through leadership, education, innovation and excellence in medicine.

Saint Louis University’s mission is the pursuit of truth for the greater glory of God and for the service of humanity. The University seeks excellence in the fulfillment of its corporate purposes of teaching, research, health care and service to the community.

Washington University’s mission is the promotion of learning — learning by students and by faculty. Teaching, the transmission of knowledge, is central to our mission, as is research, the creation of new knowledge. Faculty serve society by teaching and by providing direct services, such as health care.

The St. Louis Regional Health Commission is a collaborative effort of St. Louis City, St. Louis County, the state of Missouri, health providers and community members to improve the health of uninsured and underinsured citizens in St. Louis City and County.

The St. Louis Community/University Health Research Partnerships are funded and administered by the following partners:
QUESTION:
How Can We Increase the Use of Mammography?

Although mammography use has increased dramatically in the past 20 years, some women remain inadequately screened for breast cancer. Women who have rarely or never received mammography account for approximately half of the women diagnosed with late-stage breast cancer. These underserved women also are disproportionately African American and low-income.

The reasons women are rarely or never screened for breast cancer appear more complex than the availability of services or financial means to seek care, also known as structural challenges. Programs exist to provide free screening, diagnostic services and treatment referrals for low-income, uninsured and underinsured women, with an emphasis on racial and ethnic minorities. While they have increased screening among low-income non-Hispanic whites, these programs have not been as effective at reaching other groups.

Evidence suggests that new strategies are needed to reach, identify and encourage mammography among women who are African American, low-income and rarely or never screened. These women have more cancer fear and are less knowledgeable about cancer and national cancer screening guidelines, which form behavioral barriers to receiving care. These behavioral barriers, as well as the structural challenges of access to care, may need to be addressed simultaneously to increase mammography screening.
Research Study: **Connecting Rarely/Never Screened Women to Mammography via Kiosks and Navigators**

The Community/University Health Research Partnership between Breakfast Club, Inc. and Washington University will evaluate a strategy for finding rarely and never screened African American women in community settings and linking them to local African American breast cancer survivors who will provide assistance in helping them obtain a mammogram. Touch-screen, interactive computer kiosks located where Food Stamps and Low Income Energy Assistance programs are offered will target women ages 40 or older. Through an on-screen assessment, the kiosks will collect information about respondents’ breast cancer knowledge and risks. In addition to providing customized educational messages, the kiosks will offer a photo selection of breast cancer survivors trained to provide personalized navigation and support. The selected “navigator” will follow up with women who are identified as needing a mammogram.

Expected outcomes include improvements in breast cancer knowledge and greater numbers of at-risk women referred to mammography who make and keep appointments. By identifying rarely and never screened women and removing behavioral and structural barriers that keep them from seeking screening, the researchers hope to better understand how to increase the use of mammography among this hard-to-reach population.

Founded in 1997, Breakfast Club, Inc. is an African American breast cancer support group committed to its mission of impacting the community through education, awareness, resources and support concerning breast health and breast cancer.
Access to healthful food and knowledge about healthful eating are important contributors to an individual’s health. There is increasing evidence that neighborhood inequity in the availability of healthful food contributes to health disparities in urban, low-income communities. These disparities are exacerbated by the lack of appreciation of the relationship between nutrient-rich foods, physical activity and disease risk. Individuals with limited access to healthful food are at greater risk for nutrition-related diseases such as obesity, diabetes, heart disease and cancer, while proximity to healthful food is associated with a lower prevalence of obesity.

Obesity and physical inactivity among children and adults have contributed to increases in Type 2 diabetes, hypertension and heart disease. According to the U.S. Centers for Disease Control and Prevention, 78 percent of high school students do not meet dietary guidelines for fruit and vegetable intake, while 80 percent do not meet national guidelines for physical activity. These statistics demonstrate the necessity of early intervention.

Programs that address the health of youth and engage school-aged children in creative ways are needed to help improve the long-term health of the St. Louis community. School- and community-based initiatives are consistent with the action plan recently developed by the Institute of Medicine of the National Academy of Sciences, which includes strategies to enhance access to healthful food in underserved neighborhoods.
Gateway Greening and Washington University have developed a new collaborative partnership that strengthens community relationships with St. Louis Public Schools and The Learning Tree Intergenerational Center.

The Community/University Health Research Partnership directly addresses the problem of lack of access to fresh vegetables and fruit in urban, low-income neighborhoods in St. Louis. The major aims are to develop, implement and evaluate hands-on gardening and nutrition programs for St. Louis youth, and to assess health behaviors, physical fitness and metabolic risk factors in St. Louis Public School students.

The study will enable an evaluation of the feasibility and impact of school-based gardening programs to provide urban children with greater access to and appreciation for fresh produce. Tangible outcomes of this partnership will include garden-based nutrition education curricula and a cookbook-nutrition curriculum for distribution to other schools and day-care centers. The overarching goal of the “Nourishing an Urban Community” projects is to establish sustainable community-based gardening, nutrition, cooking and physical activity programs to improve metabolic and cardiovascular health.
QUESTION:

How Can We Reduce Early Childhood Injuries?

Unintentional childhood injuries are the leading cause of morbidity and mortality in children. Many parents fail to incorporate proven safety measures, such as smoke detectors, car seats, window guards and stair gates, in their homes and vehicles. Other common safety concerns include supervising children in the bathtub, preventing burns from hot water and storing medications and cleaning supplies properly to prevent poisoning. Some injuries, such as burns from space heaters and injuries caused by poor housing conditions, are more common in low-income populations.

Interventions that address home safety by educating parents in their home are generally effective in increasing safety practices and reducing injuries among children. Home visitation programs delivered by health care or social service agencies provide a unique opportunity to help identify risks for unintentional injuries and to offer safety equipment and information designed to help mitigate those risks. Follow-up to ensure continued use and maintenance of safety equipment is also an important factor in preventing childhood injuries.
The Community/University Health Research Partnership between Nurses for Newborns Foundation and Saint Louis University School of Public Health combines two programs known to help at-risk families. Saint Louis University has developed an evidence-based injury prevention program to deliver tailored information to parents of children from birth to age four shown to promote the use of specific safety measures. Nurses for Newborns Foundation is a nonprofit organization that has been providing free home visits by registered nurses to at-risk mothers and their babies in St. Louis and 20 surrounding counties for nearly two decades.

The Saint Louis University injury prevention program, currently offered through pediatric outpatient clinics, will be adapted and integrated for use during home visits conducted by the Nurses for Newborns Foundation. Goals of the partnership include increasing parental knowledge; changing attitudes and beliefs about the importance of injury prevention in the home; increasing the use of safety supplies in the home; increasing parental supervision of children during higher-risk activities; and, ultimately, to reduce preventable early childhood injuries.

The mission of Nurses for Newborns Foundation is to provide a safety net to help prevent infant mortality, child abuse and neglect through home-based programs that provide education, health care and positive parenting skills. Founded in 1991, the organization assists families in getting connected with medical, social and government services, and maintains a donation bank with clothes, toys, diapers, blankets, car seats, baby beds and formula for families in need.
Substance abuse is a chronic condition marked by cycles of relapse, multiple treatments and intermittent periods of abstinence before reaching sustained recovery. Most people who achieve sustained recovery do so after three or four episodes of treatment over many years.

The protracted course of substance abuse is similar to the course of other chronic conditions such as diabetes, hypertension and asthma in which medical treatments are provided over time and their effects are monitored during treatment. Despite the chronic nature of substance abuse, addiction treatments typically are delivered in an acute-care format, where treatment is offered for one episode without ongoing follow-up care.

As a result, a majority of people who complete treatment resume alcohol or drug use within one year.

A chronic care model does not rely on individuals identifying their symptoms and returning to treatment on their own. A continuing care approach to substance abuse utilizes periodic check-ups, independent assessments and personalized feedback to help prevent relapse or return people to treatment faster if relapse has occurred. Recent studies have demonstrated the success of recovery management check-ups within a chronic care treatment model, but the effectiveness and sustainability of these benefits in a peer-delivered program are unknown.

**QUESTION:** How Can We Support Substance Abuse Recovery?
Research Study: **Evaluation of a Peer-Delivered Recovery Management Checkup Model Among Substance Abuse Women**

The Queen of Peace Center and Saint Louis University will evaluate the effectiveness of offering recovery management check-ups to women in a peer-delivery model. The goal is to link women who have recently completed substance abuse treatment with peer specialists to provide 12 hours of recovery management checkups over the course of one year. The Community/University Health Research Partnership will study if the availability of a peer specialist extends the period of sobriety for women and/or facilitates a more rapid return to treatment for women who do relapse.

The study will be completed among clients of Queen of Peace Center, a comprehensive family-based behavioral health center for women struggling with substance abuse and mental illness in St. Louis. This gender-focused female recovery center provides a variety of treatment options to women with co-occurring disorders and those affected by trauma. The mission of Queen of Peace Center is to provide behavioral health care to women with addictions and to their children.
QUESTION:
How Can We Promote Safe Sleep Practices?

Unsafe infant sleep practices continue to pose serious risks for infant death from sudden infant death syndrome (SIDS) or sudden unexpected infant death (SUID). In recent years, the chief medical examiner for St. Louis has reported an alarming increase in infant deaths where unsafe sleep practices were observed. In 93 percent of local SIDS and SUID cases, “unsafe sleep” was present as a risk factor at the time of death. The most common risky practices include infants placed on a sleep surface not designed for infant sleep, infants placed on their stomach for sleep and/or infants sleeping with an adult.

The need for preventive education to mothers of infants is apparent. The “Back to Sleep” Campaign was launched in 1992 to increase the public’s awareness that placing an infant to sleep on his or her back lowers the risk of SIDS. The campaign reduced SIDS rates nationally by half, but in the past decade SIDS rates have remained flat or even increased in some areas, including in the City of St. Louis. Of particular concern is the fact that rates among African American infants did not see the dramatic decrease documented in other populations. In the City of St. Louis, African American infants are two to three times more likely to succumb to sudden infant death.
SIDS Resources, Inc. and Washington University will help identify and promote the most effective SIDS prevention messages for African American mothers of infants through their Community/University Health Research Partnership. Based on focus group research with African American mothers, researchers will develop persuasive language, educational messages and rationale to promote safe sleep practices and reduce the risk of SIDS. The effectiveness of this new approach will then be compared in a clinical setting to existing educational interventions. Finally, researchers will survey physicians who serve African American mothers regarding their practice patterns and methods of providing safe sleep education and SIDS/SUID risk reduction information to their patients. The results of this research will be used to develop SIDS curricula for use with African American populations, that will then be offered to health care providers and organizations that serve African American populations. By increasing the number of physicians who incorporate targeted safe sleep education and SIDS/SUID risk reduction education into their standard of care for pregnant and new African American mothers, the partnership hopes to significantly reduce SIDS/SUID rates among African American infants in the St. Louis area.

The mission of SIDS Resources, Inc. is to promote safe practices that reduce the risk of infant death and to provide bereavement support for families who have lost babies. SIDS Resources, Inc. has provided community-based preventive education in the St. Louis area for nearly 15 years.
How Can We Encourage Better Diabetes Care?

Diabetes is a common chronic disease. More than 8 percent of Missourians have diabetes; 90 percent of these cases are Type 2, or non-insulin dependent diabetes. Prevalence of the disease increases with age and is more common in low-income and minority groups. Poor control of blood glucose, blood pressure, cholesterol and weight, as well as social determinants such as diet and exercise all contribute to the health costs and economic costs of diabetes. Research shows that diabetes self-management education helps people living with the disease improve their clinical outcomes and quality of life.

Diabetes self-management education (DSME) is an evidence-based process of supporting people with diabetes with informed decision making, self-care behaviors, problem solving and active collaboration with their health care team. Although diabetes self-management education is recommended by Community Guide, a thorough evidence-based review assessing the effectiveness of health promotion strategies, DSME is not readily available in the St. Louis region, particularly in community settings. In fact, only 51 percent of people with diabetes in the St. Louis area have ever taken a class to learn how to manage their diabetes.
The Community/University Health Research Partnership between the St. Louis Diabetes Coalition and Saint Louis University will establish and evaluate a regional community-based diabetes education service provided by certified diabetes educators. The program, known as KICK Diabetes, uses evidence-based guidelines to assess diabetes knowledge and health behaviors, facilitate self-management and assist participant navigation of the health care system. Participants choose to meet a personal diabetes educator at times and places convenient for them, such as a coffee shop, community center, library or place of worship. The project will compare two different approaches to offering diabetes education and evaluate effectiveness in terms of clinical measures and participant-defined goals.

The ultimate goal of the partnership is to increase the availability of diabetes self-management education in the St. Louis area. KICK Diabetes is part of a regional recommendation to create a centralized support resource for people with diabetes.

Established in 1998, the St. Louis Diabetes Coalition was formed in response to community leadership concerns about the availability of high-quality diabetes care for all people. Through its collaborative approach, the Coalition has led efforts to improve self-management education access, health plan benefit design and care management by primary care providers.