Attributes and Amenities of Highway Systems Important to Tourists

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Tourism and Transportation

• Tourism is a system (not an industry) with transportation as a major component
• Highways have been neglected as part of the user experience
• Domestic rural tourism in the U.S. heavily dependent on highway infrastructure
• Is there an economic relationship?

Research Design

• Survey Instrument
  • Benefits
  • Reasons for Highway Selection
  • Driving Attitudes
  • Road Features

Tourists Interviewed along Highway
Table 1: Description of Road Segments

| Segment | Length (miles) | Mn/DOT District Number of lanes Divided/Not Divided Natural Elements |
|---------|---------------|------------------------|--------------------------|---------------------|
| St. Louis CSAH 61 Brighton Beach Road to Two Harbors | 16 | 1 | 2 | Not Divided | Lake, cliffs, forests |
| TH 38 Grand Rapids to Bigfork | 40 | 1 | 2 | Not Divided | Lakes, forests, hills |
| TH 53 Independence to Virginia | 39 | 1 | 4+ | Divided | Lakes, forests |
| I 35 Carlton to Duluth | 15 | 1 | 4+ | Divided | Lake, city, harbor |
| TH 11 Baudette to International Falls | 60 | 2 | 2 | Not Divided | Forests, lakes |
| TH 2 Bemidji to Ball Club | 45 | 2 | 2 | Not Divided | Lakes, forests |
| TH 371 Nisswa to Pine River | 29 | 3 | 2 | Not Divided | Lakes, forests |
| TH 28 and TH 29 Sauk Centre to Starbuck via Glenwood | 40 | 4 | 2 | Not Divided | Lakes, woods, farmland |
| TH 95 Taylors Falls to Stillwater  | 26 | Metro | 2 | Not Divided | River, woods, cliffs |
| TH 16 La Crescent to Preston via Lanesboro | 46 | 6 | 2 | Not Divided | Forests, cliffs, river |
| Nicollet CSAH 21 TH 15 to Fort Ridgely State Park | 16 | 7 | 2 | Not Divided | River, woods, farms |

Findings

- Roads have distinct and recognizable character
- Highway attributes/amenities with the most difference
  - Vegetation
  - Business development
  - Scenic vs fastest route
  - Shoulder and safety issues
Table 2: Most Interesting Aspects of Road Segments

<table>
<thead>
<tr>
<th>User Segment</th>
<th>Small towns</th>
<th>Lakes and rivers</th>
<th>Farms</th>
<th>Recreational opportunities</th>
<th>Nature scenery</th>
<th>Historic or cultural sites</th>
<th>Shopping</th>
<th>Forests</th>
<th>Other</th>
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User Segments

- Driving for Pleasure
  - Engage in low cost entrance/exit activities
  - Looking for small towns
  - Being with F&F, get away, enjoy scenery
- Scenic Byway selectors
  - Something special to be found
- Safe and Fast (10-15%)

Concerns

- Does preference lead to action?
- Limited to summer driving
- Only contacted people who were stopped
Conclusions

- Users of road segments were able to differentiate between the attributes and amenities found along a particular road and indicate their preference for each one.
- There is strong evidence that different user groups using the same roadway seek different benefits from the driving experience.

Next Steps

- Development of a Diagnostic Tool for User Evaluation of Highways
- Laboratory testing using Human Factors Simulator
- Test for psychological and physiological response
- Create an easy to use instrument for highway evaluation