

## **REQUEST FOR PROPOSAL #25-02**

# **Turn-on-Red Prohibitions for Dual Right-Turn Lanes**

#### **PROJECT INFORMATION**

Funds: \$150,000 total (includes a required 25% cost

share of \$37,500 from proposing agency)

**Estimated Contract Term:** 18 months

**Projected Start Date: 8/16/2025** 

**Posted Date:** 04/01/2025

Close Date: 04/30/2025 at 11:59 p.m. CST

**Submit Proposals to:** 

ICTProjectManagement@illinois.edu

#### BACKGROUND

Allowing drivers to make a right turn on red (RTOR) can reduce intersection delay and improve traffic flow. Several tools have been developed for forecasting the operation of both single and dual right-turn lanes. However, studies have shown that allowing RTOR led to significant risks for vulnerable road users, including pedestrians and bicyclists. These safety risks are more manifested where there are visibility issues and/or aggressive driving. For those reasons, some transportation agencies prohibit RTOR at specific intersections, especially those with high pedestrian and bicyclist volumes.

Web-Only Document 368 from the National Cooperative Highway Research Program is an important report related to RTOR decisions. This study included approximately 260 intersections across 25 states, including Illinois. Although this study's findings provide valuable information to estimate the operation of dual right-turn lanes, further investigations are needed on safety implications, especially at dual right-turn lanes.

There is currently inconsistency throughout the state in addressing RTOR prohibitions for dual right-turn lanes. Some agencies may prohibit all RTOR at these locations, whereas others may allow it from one of the two right-turn lanes. Guidance on when RTOR may be allowed is needed, while considering traffic efficiency as well as vehicle, bicyclist and pedestrian safety.

#### **OBJECTIVE**

The objective of this study is to provide recommendations for when RTOR may be allowed for dual right-turn lane configurations.

The outcome of this study shall provide recommendations to establish policies within IDOT's Bureau of Operations and Bureau of Design and Environment related to the operation of dual right-turn lanes. In addition, the outcome shall support consistency, safety and efficiency at intersections with dual right-turn lanes. IDOT policy can be advanced by informing consistent design of dual right-turn lanes throughout districts. In addition, safety can be improved by guiding operational and geometric decisions at intersections with dual right-turn lanes.

#### RESEARCH TASKS AND REQUIRED DELIVERABLES

The survey outcome shall identify policies, practices and issues observed throughout the U.S., as they relate to RTOR at dual-right turn lane locations. Researchers shall analyze crash statistics at all dual right-turn lanes in Illinois to compare safety to operations and intersection geometrics. Combining these sources of information can inform future policy with both safety and operations data. To accomplish this, the research should include the following tasks:

- Task 1 Literature review.
- Task 2 Survey of current US state policies and practices.
- Task 3 Crash data analysis.
- Task 4 Case studies of example locations.
- Task 5 Final report.

#### INSTRUCTIONS FOR SUBMITTING A PROPOSAL

The proposal shall be prepared in accordance with the guidelines presented in Appendix A.

By submitting a proposal, potential principal investigators are acknowledging they have read and understand the IDOT-ICT <u>PI responsibilities and Guidebook</u> and terms and requirements under the current IDOT-ICT Intergovernmental Agreement (IGA).

Technical questions regarding the research project or RFP procedures should be submitted to the ICT Project Management team via email at <a href="ICTProjectManagement@illinois.edu">ICTProjectManagement@illinois.edu</a> within 14 days of the posting date. Technical questions and answers will be posted on ICT's <a href="website">website</a> as they are received.

# SPECIAL CONDITIONS FOR REVIEWING PROPOSALS AND AWARDING ICT FUNDS

Please note that the following conditions will apply when reviewing all received proposals and in awarding ICT funds:

- 1) Preference will be given to Illinois universities (both public and private) when multiple proposals from this solicitation are reviewed and have identical scores.
- The award of this project is contingent upon the availability of funds at the time of award.

#### APPENDIX A:

## Guidelines for Preparing Proposals for the Illinois Center for Transportation

Please use the following format when submitting Illinois Center for Transportation proposals for consideration. Proposals should be a maximum of 15 pages (excluding the cover page, itemized budget, budget justification and optional appendices) with a minimum 11pt font, standard margins, and in an Adobe PDF format.

#### 1. Cover Page

Please include the following information on the proposal cover page:

- RFP Number (e.g., RFP #25-XX)
- Proposal title
- Proposed Principal Investigator (and co-investigator, if any), along with associated organizations and email addresses.

#### 2. Research Plan

Clearly and concisely address the proposed approach for solving the issue described in the problem statement. The research plan should be subdivided into the following sections:

#### (a) Introduction, Including Research Objective

Introduce the proposal and provide a concise overview of the research approach. Outline the objectives of the research project and explain the questions that will be answered by the research.

#### (b) Research Approach/Work Plan

Include details of the research project and strategies to accomplish the project objectives. Itemize the tasks and provide a clear explanation of the research approach, deliverables, and identify the research team lead for each task.

#### (c) Anticipated Research Results

State the anticipated research results and deliverables.

#### (d) Expected Implementable Outcome(s)

All IDOT-ICT research is expected to be implementable. Describe what implementable outcomes (e.g., specification, test, recommendations, etc.) are anticipated that will facilitate implementation of the research results.

#### 3. Qualifications and Accomplishments of the Research Team

Identify who will perform the research and provide a brief explanation of each researcher's qualifications and related research efforts.

#### 4. Other Commitments of the Research Team

Outline the other commitments of the research team to demonstrate the ability to fulfill the commitments of the proposal.

#### 5. Facilities and Equipment

Describe the facilities and equipment available to conduct the research.

#### 6. Timeline Requirements

Include a timeline of the research project's tasks in this section. Describe the required time to complete the research, including final report preparation, ICT's editing process, review of the report by the Technical Review Panel, and publication of the report. Please note the final report must be submitted in Section 508 compliant format at least three months before the project's end date. Below is an example of a project timeline.

Project Milestones (Assuming an August 16 Start Date, and a 24-month project)		2025				2026											2027									
		8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8
1	Kickoff Meeting																									
2	PI conducts Project Task X																									
3	PI conducts Project Task XX																									
4	PI conducts Project Task XXX																									
5	PI conducts Project Task XXXX																									
6	PI conducts Project Task XXXXX																									
7	PI writes DRAFT report																									
8	PI Submits Final DRAFT report to ICT for editing																									
9	ICT Preliminary editing phase																									
10	PI/TRP editing phase																									
11	Final editing phase																									
12	Report published																									
	(Quarterly Progress Reports Due)																									
	(TRP Meetings)																									

#### 7. Itemized Budget

Provide an itemized project budget including the cost of personnel, consultants, subcontracts, equipment, materials, travel, indirect costs and cost share.

A minimum of 25% of the total project budget must be cost share from the proposing agency. Under the IGA effective July 1, 2024, the indirect cost rate used for institutions with a federally negotiated F&A rate cannot exceed 42.97% of the modified total direct costs. If the proposing agency does not have a federally negotiated rate, a 10% de minimis rate must be used.

Subaward costs from outside the proposing agency cannot exceed 50% of the total project budget without prior approval.

A part of the cost share requirement may be fulfilled using unrecovered indirect costs. Any proposal submitted by an agency outside the University of Illinois system that plans to use unrecovered indirect costs as cost share must submit a request for approval to

IDOT/Federal Highway Administration. More information on this letter will be provided if a proposal is selected for funding.

Please utilize ICT's budget templates when submitting a proposal: <u>UIUC Budget Template</u> and <u>Subawardee Budget Template</u>.

#### 8. Budget Justification

Include a budget justification that explains the itemized budget in narrative form. The budget justification shall provide sufficient detail so there is a clear understanding of how the project costs were calculated and why they are necessary. The narrative discussion of the project cost categories and related line items should be presented in the same order as they appear in the itemized budget. If the project requires the purchase of equipment, out-of-state travel, or out-of- or in-state conference registration/attendance expenses, please list and explain here.

Under the terms of our IGA, equipment is defined as any tangible or intangible product, having a useful life of **two years or more**, an acquisition cost of at least **\$500**, and solely purchased for use in the IDOT-ICT project. Equipment purchased on IDOT-ICT projects is to be returned to IDOT at the conclusion of the project, unless otherwise agreed upon. Equipment purchases on IDOT-ICT projects must have a **signed** pre-approval.

Travel expenses should include, but are not limited to, travel to TRP meetings, travel for testing / sampling, etc. Any out-of-state travel expenses and **any** conference expenses charged to the project must have a **signed** pre-approval.

Inclusion of equipment and travel expenses in the project budget and workplan do not meet the requirement for pre-approval. Signed, pre-approval request forms must be submitted prior to the purchase of any equipment or travel meeting the above criteria to be considered allowable expenses on the project. Expenses not meeting this requirement may not be reimbursed.

#### 9. Cooperative Features (if appropriate)

If assistance or cooperation is required from other agencies, public or private, to complete this proposed research, describe the plans for securing this assistance.

#### 10. Appendices (if appropriate)

References or any additional materials deemed necessary may be provided here.