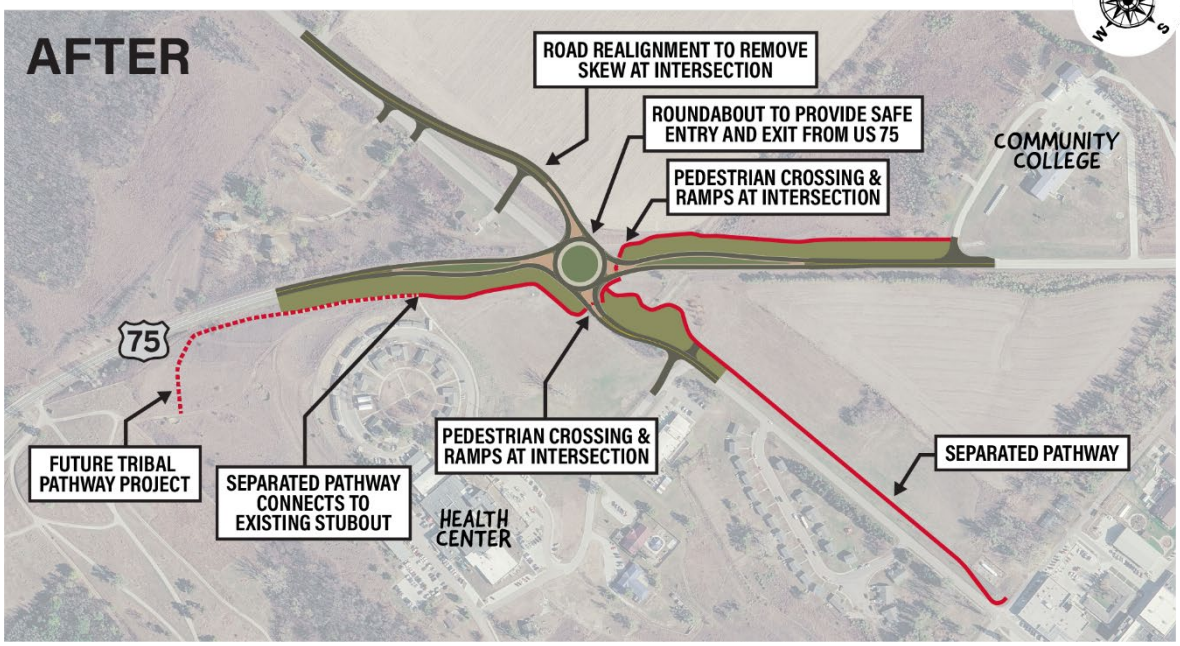
Merit Criteria

The Macy Intersection and Pathway Improvements Project (the Project) addresses long-standing safety, mobility, and connectivity challenges in Macy, Nebraska, the headquarters of the Omaha Reservation served by US Highway 75 (US 75), the Reservation's primary transportation corridor. The existing US 75/Main Street intersection has steep grades, limited sight distance, high-speed approaches, and a complete lack of pedestrian infrastructure, creating significant hazards for residents, students, and Tribal employees who rely on it daily. The Project will replace this unsafe intersection with a modern single-lane roundabout designed to calm speeds





from 65 mph to approximately 20 mph and improve visibility by lowering the roadway profile by about 15 feet and softening vertical curves and approach grades. To address non-motorized travel, the Project will construct a fully integrated, ADA-compliant shared-use path network connecting the roundabout with the Health Center, Main Street, and the Nebraska Indian Community College, complete with detectable warning surfaces, lighting, and appropriate accessibility treatments at all pedestrian crossings. When complete, the Project will significantly improve safety for vulnerable road users, modernize aging infrastructure, enhance multimodal access to businesses and community services, and expand high-quality pedestrian facilities that support active transportation throughout the Macy community.

SAFETY

The US 75 and Main Street intersection in Macy is one of the most hazardous locations on the Omaha Reservation due to high travel speeds, skewed geometry, steep grades, and limited sight distance. Vehicles currently enter the intersection at 65 mph, a speed incompatible with the constrained layout and turning movements required at this rural crossing. These conditions create an environment in which even everyday driving maneuvers, such as turning left from Main Street onto US 75, carry elevated crash risk. The absence of sidewalks, shoulders, or protected crossings further exposes pedestrians, especially children, elders, and those traveling to the Carl T. Curtis Health Center and Nebraska Indian Community College, to dangerous conflicts with fast-moving vehicles.

The severity of these risks is reflected by recent local crash history at the intersection and along the US 75 corridor near Macy. On October 4, 2024, a fatal rollover crash occurred directly south of the intersection. The vehicle had turned from US 75 onto Main Street, lost control, and overturned. Just south of the community, a fatal rollover crash occurred when a driver lost control on US 75, highlighting the corridor's vulnerability to high-speed, high-severity incidents. In another fatal crash in Thurston County, two women—including a Macy resident—were killed when their vehicle left US 75 and rolled down an embankment, demonstrating the lethal consequences of speed, steep elevation changes, and limited recovery area along this corridor. These crashes underscore a clear and urgent need for geometric corrections, speed reduction, and safer multimodal facilities throughout the corridor.

Crashes among all severities at the intersection are forecasted to **decrease 72 percent** for all crash types. The slowdown effect from the proposed roundabout on either side of the intersection is expected to produce a wide range of reductions based on crash severity and proximity to the intersection. Overall, the forecast projects a 38 percent reduction in crashes along US 75 throughout Macy, NE.

The proposed modern roundabout is an FHWA Proven Safety Countermeasure that directly responds to these risks. By reducing approach speeds from 65 mph to approximately 20 mph, the

roundabout dramatically lowers the likelihood and severity of crashes. National research from FHWA shows that modern roundabouts reduce fatal and injury crashes by an average of 82%[1], primarily due to speed moderation and fewer conflict points. Insurance Institute for Highway Safety (IIHS) studies[2] further demonstrate that converting traditional intersections to roundabouts results in a 90% reduction in fatal crashes, 75% reduction in injury crashes, and a 37% reduction in total crashes, especially significant in high-speed rural environments such as US 75. Additionally, roundabouts reduce traffic delays by 62–74%, improving operational flow and reducing idling times. These statistics align with the Benefit Cost Analysis (BCA) drafted for the project.

The Project also addresses critical sight-distance and grade-related safety deficiencies. By lowering the US 75 profile by approximately 15 feet and flattening steep vertical curves, drivers gain greater reaction time and improved visibility of approaching traffic, pedestrians, and cyclists. This correction is especially important for vehicles turning from Main Street, which currently experience limited sight distance and unpredictable merging conditions.

The Project will deliver significant safety gains for pedestrians and bicyclists by providing ADA-compliant shared-use pathways, roundabout pedestrian crossings, and lighting along the project corridor. Currently, non-motorized travelers must share the highway shoulder, or walk directly on the roadway, along US 75 and Main Ave, despite the presence of high-speed traffic. The project introduces separated pathways, lighting, shorter crossing distances, and splitter islands that create refuge areas for pedestrians and reduce crossing exposure. National research from IIHS confirms that roundabouts reduce pedestrian crashes by roughly 40%[3], making them significantly safer for vulnerable users. These treatments are essential for students walking to UMÓⁿHOⁿ Nation Public Schools, families accessing tribal services, and patients traveling to the Carl T. Curtis Health Center.



[1] https://highways.dot.gov/sites/fhwa.dot.gov/files/National Roundabouts Week Factsheet 2025.pdf
[2] https://www.iihs.org/research-areas/roundabouts
[3] https://www.iihs.org/research-areas/roundabouts

Together, these improvements transform a high-risk intersection into a safer, more efficient, and more accessible multimodal gateway for the Omaha Reservation. Lower speeds, better sight distance, protected pedestrian facilities, and reduced conflict points will dramatically reduce the likelihood and severity of crashes while improving connectivity to healthcare, education, and commercial services for the Macy community.

SAFETY ISSUE (EXISTING)	POST PROJECT IMPROVEMENT	EXPECTED IMPACT
65 mph approach speeds	Roundabout reduces speed to ~20 mph	Major reduction in crash severity (82–90% lower fatal/serious injury risk)
Limited sight distance due to steep grades	Roadway lowered 15 feet, flatter vertical curves	Improved reaction time, safer turning movements
Skewed intersection with high energy conflict points	Modern roundabout geometry reduces conflict points from 32 to 8	Fewer opportunities for right angle/left turn crashes
No sidewalks, shoulders, or protected crossings	Separated, lighted, ADA compliant shared use paths, splitter islands	Reduced pedestrian crash exposure by ~40%
Stop controlled delay	Yield controlled continuous movement	Up to 62–74% reduction in delay

ENVIRONMENTAL SUSTAINABILITY

The Project enhances environmental sustainability by increasing infrastructure resilience, improving stormwater and erosion controls, and using native vegetation to support long-term resilience on the Omaha Reservation.

The roundabout will be constructed using concrete pavement. The use of concrete pavement is a deliberate resilience strategy, as concrete offers superior performance under extreme temperature swings, flooding, freeze–thaw cycles, and high-load stress conditions common in the region. Its longer service life and reduced susceptibility to rutting, heaving, and surface degradation directly lower lifecycle maintenance needs and ensure continued operational reliability during and after severe weather events. Using a pavement structure with higher inherent durability also reduces the frequency of repair work, minimizing disruptions to emergency access routes that are critical during natural disasters.

The Project will incorporate significant drainage and erosion-control improvements, supporting long-term resilience and environmental quality. Reconstruction of the US 75 profile, lowered by approximately 15 feet, allows a redesigned stormwater system that reduces uncontrolled runoff and sediment transport in the area. The installation of upgraded culverts, storm inlets, ditches, and erosion-control treatments (including slope stabilization, vegetation, and sediment controls)

helps prevent soil loss and mitigates the spread of sediment into adjacent grasslands and culturally important lands. These enhancements are crucial for the rolling-grassland terrain surrounding Macy, where unmanaged runoff can create gully erosion, degrade habitat, and weaken the roadway structure over time. Temporary and permanent best-management practices will reduce sediment transport during construction and create a more stable roadway footprint after completion. By improving stormwater management, the Project contributes to long-term hydrologic stability, helps protect natural resources on Tribal lands, and reduces the maintenance burden on the Omaha Tribe and NDOT.



Following construction, the Project will incorporate native vegetation replanting along embankments and all disturbed areas to restore ecological function and enhance long-term environmental resilience. Native plant species are uniquely adapted to the Reservation's climate, soil, and hydrologic conditions, allowing them to thrive with minimal irrigation or maintenance compared to non-native species. Their deep-rooted structures improve stormwater absorption, increase slope stability, and reduce long-term erosion risks. Native vegetation also provides broad ecological benefits, including biodiversity support, pollinator habitat, and enhanced soil health through increased organic matter production. By re-establishing these plant communities, the Project will strengthen the local ecosystem while reinforcing the long-term durability of the roadway, drainage channels, and shared-use path infrastructure.

QUALITY OF LIFE

The Project will significantly enhance the daily quality of life by providing safe, affordable, ADA-compliant access to health care, education, and essential services for a predominantly Native and high-poverty, very young community. Macy's population is 97% American Indian/Alaska Native, with a median age of about 20.6 and poverty rate near 51%, making improvements to low-cost, reliable transportation options particularly important for households already facing substantial economic hardship.

The Project significantly improves walkability, accessibility, and independent mobility for residents of all ages and abilities. The new shared-use pathways incorporate appropriate cross-slopes, grades, lighting, signage, and detectable warning surfaces at crossing points. These improvements will make it easier for individuals with disabilities, elders, and caregivers to navigate Macy safely and independently. The roundabout's splitter islands will provide refuge areas and shorten crossing distances, while lower travel speeds simplify decision-making for pedestrians and cyclists. Research shows that roundabouts reduce pedestrian conflicts and improve safety for vulnerable users by reducing vehicle speeds and conflict points.

The shared-use pathways will connect residents to the Carl T. Curtis Health Center, located on Senior Circle in Macy, allowing patients, families, and caregivers to reach primary care safely without needing a vehicle or arranging costly rides. Access to education is also improved through safe, continuous pathway to the Nebraska Indian Community College (NICC), which enrolls more than 600 students[4], most of whom are local tribal members pursuing undergraduate studies on the Macy campus. By enabling reliable access to healthcare and education, two critical building blocks for community well-being, the Project will reduce transportation barriers that contribute to missed appointments, poor health outcomes, and obstacles to higher education.

The combination of slower vehicle speeds, safer crossings, improved sight distance, and protected pathways reduces barriers to participation in education, health services, cultural events, and employment. For a rural community like Macy, these improvements enhance self-sufficiency and quality of life by making everyday travel safer, healthier, and more affordable.

The Project also enhances quality of life by making everyday transportation more affordable and efficient through substantial reductions in vehicle idling and stop-and-go driving. Under current conditions, the stop-controlled intersection at US-75 and Main Street forces drivers to brake abruptly, wait in long queues, and accelerate hard to re-enter high-speed traffic—patterns that increase fuel consumption, elevate operating costs, and accelerate vehicle wear. These effects are well-documented: national studies show that unnecessary idling and repeated acceleration cycles significantly increase fuel use, with the U.S. Alternative Fuels Data Center noting that idling for more than 10 seconds uses more fuel than restarting the engine, and that personal-vehicle idling wastes roughly 3 billion gallons of fuel annually nationwide[5]. Converting this intersection to a modern roundabout will replace these fuel-intensive movements with smooth, continuous flow at controlled speeds.

Completion of the project will deliver transformative benefits for the Omaha Reservation. By expanding access to essential services, improving ADA-compliant mobility, and reducing household transportation burdens, the Project directly supports the merit criterion and improves the travel experience for all users.



[4] NICC - Student Population and Demographics
[5] https://afdc.energy.gov/files/u/publication/idling_personal_vehicles.pdf

MOBILITY AND COMMUNITY CONNECTIVITY

Macy serves as the central hub for the Omaha Tribe of Nebraska, a federally recognized Indian Tribe with a reservation population of approximately 2,459 residents, an enrolled membership of 7,206, and 27,828 acres of trust land. Tribal government offices, essential services, and key community institutions are all located in Macy, making safe and reliable access through this intersection vital to daily life across the Reservation.

The Project substantially improves mobility and community connectivity throughout the community by creating a safe, reliable, and ADA-compliant multimodal network linking the community's most critical destinations. Currently, residents traveling between the Carl T. Curtis Health Center, Main Street businesses, and the Nebraska Indian Community College (NICC) face significant barriers due to high-speed traffic, the absence of sidewalks or shoulders, and limited sight distance along US-75. The new shared-use pathways directly address these challenges by providing continuous, separated, ADA-compliant facilities that enable residents of all ages and abilities to walk or bike safely between these essential locations and demonstrate the importance of strengthening multimodal access within this compact but vital community hub.



Lack of pedestrian access or shoulders to NICC

By shifting pedestrians and bicyclists onto fully separated shared-use pathways, the Project also removes foot traffic from the roadway itself, reducing vehicle–pedestrian conflicts and minimizing the slow-downs drivers experience today when yielding or maneuvering around vulnerable users. This change directly improves traffic flow and helps decrease localized congestion for motor vehicles, especially along US-75 where sight distance is limited and shoulder space is nonexistent.

These pathways replace the current shoulder-less, unsafe walking routes along US-75, providing year-round, ADA-compliant access consistent with Public Rights-of-Way Accessibility Guidelines (PROWAG). They enhance safety and independence for residents in a community that is 97% American Indian/Alaska Native, has a median age of just 20.6, and experiences poverty rates approaching 51%, as documented in Census-derived demographic sources. For a high-poverty and very young population with limited access to private vehicles, improving affordable walking and biking options significantly improves daily mobility and equitable access to health care, education, and commercial services.

The Project also strengthens regional and local corridor reliability by replacing the existing all-way stop configuration with a modern roundabout that eliminates the stop-and-wait delay cycles that currently affect US-75 through-traffic and local turning movements. FHWA research confirms that roundabouts reduce delays and queues by approximately 62–74%, supporting

smoother and more predictable travel for daily users and regional trips along this primary north-south corridor through the Omaha Reservation. This improvement is especially meaningful on US-75, which carries steady two-lane rural highway traffic and serves as the main connection between Winnebago, Macy, and Decatur. Faster, more reliable vehicle flow not only benefits commuters and service providers but also improves emergency response times and operational dependability for the Health Center and tribal services.

The roundabout's continuous-flow design also reduces abrupt stops, hard accelerations, and driver uncertainty, improving comfort and operational safety for all travelers. These conditions are shown to enhance both mobility and community connectivity by ensuring that residents can make short, local trips without encountering excessive delay, unpredictable queues, or hazardous crossing conditions.

Together, these improvements remove physical barriers for non-motorized users and create a connected multimodal network that unites the Reservation's educational, health, residential, and commercial centers, enabling residents to move affordably, safely, and reliably throughout their community. By enhancing non-motorized mobility, reducing travel delay, and improving corridor consistency, the Project delivers transformative connectivity benefits that directly meet the merit criteria and improves the connectivity for all users.

ECONOMIC COMPETITIVENESS AND OPPORTUNITY

The Project strengthens the economic competitiveness of the Omaha Reservation by enhancing the safety, efficiency, and reliability of US-75, the principal north–south corridor, supporting local businesses, freight movement, tourism, and Tribal services. Unreliable operations at the US-75/Main Street intersection impose costs on residents, commercial vehicles, and visitors due to delays, conflict-prone turning movements, and periodic disruptions. By replacing the current intersection with a modern roundabout, the Project improves corridor reliability and keeps the Reservation's primary economic roadway moving smoothly, reducing operational delays that affect both local commerce and regional travel.

US-75 is the backbone of mobility on the Omaha Reservation, serving residents traveling between Macy, Winnebago, and Decatur while also carrying regional visitors and commercial traffic. Continuous movement at Macy intersection will reduce detours or slowdowns that happen through the corridor, ensuring steady customer access to Main Street businesses and uninterrupted travel for employees and Tribal service providers. Roundabouts reduce delay by 62–74%, providing more predictable flow for commercial vehicles and improving cost efficiency for the movement of goods and workers traveling to and from Macy's economic centers. These improvements translate directly into economic returns: fewer disruptions for businesses, more reliable travel for workforce and freight movement, and a safer environment for residents and visitors.

Local businesses and Tribal service centers along Main Street benefit directly from safer turns, lower crash risk, and improved visibility at the redesigned intersection. Reducing the opportunity of high-severity crashes lowers service disruptions and creates a more stable operating

environment for small businesses and Tribal programs that depend on reliable access for employees, clients, and suppliers.

Improved student and staff mobility to the Nebraska Indian Community College (NICC) enhances workforce development, increases economic opportunities, and strengthens long-term regional competitiveness. NICC's Macy campus enrolls more than 600 undergraduate students, providing certificates and degrees that feed directly into the regional workforce. Safe, ADA-compliant multimodal access between residential areas, the Health Center, Main Street, and NICC expands the pool of students able to attend classes regularly and reduces transportation barriers that can impact retention and graduation[6]. According to a study conducted by Trellis Strategies[7], walking has been identified as the dominant mode of transportation for students living up to 1.5 miles from a small-town campus. Reliable pathways also facilitate staff recruitment and retention by providing safer commuting options within Macy's core employment area.


Hede' Wachi Annual Powwow

Tourism is a vital component of the Macy area economy, driven by culturally significant and outdoor recreation destinations. Macy hosts the nationally recognized Hede' Wachi Annual Powwow, held at Little Warrior Park and celebrated as the oldest documented continuous celebration in the country. The four-day event attracts large regional audiences and includes substantial dance and drum contest prizes, highlighting its role as a major cultural, community, and economic draw. Reliable, safe, and accessible travel to and within Macy will make the powwow more welcoming for attendees, while the new ADA-compliant paths provide safer walking routes between parking areas, Main Street, and event spaces.

The Reservation also features Big Elk Park, just North of Macy, a major outdoor recreation site with cabin rentals, river access, fishing, hunting, and over 30 miles of ATV trails, making it a popular destination for campers, anglers, and outdoor enthusiasts. Reliable access through Macy improves the visitor experience, reduces travel stress, and strengthens tourism-related revenue opportunities for Tribal businesses and local entrepreneurs.

[6] https://www.torontomu.ca/news-events/news/2022/06/research-says-commute-impacts-your-academic-success
[7] https://www.trellisstrategies.org/wp-content/uploads/dlm_uploads/2023/11/Toolkit_Transportation_FINAL.pdf

STATE OF GOOD REPAIR



Lack of shoulders and deterioration on US 75

The Project will reconstruct a vital corridor of the Omaha Reservation's transportation network into a state of good repair by modernizing a deficient, high-maintenance intersection and constructing durable, long-life assets that reduce future maintenance burdens. The existing US-75/Main Street intersection suffers from steep grades, poor geometry, and repeated pavement distresses caused by high-speed turning movements and suboptimal drainage. These conditions increase long-term maintenance needs and raise the likelihood of unplanned repairs that disrupt travel. By reconstructing this location as a modern single-lane roundabout, the Project eliminates outdated, high-maintenance infrastructure and replaces it with a design that is safer, more resilient, and significantly less costly to maintain over its lifecycle.

A central component of the Project's state-of-good-repair strategy is its concrete pavement design. Concrete provides a long-life structural base capable of withstanding heavy vehicles, freeze-thaw cycles, and thermal stress without the rutting, cracking, and frequent resurfacing associated with asphalt pavements. This design choice directly reduces lifecycle costs by limiting the need for periodic overlays, patching, and emergency repairs[8]. Unlike signalized intersections, the roundabout configuration also eliminates the need for signal hardware, poles, or cabinet equipment, removing a substantial long-term maintenance and energy burden. With no signal equipment to maintain or replace the upgraded intersection will remain operational during storm-related outages and extreme weather—an important reliability benefit in rural areas.



US75/Main St Intersection with steep approach grade

The Project also strengthens the long-term asset condition of the corridor through improved geometrics and drainage. Lowering the US-75 profile by approximately 15 feet and reshaping steep approach grades improves pavement performance by removing vertical drop-offs, reducing hydroplaning potential, and supporting more consistent load distribution. Upgraded culverts, ditches, and stormwater inlets reduce water infiltration and erosion, extending pavement life and reducing the frequency of shoulder and slope repairs. Combined with stabilized embankments and native vegetation replanting, these improvements support a more resilient roadway system that is less vulnerable to washouts, freeze-thaw damage, and severe storms.

[8] American Concrete Pavement Association-Concrete Roundabouts

Upon completion, the NDOT will assume full responsibility for maintaining the roundabout within the project limits, ensuring long-term stewardship of this investment. NDOT will perform routine inspections, seal joints as needed and apply preventive maintenance practices consistent with its existing standards for similar concrete roundabout facilities statewide. NDOT has identified infrastructure preservation as a core departmental priority, and the agency's established asset-management protocols will ensure the new roundabout remains in a state of good repair throughout its service life. A separate agreement between NDOT and the Omaha Tribe will ensure the shared-use pathways and lighting systems are also maintained to high standards, protecting the long-term functionality of the multimodal network built as part of the Project.

The Project will modernize a structurally deficient and operationally outdated intersection, reduce ongoing maintenance costs, and create durable, resilient infrastructure for a remote Tribal community. By lowering long-term repair needs, improving reliability, and embedding preventive maintenance into NDOT's stewardship, the Project meets and advances the merit criterion and ensures that essential community infrastructure remains safe, stable, and functional for decades to come.

PARTNERSHIP AND COLLABORATION

The Project reflects a strong and continued partnership among the Tribe, NDOT, BIA, and the community of Macy. This collaboration is grounded in years of coordinated planning, transparent public engagement, and shared commitment to addressing critical safety and mobility needs on US-75. The Tribe's leadership in long-range transportation planning forms the foundation of this partnership. The 2019 Omaha Tribe Long Range Transportation Plan (LRTP), developed through extensive public involvement including posted notices, community outreach, and a stakeholder meeting on February 7, 2019, documented the community's desire for safer roadways, improved pathways, and intersection upgrades. The LRTP established a framework for collaboration between the Tribe, BIA, and NDOT to advance priority projects such as the US-75/Main Street improvements.

Building upon the LRTP, the Tribe initiated a robust Capital Improvement Plan (CIP) process in 2024–2025 to prioritize projects, refine cost estimates, and gather community input. The CIP was introduced to Tribal Council on December 17, 2024, followed by a draft review on July 22, 2025. To ensure community engagement beyond formal meetings, the Tribe hosted an all-day outreach booth at the Macy Powwow on August 2, 2025, distributing project flyers, collecting public comments, and sharing project posters with hundreds of attendees. A comprehensive update on the roundabout and full CIP was then provided to Tribal Council on December 11, 2025, reinforcing transparent decision-making and continued leadership involvement. The final CIP is intended to be a living document that will be updated and reviewed annually to include not only transportation



projects but eventually incorporate assets and other infrastructure projects such as facilities, land improvements, utilities, and technology. Through the robust engagement process, the community most impacted by the Project are aware of the need and are in support, evidenced by the numerous letters of support for the project.

Throughout the project's development, the Omaha Tribe, their consultant engineer, and NDOT have maintained a close working partnership. NDOT began planning and design efforts for the roundabout in May 2023, and coordination meetings between NDOT, the Tribe, and the consultant engineer have continued through design development, environmental review, and right-of-way planning. The roundabout is now progressing toward final design and ROW completion by mid-2026, with construction available to begin in spring 2027. This multi-year collaboration ensures that engineering, cultural, and community considerations are fully embedded in the project.

The Project will advance workforce development by creating meaningful training, hiring, and long-term employment opportunities for Tribal members. With Macy's high unemployment rate and its location in a rural area of persistent poverty, the jobs created during roadway paving, grading, concrete work, and pavement sealing will provide immediate economic benefits and pathways to lasting careers in the construction trades. In accordance with the OTN Tribal Employment Rights Office (TERO) requirements, contractors working on the Project must give preference opportunities to qualified Tribal members for hiring and on-the-job training. This ensures that project dollars support local families, help build skills in high-demand trades, and strengthen the Tribe's capacity for future infrastructure work. Past construction projects on the Reservation demonstrate the effectiveness of this model as many individuals hired under TERO preferences have continued long-term employment with construction companies, contributing to improved job stability, strengthened workforce retention, and expanded economic opportunity for Tribal members.

Federal, Tribal, and state coordination has also played a critical role in funding readiness. The Tribe's initiation of pursuing funding for planning support, including previous RAISE planning funds, has strengthened project documentation, environmental preparation, cost estimating, and engineering specifications, ensuring that the project advances in alignment with federal expectations and is ready to move to construction. Together, these efforts demonstrate an effective partnership that continues to guide the Project toward implementation. The long-standing cooperation between NDOT and the Omaha Tribe ensures that once constructed, the improved US-75/Main Street intersection and shared-use pathways will be supported by continued operations and maintenance—providing safe, reliable access for Macy residents, Tribal programs, businesses, and the traveling public.

INNOVATION

The Project integrates a coordinated set of innovative, safety-forward features that enhance driver awareness, improve multimodal safety, and create a predictable, intuitive travel environment at one of the Reservation's highest-risk intersections. Although the technologies used are not emerging in the national marketplace, they represent FHWA-designated Proven

Safety Countermeasures intentionally applied to a rural setting where they will produce measurable, high-impact gains. Modern roundabouts are formally recognized by FHWA as a Proven Safety Countermeasure due to their ability to reduce fatal and serious-injury crashes through speed moderation, reduced conflict points, and continuous flow. Deploying this nationally recognized best practice at a rural, high-speed intersection constitutes a meaningful innovation in its application for Tribal and isolated communities.



The Project also incorporates several supportive innovative features to reinforce safety and operational performance. Approaches to the roundabout will include radar speed-feedback signs, which display real-time vehicle speeds and prompt drivers to slow before entering the roundabout's controlled-speed environment. These devices are well-documented for improving compliance with advisory speeds and reducing approach-speed variability—critical benefits given the current 65-mph travel speeds along US-75.

To enhance multimodal safety, the Project will install high-visibility pedestrian crosswalk treatments, enhanced lighting, and pedestrian-activated crosswalk signals or beacons, ensuring drivers receive strong visual and auditory cues when pedestrians are present. Crosswalks are paired with splitter-island refuge areas, allowing pedestrians, including elders, families, and NICC students, to cross one direction of traffic at a time at a slower, more predictable vehicle speed. Detectable warning surfaces will also guide pedestrians with visual or mobility impairments.



Collectively, these integrated features form a safety-driven design that improves driver reaction, reduces speeding, strengthens pedestrian visibility, and enhances overall system performance. By combining a FHWA-recognized Proven Safety Countermeasure with modern speed-management tools and high-visibility pedestrian infrastructure, the Project delivers innovative, evidence-based solutions tailored to the unique needs of a rural Tribal community, ultimately producing a safer, more reliable transportation environment for all users.

The Project also demonstrates innovation in delivery through NDOT's early coordination with the Omaha Tribe and its decision to advance the roundabout and associated pathways using a streamlined design-bid-build approach that aligns with NDOT's established processes for rural safety projects. Environmental consultations have already been completed to accelerate readiness and reduce administrative delays. The combination of NDOT's proven delivery process and early environmental clearance ensures the Project can be implemented efficiently and move forward quickly if grant funds are awarded.