
Exhibit A

Citizen Advisory Group Bridge Type Recommendation

PREPARED FOR: Commissioner Sam Adams

DATE: November 21, 2008

Background Information

This memorandum summarizes the recommendation of the Gibbs Street Pedestrian Bridge Citizens Advisory Committee on bridge type selection for the project. It is based on a process of collaboration with the City of Portland Technical Advisory Committee (TAC), the affected communities, and the CH2M HILL design team from April through September, 2008. The process began with defining project goals and criteria for evaluating various solutions, developing an understanding of the relationship of the bridge to the communities and transportation networks on the east and west sides, and considering trade offs among desired features and project costs.

Following this initial work, the design team evaluated a range of bridge types during a design charrette in June. The charrette offered the CAC/TAC and community members an opportunity to review and comment on four bridge types with a variety of span configurations including:

- ◆ Box girder
- ◆ Cable stayed
- ◆ Truss
- ◆ Arch

After the design charrette and public open house, the Oregon Department of Transportation (ODOT) determined that the City of Portland could construct a new bridge with one pier in the ODOT right-of-way, thus requiring a two-span bridge design. This information allowed the design team to better estimate costs and constructability of the various bridge types. Input (on bridge types) from the charrette and open house showed a strong preference for the cable stayed and box girder bridge types. Although the design team determined that both of these bridge types would likely exceed the project construction budget, refined cost estimates indicated an extradosed bridge, which combines features of cable stayed and box girder structures, could be considered further.

During July and August, the design team compared the following bridge types with one pier in the I-5 right-of-way between Hood Avenue and I-5:

- ◆ Concrete box girder
- ◆ Steel box girder
- ◆ Extradosed

At its September meeting, the CAC considered results of the design team evaluation. The three bridge types were compared against the CAC's goals and criteria relating to aesthetics,

cost, and constructability. The design team recommended moving the extradosed bridge type forward for detailed design because it:

- Offers pleasing views from the community.
- Has vistas from the extradosed bridge that frame Mt. Hood to the east and the tram tower on the hill to the west.
- (Frames the view and) Creates a gateway to the city for northbound drivers on I-5.
- Has short towers that are subservient to, yet compliment the tram tower.
- Creates fewer impacts to traffic on I-5 and I-405 during construction.
- Is expected to have similar construction cost to the box girder bridge types.

CAC Bridge Type Recommendation

Following discussion with the TAC and design team, the CAC recommended the extradosed bridge type be selected for final design. In making this recommendation, nine CAC members identified the following benefits of the extradosed bridge type:

- Unique, aesthetically pleasing design
- Visual interest for bridge users
- Pedestrian scale structure
- Lower elevation on east side
- Small abutment on the west side
- Potentially more affordable

The group also identified the following issues for the design team to consider as it moves forward with final design:

- Noise associated with closeness of the bridge deck to traffic
- Vibration of bridge deck
- Interrelationship of bridge tower angles, particularly the east side bridge tower and the tram tower
- Design details to ensure safety at locations where the cables are attached to the deck
- View from west side neighborhoods looking east
- Integration of lighting into the cable structure
- Relocation of ODOT sign bridge
- Maintenance cost considerations
- Project scope modifications as necessary to ensure project budget compliance

Two CAC members favored the concrete box girder bridge type because its form more closely matches the form of the tram tower and because they prefer a straight alignment which is not possible with the extradosed bridge types.