



MEMORANDUM

TO: MRA Board

FROM: Tod Gass, Project Manager

DATE: October 14, 2021

A handwritten signature in blue ink that reads "Tod Gass".

SUBJECT: Hellgate URD – Railroad Quiet Zone Study and Wayside Horn TIF Request

At the February 20, 2020 MRA Board meeting, the Board authorized MRA to enter into a Memorandum of Understanding with City Public Works & Mobility (PWM) in which MRA agreed to provide the funding for a PWM managed Railroad Quiet Zone Study. Railroad Quiet Zones are areas designated by the Federal Railroad Administration (FRA) for the purpose of enhancing the quality of life in communities by establishing sections of railroads where the routine use of train horns at crossings is discontinued. A Quiet Zone is a section of railroad track where a community has implemented specific safety measures at a railroad crossing to mitigate the risk of collisions.

PWM engaged Triple Tree Engineering (TTE), out of Helena Montana, to conduct a site survey of the Spruce/Madison railroad crossing and the Taylor Street crossing, complete a traffic study of the Spruce/Madison intersection, and provide a Railroad Quiet Zone Analysis. The Taylor Street crossing was eliminated from the study area as it was discovered that a private railroad crossing, per FRA rules, cannot be the first crossing encountered in a Rail Road Quiet Zone. The TTE study was completed this past Summer.

The Quiet Zone Analysis described and recommended various measures the City could take to mitigate collision risk at the Spruce/Madison crossing in establishing a Railroad Quiet Zone. The options range from installing additional crossing gates to completely block traffic from crossing the tracks when activated, to installing road medians to prevent vehicles from traveling out of lanes to maneuver crossing the tracks when crossing gates are activated, to various combinations of crossing gates, pedestrian gates, and road medians to lower collision risk at the crossing. The Study also brought forth an alternative to establishing a Quiet Zone, which is the installation of "Wayside Horns". Wayside Horns mimic the sound of a train horn and are mounted on poles approximately 13 ft. high with the sound focused down onto the crossing. The result is that the sound of a train horn is localized to the railroad crossing rather than broadcast across a large area of the community.

After learning of the significant cost savings of utilizing Wayside Horns, the City and MRA proceeded to conduct a demonstration of the Wayside Horns in order to measure sound levels at various locations around the crossing, in the Pine Street neighborhood, and in the lower Rattlesnake neighborhood. The demonstration showed a significant decrease in train horn volume levels across the Pine Street and lower Rattlesnake neighborhoods. Due to the significant lower cost and significant lower sound volumes in the local neighborhoods, the Wayside Horn option was selected as the preferred method to lower the

impact of train horn volumes in the neighborhoods adjacent to the Spruce/Madison railroad crossing, and along the East Broadway corridor.

PWM will present the results of the Railroad Quiet Zone Study at the October MRA Board meeting and make a request for TIF funding to implement the Wayside Horn alternative at the Spruce/Madison crossing. TTE provided a scope of services for final engineering and design, MRL coordination, and construction staking on a time and materials basis with an estimated fee of \$16,700 to take the project to completion. Rio-tech, the supplier and installer of the Wayside Horns, provided a cost estimate of \$160,000 for purchase, delivery, and installation of the Wayside Horns. Since this is the first Wayside Horn project the City is aware of in the region, a design and installation contingency is included in the \$200,000 TIF request to complete the wayside horn project.

Strategic Plan Goals. The mission of the City of Missoula Strategic Plan includes “enhancing...quality of life” in the Missoula community. The installation of Wayside Horns at the Spruce/Madison railroad crossing accomplishes the goal of a Railroad Quiet Zone, which is to enhance the quality of life in communities by establishing sections of railroads where the routine use of train horns at crossings is suppressed. The Wayside Horn Project furthers the City’s strategic goal of designing and implementing transportation infrastructure to support safe, healthy, and active communities.

Public Purpose. Containing the sound of train horns to the Spruce/Madison railroad crossing, through the installation of Wayside Horns, enhances quality of life by lowering noise pollution levels late in the evening or at night along the East Broadway corridor and the Lower Rattlesnake, Heart of Missoula, and the University District neighborhoods located within the Hellgate URD.

RECOMMENDATION: Staff recommends the Board move to authorize MRA to amend the March 5th, 2020 MOU between MRA and City Public Works & Mobility to include the additional Triple Tree Engineering scope of work for final engineering and design, MRL coordination, and construction staking; and to authorize MRA to enter into an MOU with City Public Works & Mobility for the purchase and installation of Wayside Horns at the Spruce and Madison railroad crossing; and to approve a project budget not to exceed \$200,000 to complete the installation of Wayside Horns at the Spruce/Madison railroad crossing.