

The logo graphic consists of three overlapping parallelogram shapes pointing to the right. The top shape is light green, the middle is light blue, and the bottom is a darker blue.

CAMBRIDGE
SYSTEMATICS

Think  Forward

Task 2. Strategic plan for improvement of COG/TPB travel demand forecasting methods

presented to

TPB Travel Forecasting Subcommittee

presented by

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March 20, 2026

Our Team

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Developing the Strategic Plan

- Task 2.1 – Gather Input Regarding Travel Demand Forecasting Methods
- Task 2.2 – Strengths, Weaknesses, Opportunities, and Threats (SWOT) Analysis
- Task 2.3 – Strategic Plan Development

Gather Input Regarding Travel Demand Forecasting Methods

- Survey local stakeholders
 - » COG/TPB staff
 - » TFS (you all)
 - » Other model users, and others who are interested
- Peer agency outreach
 - » Other ActivitySim users
 - » Other large MPOs (most have ABMs)

What We'll Ask

- Your experience with the COG/TPB models
- Model applications (e.g., project types, policy analyses)
 - » How well models address the needs of these applications
- What the models do well, or not so well
- What new features would be useful
- Other open-ended comments

SWOT Analysis

- Ability to address policies of greatest interest
- Sensitivity to transportation level of service, demographic segments, and other factors
- How well travel behavior is represented
- Data requirements and ability/cost to obtain
- Model run times/hardware requirements
- Software features and challenges (ActivitySim and modeling software)

Strategic Plan Development

- How to best serve planning requirements (LRTP, conformity, etc.)
- Key Inputs - Technical reports and analyses, stakeholder and staff engagement, prioritization of improvements
- Recommendations and Implementation Steps - Use cases for applications of Gen2 versus Gen3 Models, identifying data needs, addressing the roles of other tools in the COG/TPB toolbox in support of planning and policy analysis, evaluating the pros and cons of DTA and land use models
- Recommended steps for improvement, based on factors such as:
 - » Relevance and importance in serving top priorities;
 - » Expected improvement in model performance and policy sensitivity;
 - » Level of effort required; and
 - » Data availability and requirements.

Schedule

- Task 2.1 – Months 1-3
- Task 2.2 – Months 3-5
- Task 2.3 – Months 6-9