

Drive-Thru Coffee Trip Generation Data Collected by Portland State University ITE for Montana State University ITE

Data Collected by:

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Introduction:

The original request of MSU for this data collection effort was to get a full weeks count for six drive-thru coffee stands in the Portland area. However, after 10+ contacts were made with various establishments in the area it was apparent that the Portland-area coffee shops did not like to give out their “numbers”. All but one site would not allow tube counters to be set up on their property (their reason was that “We’re not allowed to give out our numbers”). So with little time left to finish the data collection it was decided that the only option was to videotape the drive-thru stands during their operating hours by mounting cameras on light poles near the stands.

Methodology:

Two camera units were borrowed from a local firm. These units consisted of a mailbox, a camera, a hard drive, and a battery. The mailboxes were mounted across the street from the coffee stands. They were mounted on street lights (public property) using tie-downs. Then the battery, hard drive, and camera were mounted inside the mailbox. The units were running during the operating hours of each coffee stand used. When the day was over the cameras were collected and brought to the lab where the info was downloaded and the batteries recharged. For each coffee stand counted the process was repeated. The original intention was to tape 6 coffee stands for 2 days each. Due to equipment malfunction a few stands were only counted once.

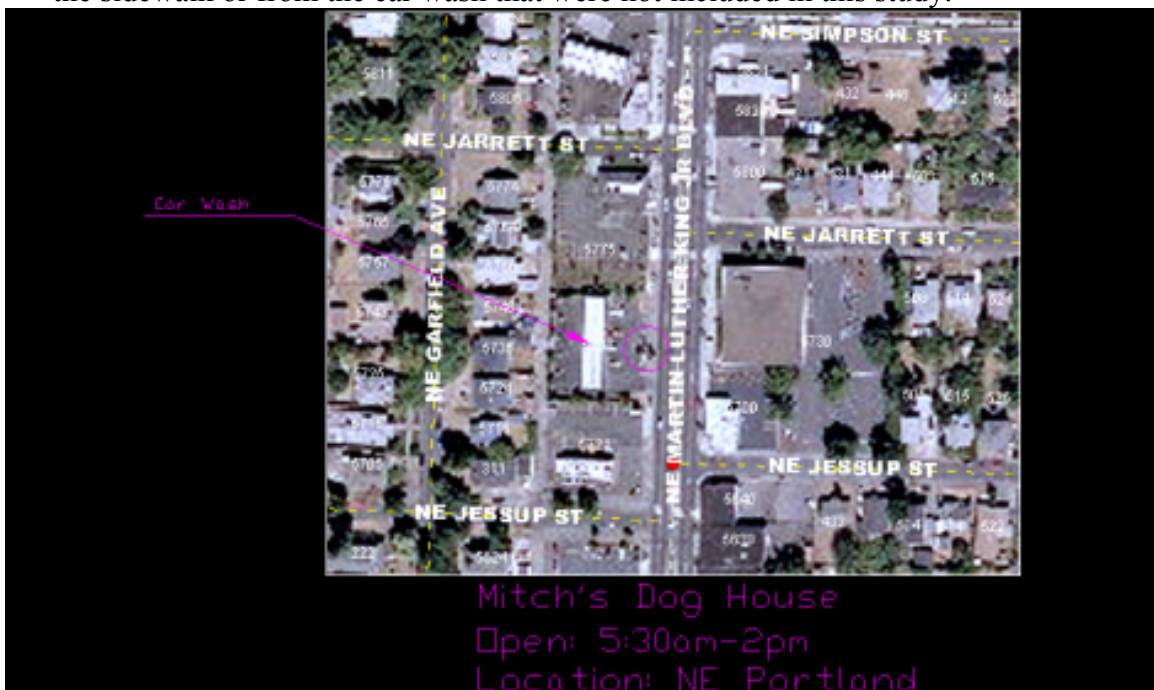
The counts to determine ADT’s for the roads were reported from the City of Portland and the City of Beaverton.

Locations:

1. The Buzz-this stand is located in SE Portland on SE Division St. and SE 115th St. This site is almost in the suburb of Gresham (East of Portland). The coffee stand sits on a large empty dirt lot on the south side of Division. Division has two lanes of traffic in each direction (runs E-W), a turning lane (suicide lane) and parking on both sides. The coffee stand is accessible on both sides (two windows to order from).



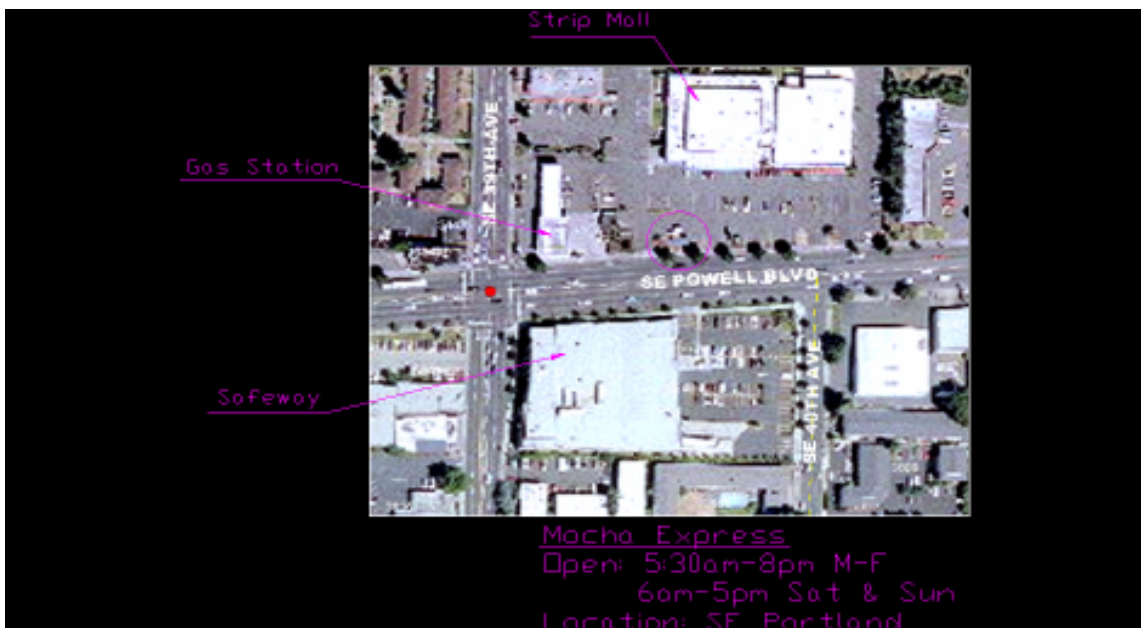
2. Mitch's Dog House-this coffee stand is located in NE Portland on Martin Luther King Dr. near the intersection of MLK and Jessup St. The stand sits in the lot of a self-serve car wash on the west side of MLK (MLK runs N-S). MLK has two lanes of traffic in each direction and no parking. It is important to note that this stand has few daily drive-thru trips probably because it is located between two *Coffee People* (include walk-in and drive-thru) establishments that are about a mile apart. Mitch's Dog House did have a number of customers walk-up from the sidewalk or from the car wash that were not included in this study.



3. Mocha Delight-this coffee stand is located in SW Portland on Barbur Blvd near the intersection of Barbur and 30th. Barbur runs N-S and has two lanes in both directions and a suicide lane. Parking is allowed south of the stand on Barbur (see picture). The stand itself sits in the North corner of the lot of an empty building. Note that 30th is a dead end on the south side of Barbur.



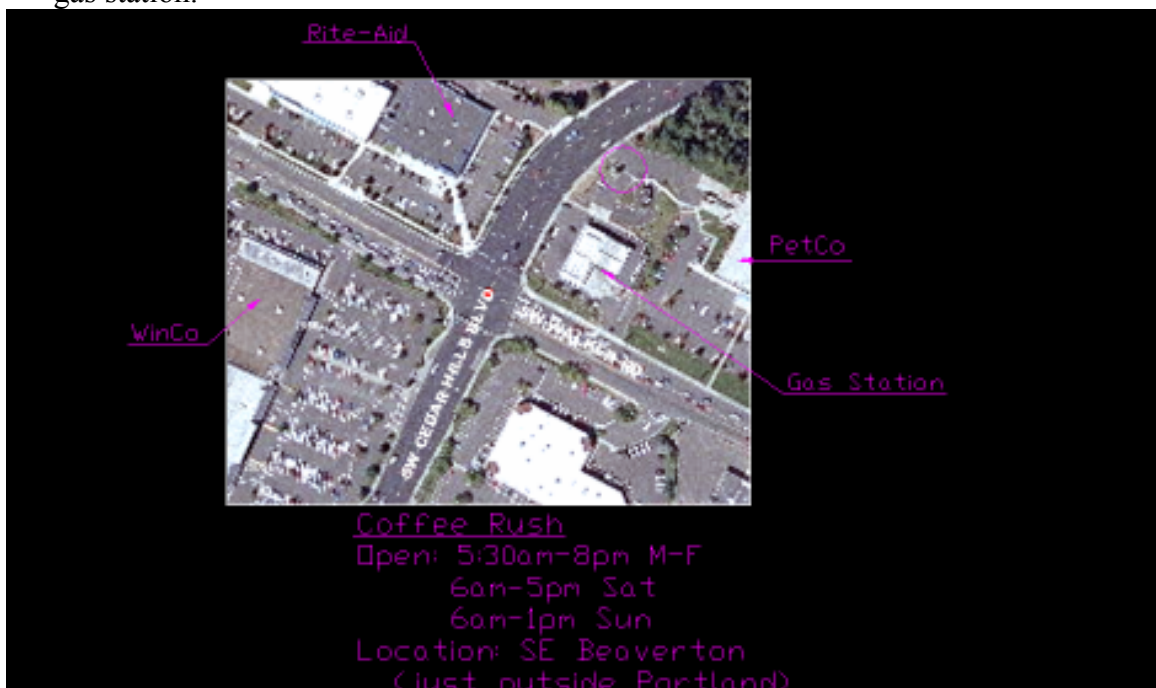
4. Mocha Express-this stand is located in SE Portland on Powell Blvd (Hwy 26) near the intersection of Powell and 39th. Powell runs E-W and has two lanes of traffic in both directions. The stand sits in the parking lot of a small strip mall on the North side of Powell.



5. Java Station-this stand is located in NW Portland at the intersection of Cornell and Saltzman Rd. Saltzman runs N-S. The stand sits in the parking lot of a strip mall that includes an ACE Hardware and a Rite Aid. Cornell and Saltzman both have one lane of traffic in each direction.



6. Coffee Rush-this stand is located in SE Beaverton (suburb west of Portland) on Cedar Hills Rd near the intersection of Cedar Hills and Walker Rd. Cedar Hills runs E-W and has two lanes in both directions. Walker runs N-S and contains one lane of traffic in each direction. The stand sits in a side lot of PetCo near a gas station.



Data Collected: (*Count means vehicles served per time period)

| | | |
|-----------------------------------|-------|------------------|
| Location: Mitch's Dog House (MLK) | | Date: 5/13/2005 |
| Weather: Cloudy 60° | | Time: 5:30am-2pm |
| Time Period | Count | |
| 5:30-6am | 5 | |
| 6-7am | 4 | |
| 7-8am | 10 | |
| 8-9am | 8 | |
| 9-10am | 7 | |
| 10-11am | 4 | |
| 11-12pm | 3 | |
| 12-1pm | 2 | |
| 1-2pm | 3 | |
| Total= | | 46 |

| | | |
|-------------------------------|-------|-----------------|
| Location: The Buzz (Division) | | Date: 5/13/2005 |
| Weather: Showers 55° | | Time: 6am-7pm |
| Time Period | Count | |
| 6-7am | 13 | |
| 7-8am | 22 | |
| 8-9am | 11 | |
| 9-10am | 9 | |
| 10-11am | 4 | |
| 11-12pm | 4 | |
| 12-1pm | 3 | |
| 1-2pm | 2 | |
| 2-3pm | 2 | |
| 3-4pm | 3 | |
| 4-5pm | 5 | |
| 5-6pm | 1 | |
| 6-7pm | 1 | |
| Total= | | 80 |

Location: Mocha Express (Powell)

5/16/2005

Weather: Raining 55°

Time: 5:30am-8pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 7 |
| 6-7am | 23 |
| 7-8am | 8 |
| 8-9am | 13 |
| 9-10am | 4 |
| 10-11am | 3 |
| 11-12pm | 7 |
| 12-1pm | 4 |
| 1-2pm | 5 |
| 2-3pm | 6 |
| 3-4pm | 6 |
| 4-5pm | 3 |
| 5-6pm | 5 |
| 6-7pm | 2 |
| 7-8pm | 4 |
| Total= | 100 |

Location: Mocha Express (Powell)

Date: 5/17/2005

Weather: Raining 55-60°

Time: 5:30am-8pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 8 |
| 6-7am | 10 |
| 7-8am | 24 |
| 8-9am | 18 |
| 9-10am | 10 |
| 10-11am | 6 |
| 11-12pm | 5 |
| 12-1pm | 4 |
| 1-2pm | 5 |
| 2-3pm | 4 |
| 3-4pm | 7 |
| 4-5pm | 4 |
| 5-6pm | 2 |
| 6-7pm | 3 |
| 7-8pm | 2 |
| Total= | 112 |

Location: Mocha Delight (Barbur) Date: 5/16/2005

Weather: Raining 55-60°

Time: 5:30am-1pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 5 |
| 6-7am | 14 |
| 7-8am | 18 |
| 8-9am | 23 |
| 9-10am | 7 |
| 10-11am | 5 |
| 11-12pm | 3 |
| 12-1pm | 2 |
| Total= | 77 |

Location: Mocha Delight (Barbur) Date: 5/17/2005

Weather: Partly Cloudy
60°

Time: 5:30am-1pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 3 |
| 6-7am | 14 |
| 7-8am | 16 |
| 8-9am | 12 |
| 9-10am | 9 |
| 10-11am | 4 |
| 11-12pm | 2 |
| 12-1pm | 1 |
| Total= | 61 |

Java Station (Cornell & Saltzman) Date: 5/18/2005

Weather: Raining 55° Time: 5:30am-5pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 3 |
| 6-7am | 22 |
| 7-8am | 36 |
| 8-9am | 32 |
| 9-10am | 19 |
| 10-11am | 12 |
| 11-12pm | 9 |
| 12-1pm | 6 |
| 1-2pm | 7 |
| 2-3pm | 4 |
| 3-4pm | 5 |
| 4-5pm | 3 |
| Total= | 158 |

Java Station (Cornell & Saltzman) Date: 5/19/2005

Weather: showers 55° Time: 5:30am-5pm

| Time Period | Count |
|-------------|-------|
| 5:30-6am | 1 |
| 6-7am | 31 |
| 7-8am | 42 |
| 8-9am | 30 |
| 9-10am | 25 |
| 10-11am | 15 |
| 11-12pm | 7 |
| 12-1pm | 3 |
| 1-2pm | 10 |
| 2-3pm | 6 |
| 3-4pm | 3 |
| 4-5pm | 2 |
| Total= | 175 |

| | | |
|--|-------|------------------|
| Location: Coffee Rush (Cedar Hills & Walker) | | Date: 5/23/2005 |
| Weather: Partly Cloudy 65° | | Time: 5:30am-8pm |
| Time Period | Count | |
| 5:30-6am | 8 | |
| 6-7am | 36 | |
| 7-8am | 49 | |
| 8-9am | 60 | |
| 9-10am | 33 | |
| 10-11am | 22 | |
| 11-12pm | 13 | |
| 12-1pm | 15 | |
| 1-2pm | 10 | |
| 2-3pm | 14 | |
| 3-4pm | 12 | |
| 4-5pm | 9 | |
| 5-6pm | 5 | |
| 6-7pm | 5 | |
| 7-8pm | 2 | |
| Total= | 293 | |

Determination of ADT's:

Counts have been provided by the City of Portland (see ADT Determination Counts attachment) to help determine ADT's for each location. The values provided are counts that were conducted by the city close to each location used in this report. These counts do not provide the necessary hourly volumes to allow any relationship to hourly volumes on roadways during the evaluation period and were deemed to be relatively inappropriate for this data collection effort.

Further Comments:

This report was written to provide the obtained data and any other information that seemed relevant to the process

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