

Assignment 1: Gateways to MIT

The purpose of this assignment is to give you a feel for how people, vehicles, and infrastructure interact in a real-life site. We will assign you to teams of roughly five people, and each team will submit one final report on a site around the campus which is a major gateway to and from MIT, and where different transport needs and modes converge. The assignment involves visiting the site and counting passengers, cars, bikes, etc. in each of the gateway's transportation corridors at different times of day, day of the week, etc. to get a sense for the current and potential travel patterns, capacity, and characteristics of different modes, etc. Once your data has been collected and tabulated, loosely use the "Planning Method" introduced in class to write the final report and answer the questions below.

Each person on the team might contribute one or two paragraphs about their observations during peak and off-peak of the particular element they monitor, as well as contribute to the overall report. While the final report should answer all of the questions below, the format and organization of the document is up to you. Teams and sites will be assigned depending on the number of students participating, and each team member should count, observe, and write up at least one element. Your team should get together and coordinate data collection and the report over the next two weeks. The site visit should preferably be conducted prior to the second class meeting, to support class discussion, but in any event the team visit must be completed, written up and submitted by the third week of the semester – September 22, 2006.

A. Instruction:

- Count traffic, transit vehicles, pedestrians, bicyclists, at the MIT site to which you were assigned
- Try to especially use planning method step 1 & 2
- Observe and count gateway traffic
- Briefly research history of site
- Who are the stakeholders at this site? Who owns what?
- What major travel patterns do you observe?
- What data needs do you see?
- How would you project future continuity?
- What existing and emerging problems do you identify?

B. Method:

- Observe and Count
 - AM Peak (8:00-9:00am)
 - PM Off-peak (~ 9:00pm)
 - Weekend off-peak, Sunday 2:00 pm
- Define Method to Assess History
- Map resources: <http://www.mapjunction.com>, maps.google.com, www.mass.gov/mgis, etc.

C. Gateway Sites, and Elements to be Observed:**1) Kendall Square**

- Red Line – both station entrances
- Lobby of Marriott (pedestrian pass-through to Broadway)
- Intersection of Main St. and Broadway (including loop-around)
- Third Street

- Buses: MBTA, CambridgeSide Galleria shuttle, EZ-Ride blue bus
- Cars
- Bicycles
- Trucks
- Red Line passengers
- Pedestrians

2) Memorial Drive and Mass. Ave.

- Memorial Drive and Mass. Ave., south side and north side, including off/on ramps and turn lanes
- Memorial Drive loop-around to the west
- Bike lanes and Memorial Drive river path

- Buses: M2, 1, CT1, MIT Shuttles, tour buses, other
- Cars
- Bicycles
- Pedestrians
- Trucks

3) Mass. Ave. at Vassar and Albany Streets

- Mass. Ave. at Vassar, both directions, including turn counts
- Mass. Ave. at Albany, both directions, including turn counts
- Railroad (if applicable)

- Buses

- Trucks
- Cars
- Bicycles
- Pedestrians

4) Vassar St. and Main St.

- Vassar Street
- Main Street
- Galileo Galilei Way
- Technology Square entrance
- Railroad (if applicable)

- Buses
- Trucks
- Cars
- Bicycles
- Pedestrians

5) Allston Landing (could require 6-person team)

- River St. / Cambridge St. / Western Ave. and turn lanes
- Massachusetts Turnpike (I-90) ramps
- Storrow Drive
- B.U. Bridge
- Commonwealth Ave
- BU; Harvard; Rail / Truck Freight interface

- Green Line “C” Branch
- MBTA Commuter Rail
- Freight Trains and Yard
- Buses
- Trucks
- Bicycles
- Pedestrians