

Guidelines for Interstate Speed Limits

General Concept:

According to the Code of Virginia the interstate speed limit can vary from 55 to 70 mph. Each 5 mph increment has specific applicability, and the most appropriate speed limit is determined based on a traffic engineering study and the application of engineering judgment.

The 55 mph speed limits are most appropriate for core urban or downtown areas. Such corridors typically carry a heavy volume of traffic and there is daily recurring congestion.

The 60 mph speed zones may be appropriate on interstate highways approaching urbanized areas and / or within urbanized areas. These are areas where the roadway and land use characteristics as well as other traffic operational elements are in-between urban and rural conditions. Some congestion may occur, but not as much as in the core urban area.

The 65 mph and in some locations the 70 mph, speed limit is appropriate on interstate highways in rural areas. The higher speed limits are appropriate on corridors where minimal congestion occurs and no significant crash problems or safety concerns exist. The roadway segment should not contain any curves or grades or other physical characteristic that would limit safe travel at a higher speed.

The 70 mph speed zone is appropriate on rural interstate highways that in every way qualify to be posted at 65 mph, but that have the additional distinction of having no recurring congestion, and have below average crash, death & injury rates. Also, the grades and physical characteristics must be such that all vehicles that typically travel the corridor can consistently maintain the 70 mph speed limit.

Guidelines for the Traffic Engineering Study

The following elements/criteria/features/guidelines for a Speed Study were identified:

1. Speed Analysis
2. Accident Analysis
3. Operational Analysis: includes traffic volumes, percentage of trucks, congestion, etc.
4. Physical Roadway Conditions: includes interchange spacing, design speed for facility and curves, and roadside features.
5. Land Use Characteristics
6. Special Features
7. Consistency
8. Consideration of Adjacent Speed Limits

The decision to post a particular speed limit shall be made on the basis of an engineering study and the application of engineering judgment. These guidelines provide a general procedure and criteria for setting speed limits and shall not be considered a substitute for engineering judgment.

Specific guidelines or criteria were established as follows:

| Feature | Guideline | | | |
|-------------------------------------|--|---|--|--|
| | 70 MPH | 65 MPH | 60 MPH | 55 MPH |
| Speed Analysis | 85 th Percentile Speed, Pace speed, & Ave. speed. | 85 th Percentile Speed, Pace speed, & Ave. speed. | 85 th Percentile Speed, Pace speed, & Ave. speed. | 85 th Percentile Speed, Pace speed, & Ave. speed. |
| Accident Analysis & Data | Below the statewide average crash rate for rural interstates. | Below or close to the statewide average crash rate for rural interstates. | In-between the urban and rural statewide average crash rate. | Higher than or close to the statewide average crash rate for urban interstates. |
| Traffic Operations | Free of recurring congestion; the vehicle composition and the roadway characteristics are such that speeds are not significantly affected. | Minimal congestion | Some occasional congestion may occur. | Congested facility with daily recurring congestion. Heavily traveled corridor. |
| Land Use | Rural | Rural | Suburban/Industrial /Commercial | Core Urban / Downtown conditions |
| Physical Conditions | Interchange spacing over 3 miles. | Interchange spacing over 3 miles. | 2 to 3 miles spacing for suburban conditions. | Closely spaced interchanges and conflict points. Average spacing between 1 to 2 miles or less. |
| Physical Conditions | No limitations imposed by design speed, grade, curves, roadside features | No limitations imposed by design speed, grade curves, roadside features. | In-between characteristics. | Limitations imposed by design speed, curves, and roadside features. |