POTENTIAL IMPACTS

No wetland and/or other water resource impacts are anticipated. Red Cloud City Park is within the project area; impacts are anticipated due to sidewalk and curb work.

Effects to historic properties are being evaluated and the proposed project is seeking ways to avoid adversely affecting historic properties. Comments related to historic properties would be taken at the open house public meeting.

TRAFFIC VOLUMES

Average traffic forecast volumes for US-281 and US-136 in Red Cloud.

US-281 (1 st Ave to 11 th Ave)				
Year	2025	2035	2045	
Vehicles Per Day (ADT)	1880	1890	1900	
Design Hourly Volume	280	280	280	
% Heavy Trucks	8	8	8	

US-136 (Cedar St. to Elm St.)				
Year	2025	2035	2045	
Vehicles Per Day (ADT)	1525	1540	1555	
Design Hourly Volume	250	250	250	
% Heavy Trucks	10	10	10	

CONSTRUCTION SCHEDULE

Construction could begin as early as summer 2025 and be completed by summer 2026.

ACCOMMODATION OF TRAFFIC

The proposed project would not be constructed under traffic and would require detouring traffic for the duration of the project to accommodate the proposed work. A designated detour would be provided along the state highway system. A final detour determination would be made during final design.

Access to adjacent properties and on street parking will be restricted at times due to construction phasing.

ESTIMATED COST

The estimated cost of the proposed project would range from approximately \$5.9 million to \$7.3 million depending on the alternative selected, and would derive from federal and state funding sources.

Local funds would also be required if brick pavers are used beyond the boundaries of the historic district and for any construction of streetscape enhancements and utility betterments.

FEEDBACK

Send Comments or Ouestions to:

Sarah Fisher, NDOT Public Involvement 1500 Highway 2 PO Box 94759 Lincoln, NE 68509-4759 402.479.3832 sarah.fisher@nebraska.gov



For More Information:

Wes Wahlgren, NDOT District 4 Engineer 211 N. Tilden Street Grand Island, NE 68802 308.385.6265 wes.wahlgren@nebraska.gov

NEBRASKA

DEPARTMENT OF TRANSPORTATION

STP-281-1(117); C.N. 42619

In Red Cloud **PROJECT INFORMATION SHEET**



PROJECT LOCATION

This proposed project within the city of Red Cloud in Webster County would reconstruct or resurface:

- Approximately 0.68 miles of US-281 starting near 1st Avenue at mile marker (MM) 5.82 and extending north to 11th Avenue at MM 6.55.
- Approximately 0.15 miles of US-136 starting west of Cedar Street at MM 75.22 and extending east to Elm Street at MM 75.39.

PURPOSE & NEED

The purpose of this proposed project is to preserve the transportation asset, improve the reliability of the transportation system, and perpetuate the

The purpose of this meeting is to present the preliminary preferred alternative and proposed improvements to U.S. Highway 281 (US-281) & U.S. Highway 136 (US-136).

mobility of the traveling public. The need for this proposed project is based on the current condition of the roadway.

SCOPE OF WORK

Proposed improvements would consist of pavement reconstruction. New pavement could include brick or concrete pavers. Additional work would include replacement or installation of storm sewer, underdrains, sidewalks, curb ramps, lighting, utilities, and permanent pavement markings.

RIGHT-OF-WAY

The proposed project would require the acquisition of additional property rights, which could include new right-of-way (ROW), control of access (CA), permanent easements (PE), and/or temporary easements (TE). If your property is impacted by this project, you will be contacted by a representative once the design footprint has been established. Access to adjacent properties would be maintained during construction but may be limited at times due to phasing requirements. On-street parking would be restricted at times due to construction phasing



Open House Public Meeting

Thursday, September 29, 2022 4:00 - 6:00 p.m. CST

Community Center, 142 W 3rd Avenue, Red Cloud, NE 68970



Existing Brick Surface:

- 3" thick bricks on 1" of sand bedding on 5" concrete base
- Constructed in 1917
- An estimated 750,000 bricks within project limits

2015 Condition Assessment:

- Majority of bricks exhibit corner breaks and/or rounded edges from years of traffic and weather
- Areas of significant deterioration are present
- Areas of vertical and horizontal displacement present
- Many bricks have subsurface damage
- Reasonably whole bricks passed structural testing, though bricks with visible deterioration were not tested



Significant deterioration Horizontal/vertical displacement



Damage on underside of bricks, not visible from surface

Can the Existing Bricks be Reused?

The existing bricks cannot be reused based on the findings of the 2015 condition assessment. Brick pavements rely on the interlock between bricks to distribute loads. Bricks must have 2-5/8" thickness to achieve appropriate interlock, which is critical to avoid shifting and displacement. The 2015 condition assessment showed that approximately 65-75% of the bricks do not meet the required thickness needed. Additionally, the years of wear and tear have created a wide variance in individual brick dimensions, decreasing likelihood of achieving appropriate interlock.

What will Happen to the Existing Brick?

The existing bricks would be removed and become property of the contractor unless interest from other parties is known.

PROPOSED PROJECT BRICK AI TERNATIVES

In downtown Red Cloud, the existing asphalt, brick, and concrete would be removed and replaced. The existing pavement north and west of the downtown area would be removed and replaced with concrete pavement. Within the historic district, five alternatives are currently under consideration including a preliminary preferred alternative.









ALTERNATIVE 4: Brick in Roadway,





