The Illinois Department of Transportation (IDOT) and the Federal Highway Administration (FHWA) have developed the following policy (CREATE Environmental Justice Policy) to guide the analysis of impacts on low-income and minority populations resulting from CREATE Program rail projects. This policy complies with Executive Order 12898, which requires Federal agencies to achieve environmental justice by identifying and addressing disproportionately high and adverse human health or environmental effects, including the interrelated social and economic effects of their programs, policies, and activities on minority populations and low-income populations in the United States. This policy is only applicable to CREATE Program rail projects. This policy is not intended for use on non-CREATE Program projects.

The framework for analyzing the potential impacts of the CREATE Program rail projects on low-income and minority populations is shown in Exhibit 1. The right side of Exhibit 1 generally illustrates the impact analysis process. One of the more common issues arising on CREATE Program rail projects are predicted noise and vibration impacts. As noted in the CREATE Noise and Vibration Assessment Methodology (CREATE N&V Methodology) dated June 2014, the range of feasible vibration mitigation measures is limited. Therefore, it is intended that the analysis of vibration impacts (and other non-noise impacts) on low-income and minority populations will be addressed through the process on the right side of Exhibit 1. Noise mitigation measures, on the other hand, have the potential for greater flexibility in terms of their evaluation and application. Therefore, the left side of Exhibit 1 outlines the specific analysis process for predicted noise impacts. In general, the environmental justice analysis framework includes the following steps:

**Step 1:** Complete impact analysis. In the case of noise and vibration, impacts will be analyzed in accordance with the CREATE N&V Methodology. Non-noise and non-vibration impacts (e.g., relocations, visual impacts, etc.) will be analyzed using current policies and procedures established by FHWA and IDOT. If no impacts are anticipated, no further analysis is required beyond appropriately documenting the analysis in the NEPA documentation.

Should impacts be anticipated, mitigation measures will also be evaluated using current policies and procedures established by FHWA and IDOT. In accordance with the Council on Environmental Quality (CEQ) regulations (40 CFR 1508.20), the mitigation “hierarchy” includes:

- Avoiding the impact altogether by not taking a certain action or parts of the action.
- Minimizing impacts by limiting the degree or magnitude of the action and its implementation.
- Rectifying the impact by repairing, rehabilitating, or restoring the affected environment.
- Reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action.
- Compensating for the impact by replacing or providing substitute resources or environments.

In the case of predicted noise impacts, mitigation measures will be evaluated in accordance with the CREATE N&V Methodology. Noise mitigation measures determined to be feasible and reasonable (i.e., cost-effective and desired by the benefited receptors) under the CREATE N&V Methodology will be recommended for implementation. Mitigation measures for non-noise impacts will be evaluated in accordance with current policies and procedures established by FHWA and IDOT.
Step 1: Predicted Noise Impacts?

- No → Analysis Complete
- Yes → Step 1 (cont.): Mitigation of predicted noise impacts accomplished under CREATE N&V Assessment Methodology?
  - Yes → Analysis Complete
  - No → Analysis Complete

Step 2: Disproportionately high and adverse impacts to low-income or minority populations?

- No → Analysis Complete
- Yes → Step 2 (cont.): Mitigation of anticipated impacts accomplished under existing IDOT/FHWA policies and procedures?
  - Yes → Analysis Complete
  - No → Analysis Complete

Step 3: Evaluate practicable noise barriers to address moderate and severe noise impacts.

No. The practicability of other mitigation and enhancement measures to address disproportionately high and adverse impacts to low-income and minority populations shall be evaluated on a project-by-project basis to account for contextual issues which could affect the social, economic, and environmental factors. All practicability determinations shall be made in coordination with IDOT and FHWA.

Solicit viewpoints of benefited receptors in decision to recommend implementation.

Step 3 (cont.): Mitigation of moderate and severe noise impacts accomplished?

- Yes → Analysis Complete
- No → Step 4:
  If needed, evaluate other practicable* mitigation and enhancement measures with merit and support to provide offsetting benefits and opportunities to enhance communities, neighborhoods, and individuals.

*The practicability of other mitigation and enhancement measures to address disproportionately high and adverse impacts to low-income and minority populations shall be evaluated on a project-by-project basis to account for contextual issues which could affect the social, economic, and environmental factors. All practicability determinations shall be made in coordination with IDOT and FHWA.
If mitigation of all anticipated impacts is addressed under current FHWA and IDOT policies and procedures (including the CREATE N&V Methodology), no further analysis is required beyond appropriately documenting the analysis in the National Environmental Policy Act (NEPA) documentation.

**Step 2:** If unmitigated impacts exist, the analysis will consider if the unmitigated impacts have the potential to result in disproportionately high and adverse impacts to low-income and minority populations. In the case of unmitigated noise impacts, the analysis will consider both moderate and severe noise impacts as either could result in disproportionately high and adverse impacts to low-income and minority populations. See Step 4 (below) for further discussion of how to evaluate potential mitigation measures for unmitigated non-noise impacts.

If no disproportionately high and adverse impacts to low income and minority populations are anticipated, no further analysis is required beyond appropriately documenting the analysis in the NEPA documentation.

**Step 3:** If unmitigated moderate and severe noise impacts could result in disproportionately high and adverse impacts to low-income and minority populations, the analysis will evaluate other practicable noise mitigation measures.

In the case of predicted noise impacts, IDOT and FHWA determined that noise barriers up to approximately double the economic reasonability value contained in the CREATE N&V Methodology are the only practicable mitigation measures to address disproportionately high and adverse impacts to low-income and minority populations. This determination is consistent with the principle of cost averaging, which is part of IDOT’s highway traffic noise policy and is permitted under federal noise regulations (23 CFR 772.13 (k)). The following text will be included in the appropriate NEPA documentation for each CREATE Program project to document these findings:

In the case of predicted noise impacts, IDOT and FHWA programmatically evaluated other potential mitigation measures—such as noise attenuating measures for residential structures (e.g., insulation, windows, doors, air conditioning, etc.)—to address predicted noise impacts on low-income and minority populations. After careful consideration, these measures were determined to be not practicable due to unpredictable factors such as: physical condition of the residential structure which could make feasible noise reduction difficult to predict or possibly achieve; access to residential structures to assess before and after noise levels and to install recommended mitigation measures; varying presence or condition of existing items (e.g., insulation, windows, doors, air conditioning, etc.) that might require installation or replacement. These factors create high levels of uncertainty with regard to feasible, uniform and practicable implementation. Therefore, IDOT and FHWA have determined that feasible noise barriers up to approximately double the economic reasonability criteria contained in the CREATE N&V Methodology are the only practicable mitigation measures to address disproportionately high and adverse noise impacts to low-income and minority populations.

Noise barriers determined to be feasible under the CREATE N&V Methodology and practicable under the CREATE Environmental Justice Policy (i.e., approximately double the economic reasonability value contained in the CREATE N&V Methodology) will be evaluated for implementation, unless certain conditions or factors warrant otherwise. For example, in some cases an alternative measure (e.g., a quiet zone) may be more appropriate to address the predicted noise impact. The NEPA documentation for each CREATE Program project will be used to
document the rationale associated with each recommendation. The discussion will summarize the analysis, influencing conditions or factors (if any), and conclusions supporting each recommendation.

One of the core principles of environmental justice is the opportunity for meaningful input from the affected community. Therefore, public involvement will be required to assist in the evaluation of practicable noise barriers. Specifically, the viewpoints of benefited receptors shall be solicited for noise barriers found to be practicable under the CREATE Environmental Justice Policy. The viewpoints of benefited receptors shall be solicited in accordance with the guidance contained in the CREATE N&V Methodology. A final decision on installation of practicable noise barriers under the CREATE Environmental Justice Policy will be made upon the completion of the project’s final design and the public involvement process. This condition should be clearly stated within environmental justice analysis documentation for each project.

If potential changes to the recommended noise mitigation measures are identified after completion of the Phase I public involvement process, consult with IDOT and FHWA to determine if additional public involvement is necessary.

Step 4: If unmitigated noise and non-noise impacts would remain that could be considered disproportionately high and adverse, the analysis could evaluate other mitigation and enhancement measures to provide offsetting benefits and opportunities to enhance communities, neighborhoods, and individuals. It is anticipated that these measures, if needed, would be developed based on feedback received during the public involvement process. Consult with IDOT and FHWA prior to initiating this evaluation.

The practicability of other mitigation and enhancement measures to address disproportionately high and adverse impacts to low-income and minority populations will be evaluated on a project-by-project basis to account for contextual issues which could affect the social, economic, and environmental factors. All practicability determinations shall be made in coordination with IDOT and FHWA. CREATE is a transportation project; thus, the mitigation and enhancement measures that are transportation-related can receive priority by IDOT and FHWA. Additionally, public involvement may be required to determine if the measures have the merit and support necessary for implementation as part of the project.

If potential changes to the recommended mitigation and enhancement measures are identified after completion of the Phase I public involvement process, consult with IDOT and FHWA to determine if additional public involvement is necessary.

References:
