



Technical Q&A for 2021 RFP Posting

RFP 21-01

1. No questions submitted.

RFP 21-02

- **1. Q:** What version of AASHTOWare BM are the proposed deterioration curves to be compatible with?
 - A: The current version of AASHTOWare BrM is 6.4.

RFP 21-03

- **1. Q:** Task 1 states that PIs are to "compile data ... from testing locations" and that "additional needed data may be collected". What data will be available to PIs from the testing locations?
 - **A:** IDOT is not aware of any data from the testing locations that will be available from what is listed in task 1. As it is stated, "Additional data will be collected within each metropolitan planning organization for study to determine commercial truck volumes per day." IDOT assumes this is travel data from the Metropolitan planning organizations travel demand models for MPOs that have one. IDOT is not aware of other data sets outside of those mentioned in the task and what is available from our partners at the MPOs.

RFP 21-04

1. No questions submitted.

RFP 21-05

1. No questions submitted.

RFP 21-06

1. No questions submitted.

RFP 21-07

- **1. Q:** The RFP mentions the need to describe a procedure to compare, qualify and use "various friction measurements". Does IDOT or ICT have a set of friction measurements available to develop the requested procedure?
 - **A:** Yes. The Department currently operates two locked-wheel skid testers. IDOT collects about 1800 sites a year and have retained all that data for several years. It will be available to the research team with certain requirements.
- **2. Q:** If there are no available friction measurements, does the project require the proposing agency to make friction measurement? If the answer is affirmative, can you provide the list of highways and their lengths?
 - **A:** No. The Department has no intentions of going away from the LWST any time soon. IDOT would like to make this process future proof so that if we move to a different measurement technology we can easily adapt.
- **3. Q:** To compare, qualify and use the friction measurements, what technologies does the RFP want to include in that process? (For example, lock-wheel skid tester, SCRIM, Grip Tester, etc.).
 - **A:** That question is best suited for the TRP. The Chair is not sure that the Department has currently fully evaluated all of the different technologies. This option should be considered in the literature review.
- **4. Q:** Similar to the question about the availability for friction measurements, what is the availability of the crash data? In other words, is there crash data available? On what routes? What years of crash data are available (e.g., one, two, three, etc. years)?
 - **A:** Crash data is available on all Illinois state and local roadways and can be shared via GIS shapefiles. The most recent year finalized was 2019, but 2020 is currently being finalized. Crash data goes as far back as 2004. Depending on the routes selected for the study, the crash data can be gueried and provided. Should the proposal wish to include

data or analysis from other states, they will have to obtain that data on their own through resources such as HSIS.

5. Q: Are the crashes and the friction measurements available on the same routes and evaluation period (e.g. 3-5 years)?

A: Yes. The friction measurements and the crash data should be available on the same routes. The Department collects friction data on more than just high crash locations so there might not be complete alignment between the two data sources.

RFP 21-08

1. No questions submitted.

RFP 21-09

1. Q: Could IDOT provide an inventory of the existing rumble strip types used on IDOT routes today?

A: Section 642 Shoulder Rumble Strips is found on page 548 of the linked document. **IDOT Standard Specifications for Road and Bridge Construction**

- **2. Q:** Is it anticipated that the Task 3 and 4 testing will take place on in-service roadways or in a "closed course" setting?
 - A: IDOT anticipates a closed course setting.
- 3. Q: How do the researchers receive authorization to perform the necessary construction?
 - A: If it is in a closed course setting, this should not be an issue.
- **4. Q:** Does IDOT anticipate that the Task 3 and 4 field evaluations should take place within the State of Illinois?
 - A: Yes, this would be preferred, but not required.
- **5. Q:** If the testing is to take place on active or in-service roadways, does IDOT anticipate that the experimental rumble strips be filled back in or retained.

A: It is anticipated that the testing will take place on a closed course.

6. Q: Is there an inventory or list of locations where IDOT has received complaints regarding rumble strip noise?

A: An inventory is being created but is not available at this time. IDOT can contact its district offices and get exact locations where noise complaints have occurred.

7. **Q:** The scope of an in-progress NCHRP project (15-68, Effective Low-Noise Rumble Strips) is very similar to that described in the RFP. That project has already completed the literature review, state-of-practice review, and phase 1 testing. The second phase has been on hold due to COVID. Also, the NCHRP work will result in a recommended measurement method, which would be good to apply to any State DOT studies going forward. Work starting in August of 2021 will be before an NCHRP 15-68 report is released. Is the intention of the Illinois DOT work to build on the NCHRP work, once a report is released, or is the intention to be independent from that work?

A: The intention is that this research will be independent of the other study.

8. Q: About the construction of the rumble strips, Task 3 says: "The researcher(s) shall construct a rumble strip patch in the shape of each of the rumble designs and quantify the internal effect of each." What measurements and which characteristics does "internal effects" imply?

A: Noise measurements should be taken inside the vehicles to determine the decibel level from contact with the rumble strip.

9. Q: Is the research group expected to construct all types of rumble strips or only those IL does not have (e.g., the sinusoidal rumble strip)?

A: All types as IDOT is looking at the effectiveness of those in use currently as well as new designs.

10. Q: What is the length requirement of the constructed rumble strips?

A: This is still being looked into and this will be updated once IDOT provides a response.

11. Q: Vehicle speed is not listed in the RFP. Is there a preferred vehicle speed for the testing?

A: IDOT is proposing 45 mph – 65 mph for the testing.