Request for Proposal

Design of a Roundabout with Accompanying Implementation Feasibility Studies

City of Riverton, Utah

Statement of Purpose

The purpose of this project is to design a round-about, and to examine the feasibility of using roundabouts on typical intersections in Riverton, Utah. It is expected that issues related to right of way and traffic flow will be characterized and considered for both an intersection and a roundabout option.

Background Information

Riverton, Utah is located on the south end of Salt Lake County to the west of the I-15 Corridor. Over the last decade the city has grown from a population of approximately 25,000 to 40,000 and population growth is expected to continue for some time. This growth requires the infrastructure be optimized or built.

Scope of Work

As part of this project it will be necessary to design a roundabout that will be acceptable in terms of right of way constraints and still meet the needs of the community. The group that is awarded this project will be responsible for ensuring the roundabout is of an appropriate size. It is desired that large vehicles still be able use the roundabout as needed so the design will need to take that into consideration. It is further desired that the roundabout be designed so that right of way expenses do not preclude the benefits of the roundabout. In order to characterize the location for the roundabout it may be necessary to make visits to Riverton City and analyze traffic flow and the general layout of the location. This may require the group that receives the project to perform traffic counts and measure the geometry of the location in question. Also, the roundabout will need to meet a reasonable aesthetic standard relative to the community it is placed in.

Requirement for Proposal Preparation

To be considered as a candidate group for this project three copies of a proposal must be submitted at the beginning of class no later than November 21, 2011. Length requirements and material that will need to be included in the proposals are set forth in table 1.

Table1. Requirements for proposal

Item to be included	Expectation
Cover letter	n.a.
Executive summary	≤ 1 page
Statement of qualifications	≤ 2 pages
Problem solving approach	≤ 2 pages
Required materials	≤ 1 page
milestones	≤ 1 page
Engineering design budget	≤ 1 page
Resumes in appendix	1 page / member

Outcome and Performance Standards

You will provide this work "as is" meaning that there is no engineering stamp certifying the work. However, our ability to continue receiving help from outside sponsors will be contingent on the good work that you do. You represent the BYU Civil & Environmental Engineering Department and it is expected that you will interact in a professional manner at all times with your mentor and project sponsor, treating them with the utmost respect and consideration of their busy schedules.

While successful completion of the design project is fundamental to the outcome of the work, it is expected that you will also learn important team dynamics and leadership principles. This means that in the process of completing the project you are also seeking to help each member of your team grow and develop confidence in his/her engineering abilities.

Deliverables

The final results of this project will need to be delivered April 1, 2011. The results will be delivered in three ways including: a final report with design alternatives for the project that includes economic and environmental considerations, a poster summarizing the design project, and a presentation summarizing the project. These items will be submitted to your faculty, sponsors, and peers.

Term of Contract

The team that is awarded this contract will need to contribute their time and effort into creating quality deliverables. After the project is awarded, each group member will need to contribute 6 hours/week towards completion of the project. And 3 of those 6 hours will be spent working in a group setting.

Payments, Incentives, Penalties

Each group/engineer will receive a grade based on how well the project is executed. Table 2 shows the way in which grades will be assessed.

Table2. Criteria that will be used in determining grades

Item to be considered	Grade weight
Time card (requisite hours worked)	10%
Project notebook (document work)	10%
Milestones met	20%
Final report	35%
Poster/presentation	10%
Teamwork portfolio and peer evaluation	10%
Cooperation	5%

Contractual Terms and Conditions

There will be no monetary compensation with respect to the work completed, and all work is completed and delivered on a "best effort" basis. Each member of your team will be asked to sign a non-disclosure agreement that simply states the work you do belongs to the project sponsor.

Evaluation and award process

All proposals that are submitted will be evaluated by a panel of 3 graduate students. They will be evaluated based on the criteria contained in table 3. The group that best satisfies the evaluation criteria will receive the first offer for this project.

Table3. Selection criteria for submitted proposals.

Criteria to be considered	Weight
Firm resources/ability/experience	20%
Key project personnel	20%
Work plan and understanding	40%
Technical proposal and presentation	20%

Process Schedule

The proposal process will proceed on a schedule as shown in table 4. After the request for proposal is posted online a period of approximately 1 month will be allowed for proposal drafting. After the panel of graduate students reviews the proposal, award notifications will be sent out.

Table 4. Schedule for drafting of proposals.

Scheduled Item	Date
Question and answer period	November 07, 2011
Three copies of proposal due	November 21, 2011
Five minute interview presentation	November 21, 2011
Award notification	November 30, 2011

Contacts

If any questions arise during the application process contact Mark Bentley at bentleyemail@gmail.com or call him at 435-225-3904