1.0 | Project Summary Information

1.1 Project Name (35 letters max) 8000 South 3200 West Intersection and right-of-way

1.2 Project Type Intersection Work

1.3 Limits (descriptions should be identifiable. i.e: intersections, place names, landmarks, 35 characters max) 3200 West to I-15

1.4 Project Description (summary of project) Project begins at 3200 West and reconstructs the existing T-intersection and the roadway approx. 750 feet to the east. The project would also acquire right-of-way along 8000 South between 3200 West and I-15, approx. 1.4 miles

1.5 Sponsor (jurisdiction, agency name) Utah County

1.6 Contact Information
   Project Manager Richard Nielson
   Office Phone 801-851-8601
   Cell Phone 801-404-7010
   Fax 801-851-8612
   Email richardjn@utahcounty.gov

1.7 Cost Estimate
   Total Project Cost (include matches, pledged funds, etc.) $1,905,000
   MPO funding request (include any match) $1,905,000
   PE Cost $28,000
   ROW Cost $1,401,000
   Construction Cost $476,000
   Soft Match proposed for project Engineering, right-of-way acquisition, & Construction Management

1.8 Project Rank (rank this project compared to your other submittals) 1
1.9 Air Quality Benefit (summarize CM/AQ Report, NA for non-CM/AQ eligible projects)
n/a
2.0 | Project Scope
Always enter “NA” rather than leave an answer blank...

2.1 Describe purpose and need of project.
This project is needed to provide adequate turning radii for large trucks utilizing 8000 South to access I-15. The existing configuration of the intersection is too tight to provide safe intersection movements. The project will also acquire right-of-way along 8000 South for future widening.

2.2 Describe existing service/conditions
Existing right-of-way is 36 feet with 24 feet of asphalt. Trucks routinely cross into on-coming traffic lanes to maneuver the intersection.

2.3 Highway Project Information (for non-highway projects go to 2.4)

2.3.1 State Route # or Federal Aid Route #
Fed Aid # 2868

2.3.2 Beginning Mile Post
0

2.3.3 End Mile Post
1.42

2.3.4 Length of project
1.42 miles for right-of-way, 750 feet for intersection improvements

2.3.5 Existing and proposed number of Travel Lanes
There are two existing travel lanes with no shoulders. There are 3 lanes proposed with paved shoulders.

2.3.6 Current and proposed width of facility (detail ROW, lanes, shoulders, ped/planter).
Current right-of-way is 36 feet with 24 feet of asphalt. Proposed right-of-way is 106 feet with 54 feet of asphalt

2.3.7 Facility surface type.
Asphalt

2.3.8 Describe how project is consistent with local or agency plans.
8000 South is planned as an arterial roadway connecting 5600 West to I-15 and beyond to Spanish Fork Main Street. This is consistent with the Utah County Transportation General Plan

2.3.9 Describe how project incorporates ITS needs.
Phase II (future) of this project would include fiber optics from I-15 to 3200 West.
2.3.10 If phased or segmented, describe how the phase has logical termini and what will future phases consist of.
This is the first phase of the project. It addresses the immediate need of the intersection configuration and the right-of-way. Future phases will include widening to I-15 and extending a new road to 5600 West.

2.3.11 Is project being coordinated with or constructed with a larger project?
No

2.3.12 Describe how project will alleviate congestion on this or other facilities.
When the project is completed it will provide adequate turning space at the intersection. When future phases are completed, it will provide a more direct route for residents and truck traffic between West Mountain and I-15.

2.3.13 Describe any traffic improvements. (i.e lanes, signal coordination, ITS, turn lanes, bus pullouts, etc.)
This project will add turning lanes and a receiving lane from 3200 West

2.3.14 Describe any safety improvements for vehicular and pedestrian traffic. (i.e. raised median, channelization of turn movements, barriers, parkway strips, etc.)
This project will add separate right and left turn lanes. It will also provide adequate right of way for a future trail along the corridor.

2.3.15 How are complete streets addressed with this project? (plan for pedestrians, bikes, transit, trails, ITS)
There are no pedestrian facilities in this area, but the proposed right-of-width will accommodate sidewalks/trail in the future.

2.3.16 Describe traffic control changes at intersections. (include info to warrant changes)
Intersection will remain a "T" intersection with stop control on 8000 South. As future phases are constructed, a signal may be added as warrants are met.

2.3.17 What right-of-way is already secured?
Existing 36 foot right-of-way

2.3.18 What additional right-of-way is needed?
80 feet will be needed on the south side of the existing roadway. This will minimize the impact to existing homes.

2.3.19 Describe utility work to be performed and indicate who will do the work.
One natural gas service will be relocated by Dominion Energy

2.3.20 What type of environmental work will most likely be needed?
Categorical Exclusion
2.4 Non-Highway Projects (Transit / ITS / Active Transportation, Park and Ride, etc.)

2.4.1 Transit Route #
Not a transit project

2.4.2 Length of project
1.42 miles

2.4.3 What is the expected use of the facility or program?
This project will provide the right of way for a future trail along the corridor adjacent to the roadway.

2.4.4 What services are provided in the operating of this project?
n/a

2.4.5 Describe any equipment to be purchased (buses, ITS, etc.).
n/a

2.4.6 Describe how project is consistent with local or agency plans.
Utah County's transportation master plan show this corridor as an arterial road. This project will provide the right of way for an arterial road to be built in future phases, along with a trail in the corridor.

2.4.7 Describe how project incorporates ITS needs.
Future phases of this project will connect ITS along the corridor

2.4.8 If phased or segmented, describe how the phase has logical termini and what will future phases consist of.
This first phase will consist of right of way along the corridor and intersection improvements at 3200 West. Future phases will include widening/re-construction of the roadway between 3200 West and I-15. There will also be a trail added in a future phase. Another phase will extend a new road from 3200 West to 5600 West.

2.4.9 Is project being coordinated with or constructed with a larger project?
n/a

2.4.10 Describe how project will alleviate congestion on this or other facilities.
This project will make the intersection at 3200 West and 8000 South function better.

2.4.11 Describe any traffic improvements. (i.e lanes, signal coordination, ITS, turn lanes, bus pullouts, etc.)
This project will add dedicated turn lanes on 8000 South and provide adequate space for turning movements.
2.4.12 Describe any safety improvements for transit and pedestrian traffic. (i.e. raised median, channelization of turn movements, barriers, parkway strips, bridges, etc.)
This project provides sufficient right-of-way for pedestrian elements in future phases of the project.

2.4.13 How are complete streets addressed with this project? (plan for pedestrians, bikes, transit, trails, ITS)
In future phases of the project, a multi-use trail will be added in the corridor.

2.4.14 What right-of-way is already secured?
Existing 36 foot right-of-way

2.4.15 What additional right-of-way is needed?
80 feet will be needed on the south side of the existing roadway. This will minimize the impact to existing homes.

2.4.16 Describe utility work to be performed and indicate who will do the work.
One natural gas service will be reloacted by Dominion Energy

2.4.17 What type of environmental work will most likely be needed?
Categorical Exclusion

2.5 Facility Design

<table>
<thead>
<tr>
<th></th>
<th>Current Conditions</th>
<th>Design Year Choose an item.</th>
<th>Design Year w/o Improvements</th>
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<tbody>
<tr>
<td>Average Daily Traffic</td>
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<td>2751</td>
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<tr>
<td>Level of Service</td>
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<td>D</td>
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<tr>
<td>Functional Class</td>
<td>Arterial</td>
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<td>Design Speed</td>
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<tr>
<td>*Accident Rate</td>
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<td>1%</td>
<td>2.25%</td>
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<tr>
<td>Transit Ridership</td>
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<td>n/a</td>
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<tr>
<td>Ped/Trail Usage</td>
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<td>500 per day</td>
<td>none</td>
</tr>
<tr>
<td>Park and Ride Usage</td>
<td>n/a</td>
<td>n/a</td>
<td>n/a</td>
</tr>
</tbody>
</table>
3.0 | Project Ranking
The following categories will be used by MPO staff to score each project. The points associated with each category show what total points MPO staff can give. MPO staff’s recommendations will be made available to the MPO TAC Committee for their use in making final project selection recommendations. MPO staff ranking is a tool to aid the MPO TAC Committee in their final selection. The committee is not required to pick projects solely on MPO staff ranks. Please note, if questions pertinent to the project are not answered, zero points will be given.

3.1 Congestion Relief (25 Points)
Explain if the project...

a) Provides an alternate transportation facility that corrects an identified congested problem?
   By reconstructing the intersection this project will reduce the conflicts between motorist on each of the roads

b) Reduces congestion by reducing the number of vehicles.
   n/a

c) Reduces the need for additional highway lanes for peak hour capacity.
   n/a

d) Increases the efficiency of transportation system through traffic management measures.
   This project will improve the efficiency of the intersection.

e) Adds turning movements to relieve a congested intersection.
   This project will provide turning lanes and a receiving lane for a sub-standard intersection

3.2 Mode Choice (25 points)
Explain if the project...

a) Benefits multiple transportation systems (transit and highway, pedestrian and transit). By improving the intersection and providing adequate right-of-way, this project will allow for future pedestrian facilities along the corridor and be suitable for transit in the future.

b) Promotes alternative transportation solution to SOV use.
   Future phases of the project will include a multi-use trail

c) Creates or improves linkages between transportation modes.
   Future phases of the project will provide a trail that will access a park and ride area near I-15

d) Reduces physical, psychological, or economic barriers to carpool, bike, walk, or transit use.
This project includes right-of-way for a future trail in the corridor. The addition of a trail in the future will provide a better and safer route for pedestrians and cyclists to access the park and ride area near I-15.

e) Provides incentives to carpool, bike, walk, or transit use.
   The addition of a trail in the future will provide a better and safer route for pedestrians and cyclists to access the park and ride area near I-15.

3.3 Environmental Quality (15 points)
Explain if the project...

a) Provides cost effective emission reductions (air quality score).
   n/a

b) Minimizes environmental impacts or reduces existing impacts (e.g. air/water/noise pollution).
   This project will have minimal environmental impacts

c) Enhances the natural, cultural, or historic environment.
   n/a

d) Mitigates invasive impacts to existing neighborhoods/commercial areas (minimal relocations).
   This project will require the acquisition and removal of one home. The project will move the roadway further from the remaining homes and provide adequate space for turning movements for large trucks.

3.4 Safety (20 points)
Explain if the project...

a) Corrects/improves a verified or potential safety or accident problem.
   This intersection is undesized and inadequate for the vehicles using it. There are gravel pits, batch plants, and large commercial agriculture operations that utilize this corridor for heavy truck access. This is also a primary access to the residential/ agricultural areas of Benjamin, Lake Shore, and West Mountain.

b) Improves information/communications for traffic operations and emergency responders.
   n/a

c) Reduces severity of crashes.
   By reducing the potential conflict points, the accidents should be less severe

d) Enhances safe movement of pedestrian, bicycle traffic.
   This project, along with future phases, will provide for pedestrian and bicycle use in the 8000 South corridor. The current roadway has narrow asphalt travel lanes and no shoulders.

e) Provides an intermodal safety improvement (e.g. separation of vehicles-trains, vehicles-pedestrian).
A future phase of this project could include a separate bike trail along the corridor.

3.5 Other Considerations (15 points)

Explain if the project...

a) Effectively distributes funding throughout the MPO area.
   This project provides funds in the southern portion of the MPO area, in Benjamin, an area where MPO funds have not been utilized previously.

b) Phases project in a manner that the MPO can use limited funds efficiently.
   This is the first phase of the project and will set the stage for later projects. By acquiring the right-of-way before development pressures hit this area, the right-of-way can be purchased for a much lower cost.

c) Additional funding above required match is pledged toward project (including any soft match).
   Utah County will provide the match required. The County will do the engineering, right-of-way acquisition, and construction management in house as part of a soft match.

d) Project sponsor ranking of project.
   1

e) Project is numbered project within the current RTP.
   no
4.0 | Air Quality Report

All projects that are eligible for CM/AQ and CM/AQ-PM2.5 funds must complete this report. These funds are eligible for projects and programs countywide. Contact Susan Hardy at Mountainland AOG if you need help completing 4.4 Quantitative Analysis below, 801/229-3842 or shardy@mountainland.org.

4.1 Eligibility
CM/AQ funds can only be used for projects and programs that a direct benefit to air quality can be demonstrated. Highway expansion, such as new single occupancy vehicle lanes, is not eligible. Turn lanes at congested intersections, transit programs, pedestrian and trail projects, signal modernization, ITS, and IM programs are typical eligible CM/AQ projects.

4.2 CM/AQ Program
The purpose of the CM/AQ program is to fund transportation projects or programs that will contribute to attainment or maintenance of the National Ambient Air Quality Standards (NAAQS) in Ozone (O₃), Carbon monoxide (CO), Particulate Matter – 10 microns (PM₁₀), and PM₂.₅ non-attainment and maintenance areas. The city of Provo is a maintenance area for CO and Utah County is a non-attainment area for PM₁₀ and PM₂.₅.

4.3 Completing this Report
All projects eligible for CM/AQ funds must complete this report. Completing this report can be quite technical, Susan Hardy, Air Quality Coordinator at Mountainland, can help with filling out this report. Contact her at 801/229-3842 or shardy@mountainland.org.

4.4 Quantitative Analyses
A quantitative assessment of how a proposed project or program is expected to reduce emissions is important to assist in selecting the most effective use of this fund. List below all travel benefits directly related to this project. Air quality benefit calculations must utilize Mobile 6. The air quality analysis should include assessing emission reductions of transit, traffic flow improvements, ITS projects and programs, ridesharing, bicycle and pedestrian improvements. Complete at least one of the sections below. If quantitative analyses cannot be done, do a qualitative assessment in 4.3.

a) Vehicle Miles Traveled
Number of Vehicle Miles Traveled reduced (VMT): n/a
Average distance of trips reduced: n/a
Emission reduction per average weekday: n/a

b) Idling Time
Average idling time per vehicle reduced: n/a
Number of vehicles with reduced idling time: n/a
Emission reduction per average weekday: n/a

C) Vehicle Speed
Average change in vehicle speed (speed before and after): n/a
Number of vehicles affected: n/a
Emission reduction per average workday: n/a
4.5 Qualitative Assessment

Although a quantitative analyses of air quality impacts is required whenever possible, some improvements may not lend themselves to rigorous quantitative analysis, because of the project characteristics or because practical experience is lacking to adequately analyze the project. In these cases, a qualitative assessment based on a reason and logical examination of how the project or program will decrease emissions and contribute to attainment or maintenance of a NAAQS is appropriate.

n/a
5.0 | Project Cost Estimate
To development a project cost estimate, please supply a detailed cost breakdown of your unit costs, inflation, equipment, right-of-way, contingency, etc. To do so, use the Concept Costs Estimate Excel form provided by UDOT (available on Mountainland.org website). Non-construction projects such as equipment purchases, operations, administration programs, studies, etc. can use other methods to show their estimated costs. All sheets or methods used should be submitted as part of the Supplemental Information accompanying the Concept Report.

5.1 Cost Summary
Summarize the information from the Costs Estimate Excel form or other method. Enter NA for items that do not apply to the project.

a) Preliminary Engineering $25,000
b) Environmental Work $6,350
c) Construction $311,000
d) UDOT Review (project cost <500k = $5k, >500K = $10k) $5,000
e) Construction Engineering $31,000
f) Subtotal (in today’s dollars) $1,673,000
g) Inflated Cost Factor (inflate to 2022) $1,905,000
h) Total 2022 Cost $1,905,000
i) Non-MPO Funds Available to Project n/a
j) MPO Funding Request (includes 6.77% local match) $1,905,000

6.0 | Supplemental Information
Please submit any supporting documentation including maps, diagrams, charts, cost estimates, etc. that will allow MPO and UDOT staff and any Technical Advisory Committee to make an informed decision regarding the proposed project. Keep Supplemental Information submittals to 8 pages total.

6.1 Concept Report Submittal
In order to facilitate the distribution of the Concept Reports and any supplemental information, all Concept Reports shall be combined with any supplemental information and saved in PDF format as one document. Please note that this might create a large data file that might be too large to emailed. Plan accordingly to submit your report in electronic format (CD, DVD, Flash Drive) by the required due date. Concept Reports are due by March 29, 2018 at 6pm.

6.2 Contacts, Questions
For help with the Concept Report or questions, please contact:

Bob Allen
801/229-3813
rallen@mountainland.org

Shawn Eliot, AICP
801/229-3841