Virginia’s Highway Performance

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Remarks to the
Virginia State Transportation Board
Winchester, VA

September 17, 2008
Overview

- Expenditures
- System Condition

- Compare with nearby and others:
  - NC
  - WV
  - TX
  - MD
Highway Performance Trends

Figure 1: Trends in US Highway Performance

Performance vs 1998


*Int = Interstate, Urb=Urban

- Disbursements
- Urb Int Congestion
- Narrow Lanes
- Fatality Rate
- Deficient Bridges
- Rural Int Condition
- Urban Int Condition
- Rural Primary Condition
- Narrow Lanes
- Better
- Worse
System Size

Miles Under State Control, 2006

- Maryland: 137,060
- North Carolina: 79,067
- Texas: 79,849
- Virginia: 57,481
- West Virginia: 34,087

Legend:
- Other
- SHA Miles
Budgets

Highway Budgets, $K, 2006

- Other Disp
- Admin/Res/Plng
- Maint/Hy Services
- Capital

Maryland
North Carolina
Texas  $2.83 B
Virginia
West Virginia

$ 2.83 B
Disbursements vs. System Size

Disbursements/Mile of Resp, $ 2006

- Capital Disb/Mile Resp
- Maint Exp/Mile Resp
- Admin $ per mile Resp

Maryland
North Carolina
Texas
Virginia
West Virginia
Road Condition

Pavement Condition, Percent Poor, 2006

Maryland: 0.0%
North Carolina: 4.0%
Texas: 0.0%
Virginia: 0.1%
West Virginia: 4.0%

Legend:
- Rur Int %
- Rural OPA %
- Urban Int %
Urban Interstate Condition

Percent UI in Poor Condition

UI = Poor Condition Rank
0 to 10
11 to 20
21 to 30
31 to 40
41 to 50
51 to 60
61 to 70
71 to 80
81 to 90
91 to 100

[Map of the United States with different colors indicating the percentage of Urban Interstate in poor condition.]
Rural Arterial Condition
Congestion, Narrow Lanes and Bridges

![Bar chart showing congestion, narrow lanes, and deficient bridges for different states.

- Maryland: Urb Int % Cong. (70%), Rur OPA % <12' (20%), Bridges % Def (5%)
- North Carolina: Urb Int % Cong. (60%), Rur OPA % <12' (30%), Bridges % Def (10%)
- Texas: Urb Int % Cong. (50%), Rur OPA % <12' (40%), Bridges % Def (15%)
- Virginia: Urb Int % Cong. (42.6%), Rur OPA % <12' (29.5%), Bridges % Def (23.1%)
- West Virginia: Urb Int % Cong. (30%), Rur OPA % <12' (20%), Bridges % Def (10%)
Urban Interstate Congestion
Fatality Rates

<table>
<thead>
<tr>
<th>State</th>
<th>Rate/ 100 mil. mi.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maryland</td>
<td>1.16</td>
</tr>
<tr>
<td>North Carolina</td>
<td>1.54</td>
</tr>
<tr>
<td>Texas</td>
<td>1.47</td>
</tr>
<tr>
<td>Virginia</td>
<td>1.20</td>
</tr>
<tr>
<td>West Virginia</td>
<td>1.98</td>
</tr>
</tbody>
</table>
Fatality Rates
### State Rankings, 2006

<table>
<thead>
<tr>
<th>State</th>
<th>Financial</th>
<th>System Perf</th>
<th>Overall</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maryland</td>
<td>43</td>
<td>25</td>
<td>37</td>
</tr>
<tr>
<td>North Carolina</td>
<td>3</td>
<td>23</td>
<td>24</td>
</tr>
<tr>
<td>Texas</td>
<td>20</td>
<td>12</td>
<td>13</td>
</tr>
<tr>
<td>Virginia</td>
<td>11</td>
<td>16</td>
<td>2</td>
</tr>
<tr>
<td>West Virginia</td>
<td>37</td>
<td>24</td>
<td>37</td>
</tr>
</tbody>
</table>

The chart shows the rankings for different states in 2006, with categories for Financial, System Perf, and Overall.
Overall Ranks, 2006
Summary:
Virginia’s State-Owned Highways, 2006

- 57505 miles, 3rd largest
- $2.83 B budget, 7th largest
  - 34% “Capital”, 1st
  - 37.5% “Maintenance”

- Status
  - Rural Interstate Pavement, 1st (tie)
  - Urban Interstate Pavement, 28th
  - Rural Primary Pavement, 16th
  - Urban Interstate Congestion, 22nd
  - Fatality Rate, 16th
  - Deficient Bridges, 22nd
  - Narrow Lanes, 45th

- Overall Rating, 16th

Study at reason.org, June 2008
Additional Information

- Performance of Lower Systems
- Sub-State Performance, Budget, Effort
- Tie Maintenance to Condition, Expenditure, and Effort
- Track Sub-State Condition over Time
- ‘Real-time’ Traffic and Condition
- Map-based Condition and Traffic
- Integrate with Municipal Data
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