



Tucson Medical Center



2015 – 2018

Community Health Needs Assessment Implementation Strategy Report

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Acknowledgments

The 2010 Patient Protection and Affordable Care Act requires that nonprofit hospitals conduct a community health needs assessment every three years and adopt an implementation strategy to meet the outstanding community health needs identified in the assessment as a condition of maintaining the institution's federal tax exemption.

Tucson Medical Center has elected to prepare this assessment and implementation strategy in fiscal year 2015-16 and will use the document as a planning tool to help create strategic initiatives regarding medical services and community outreach efforts in order to meet critical health needs of members of our community whose health is at-risk.

Tucson Medical Center would like to thank the community partners who collaborated on the Community Health Needs Assessment, including Banner-University Medical Center, Carondelet, El Rio Community Health Center, Healthy Pima, Northwest Healthcare and the Pascua Yaqui Tribe. It is with much gratitude that we acknowledge the Pima County Health Department for its work in facilitating the joint effort.

TMC's Implementation Plan was informed by the Community Health Needs Assessment and the input of stakeholders from throughout the organization in a series of sessions that was facilitated by the TMC Lean Team.

The CHNA and the Implementation Plan were reviewed by the TMC Medical Executive Committee and approved by the TMC Board of Trustees. TMC HealthCare also has a proprietary strategy plan that acknowledges and addresses many of the issues identified in the CHNA. As those plans are actualized and implemented, they will formally become part of this plan.

TMC's Community Benefit program has a dedicated leader and staff who led the development of the CHNA and Implementation Plan and are accountable for implementing the identified programs. The organization has budgeted dollars committed to sustaining its community benefit efforts. Additionally, community benefit is a critical component of the organization's strategy to remain independent and focused on community need through partnerships, alliances and collaboration.

Addressing Community Health Needs



Caring for the community is central to what we do.

It's central to our mission. It's embedded in our values. And it's what the community has expected from its locally governed, nonprofit community hospital for more than 70 years.

Good health isn't just about what happens within the walls of the hospital – although we believe our role remains crucial in treating and managing disease. Good health also is more than scheduling an annual wellness exam.

Good health is something that is deeply rooted in our practices and lifestyle choices in our homes and in our communities. The foundation lies not only in the choices we make as individuals, but in the priorities that are established to help people take steps at preventing illness through access to nutritious food, physical activity and healthcare. It also lies in eradicating disparities and barriers where we find them.

Tucson Medical Center in 2014 provided \$56 million in community benefit, that included helping the most vulnerable obtain care regardless of their ability to pay as well as providing outreach and education designed to advance medical knowledge and enhance the health of the community.

To assess the needs of the community, Tucson Medical Center worked in collaboration with our community counterparts to identify the most serious public health issues facing us today, with the goal of harnessing our collective resources, assets and best practices to build a healthier Southern Arizona.

It is our hope that the work undertaken in the Community Health Needs Assessment <https://www.tmc.az.com/community-health-needs-assessment> and in this accompanying Implementation Plan will not only help Tucson Medical Center play a role in making a measurable difference, but will inspire community leaders to join us in making sustainable change and engage community members in how they can influence their individual health.

Please join us.

Judy Rich, President and CEO, Tucson Medical Center

Prioritizing Community Health Needs

Although Tucson Medical Center and the other partners in this effort recognize the important role other areas throughout Southern Arizona play in building a healthy state and region, the assessment defined the immediate community served as the entirety of Pima County.

The assessment, conducted between Summer 2014 and Spring 2015, relied on the collection and analysis of secondary, quantitative morbidity and mortality data from a variety of local, state and national sources as well as primary, qualitative data collected from community stakeholders, key informants and community members at large. When available, data is compared to appropriate benchmarks (Arizona, other U.S. counties, the U.S. and/or time trends) to evaluate progress.



Sources consulted

- **Secondary data:** Multiple sources were consulted, including previous Pima County Community Health Needs Assessment, County Health Rankings and Roadmaps, the Centers for Disease Prevention and Control and the Arizona Department of Health Services Health Status and Vital Statistics Annual Reports.
- **Key informant interviews:** Interviews ranging from 45-60 minutes were conducted with 25 community members to help identify the most important health concerns and their root causes, as well as the strengths and assets that can be deployed in improvement efforts.
- **Focus Groups:** Six different group discussions were held, with specific focus on health providers, elder care, community health and schools. Three of the six focus groups solicited input from physicians.
- **Surveys:** Surveys were disseminated throughout the study area, available in both English and Spanish. In total, more than 600 surveys were used for analysis.
- **Community Health Prioritization Forum:** A total of 42 clinical and public health professionals participated in prioritizing health issues identified by key informants and focus group participants.

Areas of opportunity

After reviewing the data and the community input, the following four issues were identified:

1. **Anxiety and depression spectrum disorders (Mental and Behavioral Health)**
2. **Substance abuse and dependency (Mental and Behavioral Health)**
3. **Injuries, Accidents and Chronic Pain**
4. **Diabetes**

Planning process

Tucson Medical Center formulated several internal prioritization teams that gathered to leverage their expertise and consider the four issues based on magnitude, alignment with our hospital's mission, existing resources that might be applied to the problem and TMC's unique ability to effect change.

Participants included nursing directors of each key hospital service line, as well as other leaders with specialization in a variety of areas, including cardiac services, case management, dietary needs, geropsychiatric care and primary care services.

Ultimately, recognizing that resources and expertise are both finite, TMC has developed the following implementation plan that builds on existing initiatives, advocacy and partnerships to improve the health and wellness of our community in these four areas, as well as in a few additional areas TMC is singularly prepared to address.

Health Priority Areas 1 and 2: Mental & Behavioral Health – Anxiety and depression spectrum disorders; substance abuse and dependency

Mental health was identified as a significant challenge by key informants and by participants in the prioritization forum. Depression has a 12.4 percent prevalence within the Medicare population in Pima County, which is statistically significantly higher than the prevalence in the state of Arizona (11.5 percent).

Anxiety and depression manifests as family stress and violence, bullying in school and workplaces, and may result in poor coping mechanisms that influence other health outcomes (for example, drug and alcohol use and abuse, violence, etc.). One key informant who works with school-aged adolescents stated that “many children are suffering” in school and with their peers based on their experiences of household stressors.

Specific populations identified as being particularly vulnerable to poor mental health outcomes in Pima County include aging and elder individuals, resettled refugees, the large veteran population, and homeless individuals.

Meanwhile, in terms of substance abuse, secondary data analysis for this report shows that Pima County experiences high prevalence rates when compared to statewide and national statistics on the following groups in particular: (1) adults who binge drink (17.5%); (2) teens who have smoked (29.3%); (3) teens who use alcohol (31.5%); and (4) teens who use marijuana (18.3%).

Four of the top 20 causes of death are related to substance abuse and Pima County performs worse than the state in each. Those include drug-induced death, opioids, pharmaceutical opioids and heroin.

Ways in which TMC addresses behavioral health issues currently:

Inpatient services:

TMC has long been a leader in senior outreach, education and treatment. Recognizing the need to provide short-term inpatient mental health

services for aging adults, TMC opened the TMC Geropsychiatric Center at Handmaker in early 2015.

The 16-bed Center, which provides high-quality treatment by a group of highly trained health professionals in a caring and compassionate environment, specializes in treating acute emotional and behavioral disorders related to aging, such as depression, dementia and adjustment difficulties.

Of the 348 patients served in in the Center's first year of operation, 254 of them were diagnosed with a depressive disorder and were treated.

Tucson Medical Center also recognizes the need for additional awareness of suicidal tendencies in patients who present for treatment. TMC is in the process of developing processes to implement a new assessment that will evaluate a patient's potential risk. Patients with immediate needs receive additional supervision and a behavioral health consult.

Outpatient services:

TMC had served as home to Palo Verde Behavioral Health since 1993, but came to recognize Palo Verde could better thrive under new ownership from UHS of Tucson, LLC, a company that specializes solely in behavioral health.

Although TMC does not directly provide outpatient services, we do provide referrals to Palo Verde, which operates an intensive outpatient program designed to serve as a step-down from inpatient hospitalization.

TMC has also continued to work closely with Palo Verde to assist patients with behavioral health needs who present at TMC's Emergency Department. Palo Verde's specialized staff partner with TMC's Emergency Department providers to evaluate a patient and provide a safe disposition, either to the community or as an inpatient to Palo Verde or to TMC's Geropsychiatric Center.

Community outreach:

TMC invests significant time and resources in prevention services.

TMC delivers more babies locally than any other hospital and recognize that while babies are a gift, some new moms and dads can experience deep feelings of sadness and anxiety. TMC hosts a weekly postpartum depression support group and participates in a coalition with other area hospitals to provide support services to affected families.

TMC also recognizes the power of group support for those struggling with a variety of conditions, from grief and bereavement, through our Hospice, as well as Parkinson's, Alzheimer's and stroke support through TMC for Seniors. Our retail wellness center, The Core at La Encantada, also provides an avenue for a variety of support groups, including bariatric support and cancer support.

Stress and anxiety often go hand-in-hand with depressive disorders and substance abuse. TMC partners with the Wellness Council of Arizona for programming to help develop stress-free workspaces. We also focus on stress management in our Life Enhancement Program, a program run in conjunction with Canyon Ranch Institute designed to help participants prevent and reduce chronic disease through positive lifestyle changes. Our findings have shown that participants who report depression upon the start of the program, universally report a reduction stress and depression as a result of the coursework over 12 weeks. Similarly, a Survive Well program, in partnership with Arizona Oncology and Arizona Oncology Foundation, for cancer survivors addresses the psychosocial needs that often accompany a cancer diagnosis.

Recognizing that regular exercise – in addition to the physical benefits – also may help reduce depression and anxiety, and may benefit those with substance abuse, TMC also offers a wealth of fitness and exercise programming. Seniors regularly have access to free group exercise programs. Our employees and their families have access to two on-site gyms. The community is invited to participate in 40-plus fitness classes a month at The Core. TMC has an active wellness outreach for children and adolescents as well, including Girls on the Run and Fit Kids, which help build self-esteem and may be protective in guarding against both depression and substance abuse.

Education and awareness is another component of supporting a healthier community. TMC for Seniors offers regular lectures and other programming on mental health and aging. Substance abuse concerns are addressed through periodic lectures by our pharmacy team, aimed at the senior demographic, to talk about medication safety. TMC also participates in the Dispose-a-Med program, which safely disposes of medications and has the effect of limiting the amount of drugs in homes.

The Core routinely hosts conversations that touch on behavioral health needs, most recently partnering with the University of Arizona's Center for Compassion Studies to host a four-part conversation on compassion that reached more than 300 guests.

TMC also offers ongoing financial and other support of entities that provide education, outreach and advocacy in the areas of behavioral health, including the National Alliance for Mental Illness and the Emerge! Center Against Domestic Abuse.

Future state:

As we begin to use our new depression screening tool for patients who present to us for care, we will collaborate with our local regional behavioral health authority to identify appropriate resources to train our staff for these conversations. We will then work with a multidisciplinary team within the organization to best ensure a comprehensive approach that allows staff to help this group of patients with their next steps.

Tucson Medical Center is also exploring the viability of providing distance access to postpartum support. With a service area that encompasses all of Southern Arizona, our patients come from places as varied as Safford, Douglas and Sells. Although we believe there is great value in the therapeutic function of group support, we believe an online option may be well suited for those for whom transportation is a challenge, or for digital natives who are more comfortable connecting with technology.

In the area of substance abuse, TMC will provide leadership and participate with the City of Tucson, Pima County and other partners to address the issue of opioid abuse. While there are several strategies that have been identified to help combat the growing epidemic, including changes in law enforcement policies, TMC is best equipped to assist through efforts to promote responsible prescribing and dispensing policies and practices, as well as to increase public awareness and patient education about prescription drug misuse.

Health Priority Area 3: Injuries, Accidents & Chronic Pain

The needs assessment determined that Arizona's injury rate is higher than the national average, with accidents (including motor vehicle crashes and other fatal injuries) ranking as the third leading cause of death.

Groups most susceptible to accidental injury include children, the elderly and laborers. Additionally, intentional injury may be related to acts of intentional violence, including domestic violence and self-harm.

Ways in which TMC addresses injuries and accidents currently:

Outpatient services:

The Emergency Department at Tucson Medical Center is the busiest in the region, with more than 95,000 emergency visits in 2015. Patients present to the emergency room for a host of concerns, including major accidents as a result of motor vehicle accidents, bicycle and skateboard accidents, falls and children falling out of shopping carts or obtaining access to adult medications.

The Emergency Department includes:

- More than 40 treatment rooms
- Doctors and nurses specializing in emergency medicine
- Immediate assessment by a registered nurse at arrival
- A triage area staffed 24 hours a day
- Access to key treatment areas in the hospital

TMC International & Language Services facilitates communication among patients with limited English proficiency, family members and TMC health care providers. Department staff members are certified in Spanish medical interpretation and oversee around-the-clock interpretation needs for more than 200 languages.

TMC works closely with the Southern Arizona Center Against Sexual Assault, serving as its preferred hospital for victims of sexual assault and strangulation, which require specialized skill and knowledge.

In another area of concern, as many as 1 in 5 high school athletes will sustain a concussion during the season. And while football has garnered a great deal of attention, girls are not immune. Girls' soccer represents the second highest percentage of contact sports athletes sustaining concussions

Tucson Medical Center was pleased to support efforts by The CACTIS Foundation, a nonprofit organization committed to sharing information with young athletes and their parents about the risks of concussion and how to reduce their harmful effects.

Not only have TMC and CACTIS joined forces to help raise awareness of the risks of concussion and how to reduce their numbers and impact, but through a grant from the TMC Foundation, were able to perform preseason baseline concussion testing of approximately 500 local soccer players. In case of injury, the baseline test results can be compared with post-concussion tests to identify the effects of the injury and help concussion-trained professionals make more informed decisions about when the athlete should return to play and school

In February 2016, the Tucson Concussion Center opened in the Tucson Medical Park so that Southern Arizona patients have access to state-of-the-art concussion care “under one roof.” In addition to sports, concussions most commonly can occur among members of the military and first responders, as well as in workplace injuries, motor vehicle accidents and to victims of domestic violence.

Community outreach:

Tucson Medical Center has long embraced prevention efforts to raise awareness about potential risks in the community, and particularly to more vulnerable populations, such as children and aging adults.

Included among our pediatric prevention programs:

Car seats: With motor vehicle accidents the leading killer of children under the age of 14, TMC not only distributed 1,500 car seats in calendar year 2015, but is proud to have distributed car seats to families for 32

uninterrupted years. Our car seat installers are certified, with our lead coordinator serving as a lead trainer. All families receiving car seats must attend a 90-minute education course. TMC also offers a short-term loaner program for up to six months.

Booster seats: More than 3,200 families with children five and older in 2015 received free booster seats to keep their youngsters safe while traveling.

Bike helmets: TMC fit and distributed more than 7,000 bicycle helmets in 2015.

Drowning prevention: TMC funded more than 500 swimming lessons for children in need in 2015 and continues to provide first grade curriculum for Water Safety is for You!

Fire safety: With fires and burns the third leading cause of death in children under the age of 14, TMC partners with fire departments to share fire and electrical safety tips with families.

Pedestrian safety: TMC hosts bike and walk to school days annually, providing students with safe travel tips. Additionally, TMC provided funding to construct portions of The Loop, a car-free river park for active families, as well as funding a lighted walking path around an elementary school in an underserved neighborhood.

Among these other prevention efforts, TMC also provides education to children and families on sun safety, medication safety, skateboard safety, desert dangers, snakebite safety, sports safety, holiday safety, shaken baby syndrome and high risk pregnancies. TMC also recently received a grant for distracted driving prevention efforts in middle and high school.

Adult injury prevention: For aging adults, meanwhile, falls are the single leading cause of injuries, fatal and otherwise. To reduce those dangers for aging adults, TMC is working with its area partner on aging to identify patients who have come in for treatment for a fall and to conduct a home evaluation to reduce future fall risk. TMC also offers balance classes, which also help to reduce falls. Educational coursework at TMC for Seniors includes medication safety as well, in an effort to improve medication management.

TMC also provides training opportunities for first responders, hosting an annual conference offering educational opportunities in areas such as neurology and cardiac. We also provide training to first responders for whom we serve as a base hospital – to include the fire departments of Corona de Tucson, Douglas, Elfrida, Rincon Valley, St. David, Tohono O’odham and Sells – on issues such as ebola, endocrine emergencies, pediatric cardiac arrest, dyspnea and stroke.

TMC routinely offers self-defense classes at its retail wellness space, The Core, which was in response to attacks on local joggers. TMC also has a robust domestic violence program, with our emergency department serving as a safe place where victims can wait for a ride.

Internally, Tucson Medical Center has an active Hospital Emergency Response Team that can respond to potential life-and-death scenarios, from acts of terror to toxic spills.

Its security team trains staff members in how to respond in the case of an active shooter on campus.

And because animal control is at its root a public health issue, TMC has offered financial and in-kind support for public and private sector animal sheltering efforts, to reduce the spread of disease and risk of injury from stray companion animals. Additionally, TMC will expand its collaboration with the City of Tucson and Pima County to improve alignment of animal care services between the two jurisdictions.

Future state:

The single most important tool in reducing health-care associated infections is also one of the simplest: Handwashing.

In addition to internal hand hygiene campaigns, which included an effort to win recognition as a world record holder in a hand sanitizing relay attempt, TMC will do even more to share the message with patients and the community at large that they can play a role in reducing infections. TMC will share its hand hygiene message at pediatric and adult outreach events moving forward.

Health Priority Area 4: Diabetes

As identified in the Community Health Needs Assessment, the prevalence of diabetes in Arizona has more than doubled since 2003. Importantly, key informants, focus group participants, and community forum respondents equally viewed Type II Diabetes as a major threat to community and public health in Pima County.

Diabetes is an expensive and chronic disease that must be managed with medication, exercise and a healthy diet.

However, lifestyle, economic, environmental and policy factors were correlated with an increase in type II diabetes in all age groups in Pima County. Participants noted high stress - leading to poor diet and decreased physical activity - was a contributing factor. Several key informants stated the importance of teaching “traditional” ways of cooking and preparing food when working with minority populations.

Ways in which TMC addresses diabetes currently:

Inpatient services:

An interdisciplinary team meets daily to discuss diabetic patients throughout the hospital and to engage directly with the highest-risk patients to discuss a treatment plan, consider modifications of existing plans, and provide 1:1 education. The team consists of clinical diabetic educators, case manager, pharmacists, endocrinologists, nurse practitioners and dietitians.

Clinical diabetic educators have created handouts on best practices and nutritional information – in English and Spanish - to distribute to adult and pediatric patients. Patients also have an opportunity to learn in-house about carbohydrate-containing foods and beverages through Food & Nutrition Services. Because not every patient is experienced in carbohydrate counting, patients with high blood glucose are placed on specific meal plans and given information about the nutritional choices that are most appropriate for them. When TMC patients with diabetes hit their carbohydrate limit, they are given other food options to help them limit their carbohydrate intake.

Pharmacists provide on-site counseling on diabetes medication management prior to discharge. To further reduce barriers to effective disease management, clinical diabetic educators worked with TMC's informatics team to build a discharge panel for the physicians to streamline ordering of supplies, such as lancets, test strips or meters, automatically generating a prescription so patients have everything they need when they leave for home. Patients are also able to fill their prescriptions at TMC's retail pharmacy to provide a safer discharge home.

Pharmacists will call patients with complex needs post-discharge to ensure the patient is on track and does not have additional questions.

Patients also are given information on resources and services they can access on an outpatient basis.

TMC now has the option to admit diabetic pediatric patients using telemedicine options, by using endocrinology services through Phoenix Children's Hospital. Once discharged, patients may either schedule follow-up meetings with Angel Clinic locally or continue working with Phoenix Children's Hospital.

Outpatient services:

On the adult side, TMC offers two clinics that are beneficial for patients with diabetes, and particularly for those who are newly diagnosed or whose blood sugars are out of control. TMC offers 1:1 education, as well as group classes. Additionally, TMC also offers a nutrition clinic, which is open to anyone needing 1:1 counseling on healthy food options for their own individualized needs.

Both clinics accept insurance coverage, as well as self-pay patients. For patients who have fewer financial resources, we offer free basic counseling, called Journey to Control.

TMC also offers a comprehensive weight loss program. Patients who want to consider a surgical option may consider bariatric surgery, which may help mitigate predisposition to diabetes through weight reduction. TMC also offers 1:1 supervised weight loss sessions with patients who may not be appropriate for surgery. In either case, TMC offers ongoing support groups for those working on weight maintenance or loss.

Community engagement:

TMC regularly hosts health fairs, regularly providing the option of testing a finger stick glucose level. These are targeted throughout the community, including underserved areas.

With exercise an important tool in managing diabetes, TMC offers many wellness opportunities to assist young people, and their families, in developing healthy habits early. In addition to outreach at Whitmore Elementary at Tucson Unified School District and Apollo Middle School in the Sunnyside Unified School District, TMC sponsors Fit Kids, which engaged parents in helping their children become physically fit, and Girls on the Run, a learning program which helps develop self-esteem in girls in the third through fifth grades and culminates in a 5k race. Girls on Track is a corresponding program for middle school girls in sixth through eighth grades.

Since diabetes is a chronic disease, we address it as part the Life Enhancement Program. In both cases, we discuss with the participants in a 1:1 setting how to better control their blood glucose levels through proper diet and exercise.

TMC is the sole hospital member in two accountable care organizations, Arizona Connected Care and Abacus Health, which are designed to deliver high quality, cost-effective care. Both organizations are dedicated to managing high-risk patients with chronic illness, including diabetes. Once a month, TMC's partner in Abacus Health, Arizona Community Physicians, provides an educational session for its patients with diabetes at TMC for Seniors and the retail wellness space, The Core at La Encantada. The Core also works with TMC's employed physician group, TMC One, and other physicians who practice at TMC in creating content for patients with diabetes.

And because TMC is the community's 15th largest employer, TMC strengthens the community by strengthening its employee base of more than 3,700 employees. With high stress often leading to poor decisions, including poor diet choices, TMC offers stress management coursework with its employees. TMC also offers free exercise and health coaching to employees to provide additional information about exercise, nutrition and lifestyle, and in 2014, opened an employee gym by converting old operating rooms. TMC also offers employee discounts for healthy menu items.

Future state:

TMC is actively in process of building a specialty nursing team in pediatrics to better serve patients with diabetes, and provide critical education for families to help manage the disease.

Additionally, TMC is developing a diabetic exercise and education program that will use the gym at the El Dorado health campus formerly used for cardiac rehabilitation. That program will dovetail with the existing support groups and classes for patients with diabetes.

TMC recently also converted its website to a customer relationship management system, and intends to explore opportunities to directly engage consumers with either online apps or newsletters that would offer information and tips for patients with specific chronic disease.

Because diabetes and chronic disease are expensive for both employees and employers, TMC is actively working on developing a wellness program to take to employers that would help them better engage their employees in their own health.

TMC also recognizes that there is a significant gap in pediatric diabetic care and is exploring two different tracks to bolster services.

TMC plans to explore the feasibility of identifying grant funding and collaborative partners to screen adolescents in high-risk middle schools. Information and follow-up recommendations would be distributed to those students with risk factors.

Meanwhile, TMC also is exploring an expansion of our pediatric diabetic outpatient services. Outpatient diabetic educators would provide assistance to families with children who are newly-diagnosed or who have uncontrolled diabetes, providing comprehensive management of the disease, including education on medication management, equipment usage, nutrition and physical activity.

TMC is partnering with chef Janos Wilder in the Carriage House to create 12 heart healthy recipes that will rotate through our patient and cafeteria menu. Cooking demonstrations will be streamed via video for the community and for our inpatient population. Separately, TMC also plans to explore opportunities to partner with other local chefs to reconnect with and share traditional ways of cooking healthy recipes.

Other Community Health Needs: Cardiac, Stroke

Heart disease is the second highest cause of death in Pima County. Stroke ranks seventh, although nationally it is also one of the leading causes of long-term disability.

Although Pima County did not significantly differ from the statewide average, both share many of the same preventable or controllable risk factors, including high cholesterol and high blood pressure, as well as lifestyle choices such as physical inactivity and smoking.

Ways in which TMC addresses cardiac/stroke currently

Inpatient services:

TMC performs more cardiac procedures than any other hospital in Southern Arizona, treating nearly all heart and heart-related conditions. Our comprehensive structural heart program includes minimally invasive treatments for all types of heart valve defects, including procedures for patients who cannot go through traditional open heart surgery. A multidisciplinary structural heart team meets to review each patient to evaluate the best treatment options, ranging from surgery to less invasive treatment options.

The TMC CardioVascular Center not only provides a complete program of services for cardiac patients, but Tucson Medical Center has earned accreditation as a Chest Pain Center following a comprehensive process conducted by the Society of Cardiovascular Patient Care Centers.

Tucson Medical Center also has been named one of the nation's 50 Top Cardiovascular Hospitals® for 2015 by Truven Health Analytics, which evaluates 1,000 hospitals.

TMC is also a Stroke Center of Excellence, and is currently the only local hospital offering 24/7 intra-arterial treatment for stroke.

Outpatient services:

Many highly advanced diagnostics are usually done on an outpatient basis. TMC offers a range of cardiac testing, including cardiac MRI, cardiac CT, angiography and stress echocardiograms.

We offer a comprehensive heart failure program, which offers education on lifestyle change as well as follow-up care to help patients stay healthy and avoid readmissions into the hospital.

For patients ready to return to more active lifestyles, patients who have suffered a heart episode within the last year are invited to attend one-hour exercise sessions at our cardiac rehabilitation outpatient location, up to three times a week for as many as 18 weeks. Staff closely monitors each patient's heart rhythm and blood pressure, and may adjust the intensity of each workout, to ensure optimal patient safety. Staff also provides lifestyle education to participants to help ensure optimal heart health.

TMC also offers an outpatient TIA (transient ischemic attack) clinic for evaluation and management of stroke risk factors.

Community engagement:

As evident in the diabetes section, TMC is also involved in the health of the broader Tucson community, sponsoring runs and walks for people of all fitness levels to help combat heart disease and stroke.

We are a strong supporter of the Southern Arizona chapter of the American Heart Association/American Stroke Association, including the Heart Ball, the Heart Walk and Go Red for Women. We are also an active member of the Tucson Stroke Leadership Group, with a mission to educate the public about risk factors and risk reduction.

And just as physical activity counters diabetes, instilling good exercise habits in youth also plays a role in heart and brain health, which is why TMC participates in enrichment programs at local schools and sponsors events such as Girls on the Run, where we will also show participants how to perform chest compression CPR.

We believe community members must partner with their medical team to take care of their health, but they can only do that if they are empowered through education. Medical professionals share their expertise in lectures and conversations at TMC for Seniors and at The Core at La Encantada to help community members make better choices in preventing, delaying and managing chronic illnesses.

An annual stroke event offers hundreds of free, comprehensive screenings to community members. We also offer a monthly stroke survivor support group where patients and caregivers can share stories of resilience and seek support in times of challenge.

TMC also helps medical staff and first-responders learn about the latest advances and best practices, by hosting annual symposiums, conferences and professional education, as well as featuring a regular cardiovascular newsletter for physicians.

TMC also has increased outreach in Sierra Vista and other rural areas, in partnership with the Centers for Neurosciences.

As with diabetes, TMC is engaged not only in encouraging good health in our own employee base, with smart nutritional coaching, an employee gym and free health coaching, but is actively working to engage other businesses and organizations in collaborative employer-based wellness programs.

Future state

Through the formation of the Southern Arizona Hospital Alliance, we join forces with our rural partners to share expertise, resources and best practices. To further enhance that relationship, we plan to pursue telemedicine technologies to help patients too sick to travel great distances to see a provider.

Also in conjunction with our rural hospital partners, TMC is reinvigorating a program to stabilize and transport cardiac patients at hospitals without on-site percutaneous coronary interventional capabilities.

TMC also is expanding use of the Watchmen left atrial appendage closure device, as part of our structural heart program, which allows patients to discontinue long-term anticoagulant therapy, such as Coumadin and other blood thinners.

TMC is also working to expand endovascular treatment options to assist acute stroke patients for whom traditional therapy is not working or inappropriate.

Patients grappling with cardiac and stroke issues, just as patients with diabetes, may also benefit from some of TMC's other developing programs, including a comprehensive weight loss program and healthy cooking series through the Carriage House. Our customer relationship manager capabilities will allow us to provide targeted information to patients who have expressed interest in such items as heart healthy recipes or exercise programs.

And although patients are exposed to some information about the potential for depression after a heart attack or stroke, including through our cardiac rehabilitation program, TMC intends to explore the development of a more comprehensive program to prevent depression among post-cardiac surgery and stroke patients.

Other Community Health Needs: Access to Care

The percentage of uninsured adults has declined significantly in Pima County, from 14.4 percent in 2012 to 10 percent in 2014, thanks to a strong county-wide collaboration that was launched after the issue was prioritized in the 2012 Community Health Needs Assessment.

Southern Arizona's major healthcare providers and other community organizations joined together to advance health insurance enrollment in Southern Arizona, in conjunction with the enrollment period for the federal healthcare marketplace as well as Medicaid expansion.

However, insurance coverage is only one piece of the puzzle – having enough providers to care for the community is another concern. The majority of Pima County residents live in a Health Professional Shortage Area (HPSA) in primary care, mental health care and dental health care. Transportation and a shortage of primary care practitioners are two of the main challenges facing Pima County residents, especially in rural and low-income areas.

Ways in which TMC addresses access to care currently:

Inpatient services:

In keeping with TMC's mission to provide care regardless of a patient's ability to pay, TMC provides financial assistance for patients who lack insurance coverage or are underinsured. A full 45 percent of patients to our Emergency Department are on Medicaid.

In 2014, Tucson Medical Center provided \$56 million in community benefit and charity care, or about 12.7 percent of net revenues. Of that, \$9.3 million funded the hospital assessment that helped fund the additional cost of expanding Medicaid coverage to more than 330,000 low-income residents.

Outpatient services:

Tucson Medical Center's employed provider group, TMC One, is committed to expanding access to care in a variety of ways:

- **Utilizing technology.** Patients with limited transportation or local medical care options may benefit from telemedicine, allowing doctor-to-doctor consults. They also may benefit from HIPAA-compliant electronic visits, which allow patients to connect with providers without ever leaving home. Patients can connect with physicians, schedule appointments and get prescriptions refilled through a robust patient portal.
- **Expanding its provider base.** TMC One has doubled in size in one year, and has expanded its geographic footprint to provide service in areas under-represented in access to primary care, based on an in-depth community analysis. Our newest southeast location, the Rincon Health Campus near Vail and Civano, will offer greater access to specialists now in limited supply in that areas, including specialty rotation in service lines such as orthopaedics, cardiovascular, dermatology and mental health services.
- **Convenience for patients.** Weekend hours, as well as before and after-work appointments are offered, as is same-day access to a provider.

TMC's intention is also to support efforts to recruit doctors to the community while keeping existing ones here. One of the ways we do that is to make available to community physicians, who are not in our employed group, expert resources related to practice management. It is an opportunity to allow physicians to keep their focus on their clinical work, and less on operational support, while still maintaining their independence. Additionally, to the extent that such service agreements result in reduced costs, such as improved efficiencies in medical supply purchasing, those lower costs may help providers hold the line on costs for patients.

Our hospital recruiters are continuously recruiting specialty physicians and supporting specialist outreach to rural hospitals.

As a member of the Mayo Clinic Care Network, a national network of like-minded organizations committed to better serving patients and their families, physicians with privileges at TMC have access to the latest Mayo Clinic expertise and clinical care resources through a formal collaboration. Online resources, electronic consults and patient education material all

help support physicians in their efforts to serve patients as close to home as possible.

TMC is also deeply engaged in population health services, taking our expertise from outside the walls of the hospital or the primary care office and into the community.

As the sole hospital member in two accountable care organizations, TMC is participating in efforts to expand direct outreach to patients to identify and solve barriers to wellness and care. How safe is a patient's home environment? Does that patient have groceries? Does that patient have transportation to get to their doctor's office or to pick up prescriptions?

TMC One, for example, has a care coordinator who calls complex patients who are overdue for important exams and services, and we have a new patient ambassador who can "match" patients with prospective providers based on preferences such as gender, training and office location. Additionally, because primary care is the first line of defense in maintaining wellness, Emergency Department check with patients upon discharge to see if they have a primary care provider – and provide resources to assist them in finding a provider if not.

Community outreach:

Tucson Medical Center was a founding member in the collaborative effort SoAzCares. The effort, which included Southern Arizona's major healthcare providers and other concerned organizations, worked to improve and streamline access to information and healthcare insurance.

Tucson Medical Center currently has 14 Certified Application Counselors who work with enrollment during the open enrollment period, as well as a dedicated team member who serves as part of the Affordable Care Act Coalition, along with Pima County Health Department and many other community stake holders. The team creates and supports enrollment events and collaborates with the community at large to get the word out on healthcare coverage and enrollment.

To date, TMC's counselors have assisted hundreds of consumers in health care enrollment and/or education.

Future state:

TMC One intends to explore expanding its use of technology, steering patients to check in on electronic tablets, pay their co-pays from the convenience of their chair in the lobby and fill out medical forms electronically that will interface with TMC One's electronic medical record.

Aside from improving patient experience and satisfaction, such efficiencies may allow providers more time to serve patients instead of investing as many resources on the front-end administrative work.

With emergency visits increasing by more than 17 percent over the past four years, TMC is highly focused on improving efficiencies. As one mechanism to streamline care, TMC will evaluate the viability of having patients register online prior to visiting the emergency department.

Community Health Needs not addressed by TMC

Of the priority health needs identified in the Community Health Needs Assessment, Tucson Medical Center is not as strongly equipped to address some of the areas highlighted in the report. It is not our intention to be dismissive of the importance of any given health need, but we also recognize that resource constraints require prioritization so TMC can best concentrate on making positive changes in areas of strength.

Dental and oral health needs. Although this area of concern also made the top 10 list of community health needs, and although those suffering from dental needs do present in our emergency room and we provide service to the best degree possible, we are not as an institution equipped or certified to provide dental care.

Direct substance abuse treatment. Although TMC's preventive efforts, particularly in our work with youth and adolescents, as well as our other wellness efforts for adults likely have a preventive effect on substance abuse, we do not offer detoxification services and do not specifically offer substance abuse treatment. We are confident, however, that our community partners do offer effective services and we actively refer to those existing resources as needed.

Tobacco cessation. Pima County performs better than the state in a number of risk behaviors, to include tobacco use. Even so, tobacco use is a key contributing factor for many disease states that ultimately require hospitalization. Other state and local resources, including health insurance plans, do offer cessation programs for those actively seeking assistance in halting smoking.

Implementation, monitoring and evaluation

Tucson Medical Center is committed to continuous review and evaluation of strategies to address the outstanding health needs identified by this process.

TMC will establish a Community Benefit Committee with physician and community representation to assist TMC's Vice President for Community Benefit in monitoring, tracking and adapting the implementation plan as appropriate to each strategy. Metrics may include:

- Grant funding received and allocated
- Numbers of community members served, as well as overarching demographics
- Volunteer hours invested
- Number of community lectures provided

A performance review will be published and provided to the Board of Trustees and made available on Tucson Medical Center's website.

Additionally, TMC recognizes that this health assessment and implementation plan are living documents, that may evolve as health needs and priorities change. TMC also will continue to work with community partners to identify gaps in service and seek ways, where possible and appropriate, to better address priority health needs.

TMC Community Benefit Statistics

2015 Community Benefit

TMC will report more than \$56 million in community benefit and charity care for 2015, or about 11.8 percent of net revenues. In the previous year, TMC reported a community benefit of 12.7 percent of net revenues. TMC calculates community benefit using standards endorsed by the American Hospital Association.

Community Benefit

Outreach & Education	\$ 4,951,023	9%
Uncompensated Care (Charity Care & Bad Debt)	\$ 7,994,526	14%
Unpaid Costs	\$ 31,816,000	57%
Hospital Assessment	\$ 11,409,626	20%
Total	\$ 56,171,175	100%
Total Community Benefit as Percentage of Net Revenue (based on Net Revenue of \$476,458,883)		11.8%

Community Benefit Trends

2014	\$56 million	12.7%
2013	\$53 million	12.4%
2012	\$48 million	11.4%
2011	\$38 million	9.7%

What Makes Up This Number?

Unpaid Costs: TMC provides services to patients covered by AHCCCS and other public programs for people with low incomes. This is the shortfall created when a facility receives payments that are less than the cost of caring for public-program beneficiaries.

Uncompensated Cost of Care for Charity Care, Bad Debt & Discounts for the Uninsured: Charity care is free or discounted health services provided to people who can demonstrate that they do not have the means to pay the full cost of care and who meet the organization's financial-assistance policy criteria.

Bad debt consists of services for which the hospital anticipated but did not receive payment. Recognizing that self-pay patients who do not have health insurance are not in the same position as insurance companies to negotiate reduced rates, TMC discounts these patients' bills by half; and, depending on a patient's income, other discounts may apply as part of TMC's Community Care program. For purposes of community benefit reporting, charity care, bad debt and uninsured discounts are reported in terms of costs, not charges.

For more information about TMC's charity care policy, visit www.tmc.az.com/community-care.

Hospital Assessment: In 2014, hospitals in Arizona were assessed by the state to help fund the cost of expanding AHCCCS services to an additional 336,000 low-income residents.

Outreach & Education: This figure includes community benefit programs and activities that provide treatment or promote health and healing as a response to identified community needs. These programs and activities help improve access to health care services, enhance the health of the community and advance medical knowledge.