BNSF Principles for Handling Requests for New Quiet Zones


FRA's Final Rule on Use of Locomotive Horns at Highway-Rail Grade Crossing:

Under the current FRA Final Rule, local governments have the opportunity to establish Quiet Zones if they are willing to take remedial steps to address risk based on a specific calculation of potential risk at the crossing(s). These remedial steps can include crossing closure, grade separation, installation of full-width crossing gates with an approved median divider to prevent drivers from crossing lanes to go around a lowered gate, installation of full-width gates and lights at crossings on a one-way street, temporary closure (for nighttime Quiet Zones only) or the installation of four quadrant gates. The rule also allows use of an automated horn system to be installed at the crossing(s) as a substitute for the locomotive horn.

FRA's Final Rule eliminates the ability of municipalities or other local entities to pass or enforce ordinances that designate areas where locomotive engineers are not required to sound their horns at public highway grade crossings. The Final Rule outlines specific measures that must be completed before Quiet Zones can be established and are subject to FRA review, approval and ongoing oversight.

BNSF Guidelines for Implementation of Final Rule:

These guidelines are based on the Final Rule with current amendments and are subject to change depending on modifications.

- Applicants should contact BNSF early in the process to minimize delays; identify how all road jurisdictions in the Quiet Zone will be involved; and understand the benefits and drawbacks of potential Supplemental Safety Measures (SSMs) and Alternative Safety Measures (ASMs). BNSF’s contact for this work is Mr. Lyn Hartley, Director, Public Projects, who can be reached at Lyn.Hartley@bnsf.com.

- Applicants should use a diagnostic team process with BNSF, and the applicable state Department of Transportation and/or appropriate agency with jurisdiction over public rail-highway grade crossings. Applicants should always consider closure as the first option for any existing crossings within new Quiet Zones. The diagnostic team’s recommendations should be used to determine the most appropriate measures at each crossing.

- To qualify new Quiet Zones under FRA’s rule, applicants should use SSMs at all public grade crossing within the zone and ensure those SSMs are constructed in compliance with FRA’s requirements.

- Applicants are reminded that the FRA rules provide for re-institution of horn sounding with use of other than qualifying SSMs (FRA Rule Section 222.51) at Quiet Zones if there are subsequent relevant collisions or if the national safety averages change. Thus, applicants are encouraged to
develop a proposal that minimizes the chance that the FRA will mandate sounding of horns after the Quiet Zone is designated.

- If an SSM or ASM is required to qualify for a Quiet Zone, applicants must identify their funding sources for the SSMs and ASMs. If BNSF would need to install the SSM, BNSF will provide an estimated construction charge and an estimated annual maintenance charge for the SSM. (Refer to BNSF established funding guidelines.) Applicants are encouraged to consult with their appropriate state agency about the use of federal safety funding through their state agency. BNSF requires completion of a construction/maintenance agreement before work will begin. Finally, if an SSM is subject to state regulatory approval, applicant should understand the time required for such approvals and must pay the costs associated with securing such approval and approval of “as-builds.”

- Most often, agencies are selecting lower cost SSM measures at crossings that cannot otherwise be closed or grade separated. Experience is proving that non-mountable medians on the highway approaches to the crossing are often an appropriate SSM; however, BNSF discourages the use of temporary or pavement-mounted curbing for durability reasons. If any SSM is compromised, BNSF is allowed to resume sounding of locomotive horns until all SSM devices are repaired as per Section 222.23(b)(4).

According to the Final Rule, BNSF must continue to sound train horns at crossings within new Quiet Zones until all required SSMs and ASMs are constructed and in service. The FRA rule also indicates that BNSF is required to sound horns when railway (roadway) workers are present and when the locomotive engineer believes an unsafe condition is present. To reduce potential confusion and manage the public’s expectations, agencies considering new Quiet Zones are encouraged to educate residents on the elements of the rule that still require BNSF locomotive engineers to sound horns.

BNSF’s contact can assist you by providing a brief DVD that explains FRA’s horn sounding requirements.