**Texas A&M
Transportation
Institute**

Setting Speed Limits: English Version

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Cooperative Research Program

TEXAS A&M TRANSPORTATION INSTITUTE

COLLEGE STATION, TEXAS

SOME FACTS ABOUT DRIVERS, SPEED, AND SPEED LIMITS

Drivers and the Driving Environment

Numerous factors influence the speed selected by a driver, with the factors and amount varying based on conditions present. The number on the speed limit sign is a clear factor, along with the number of driveways, signals, curves, the widths of road features, and roadside objects. Weather, the day of the week, and natural light levels all play a role in driver speed choice. The amount of enforcement can strongly impact compliance with the posted speed limit.

Speed Limits and Driver Behavior

Changing speed limits can influence driver speed, but not as much as the change shown in the number on the sign. Research has found that a 5-mph speed limit reduction produces about a 1-mph reduction in average driver speed. For rural roads, increasing a speed limit by 10 mph increases average driver speed by only 3 to 5 mph.

Speed Limits and Safety

The speed-crash relationship is complex; research findings differ across studies, datasets, and speed measures. Several studies have identified speed variation (the range of individual driver speeds on the roadway) to have an adverse effect on safety. A recent study using data on city streets showed that crashes were lowest when the posted speed limit was within 5 mph of drivers' average speed. This same study confirmed that greater speed variation is linked to increased crashes. Recent research on high speed roads has also established a link between large speed variations and more severe crashes.

FOR MORE INFORMATION

To learn more about TxDOT and how speed limits are set, contact your local district office, or visit **www.txdot.gov.**

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4250 N. Clack
Abilene, Texas 79601

Amarillo (806) 356-3200
5715 Canyon Drive
Amarillo, Texas 79110

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701 E Main Street
Atlanta, Texas 75551

Austin (512) 832-7000
7901 N. I-35
Austin, TX 78753

Beaumont (409) 898-5745
8350 Eastex Freeway
Beaumont, Texas 77708-1701

Brownwood (325) 646-2591
2495 Highway 183 North
Brownwood, Texas 76802

Bryan (979) 778-2165
2591 North Earl Rudder Freeway
Bryan, Texas 77803-5190

Childress (940) 937-2571
7599 US 287
Childress, Texas 79201-9705

Corpus Christi (361) 808-2275
1701 S. Padre Island Drive
Corpus Christi, TX 78416

Dallas (214) 320-6100
4777 E. Highway 80
Mesquite, TX 75150-6643

El Paso (915) 790-4204
13301 Gateway West
El Paso, TX 79928-5410

Fort Worth (817) 370-6500
2501 S W Loop 820
Fort Worth, Texas 7613

Houston (713) 802-5000
7600 Washington Avenue
Houston, Texas 77007

Laredo (956) 712-7400
1817 Bob Bullock Loop
Laredo, TX 78043

Lubbock (806) 745-4411
135 Slaton Road
Lubbock, Texas 79404-5201

Lufkin (936) 633-4321
1805 N. Timberland Drive
Lufkin, Texas 75901

Odessa (432) 498-4697
3901 E. Highway 80
Odessa, Texas 79761

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1365 N. Main Street
Paris, TX 75460

Pharr (956) 702-6100
600 W. Interstate 2
Pharr, TX 78577

San Angelo (325) 944-1501
4502 Knickerbocker Road
San Angelo, TX 76904

San Antonio (210) 615-1110
4615 NW Loop 410
San Antonio, Texas 78229-0928

Tyler (903) 510-9100
2709 W. Front St.
Tyler, TX 75702

Waco (254) 867-2700
100 S. Loop Drive
Waco, TX 76704-2858

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1601 Southwest Parkway
Wichita Falls, TX 76302

Yoakum (361) 293-4300
403 Huck Street
Yoakum, Texas 77995

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Texas Department of Transportation

SETTING SPEED LIMITS

Texas Department of Transportation

EVER WONDER HOW SPEED LIMITS ARE SET?

SPEED LIMIT 50

STEP 1

Speed Limit Change Request:
Anyone can request a speed limit change. This is the first step in TxDOT conducting a speed study investigation to determine if such a change is warranted.
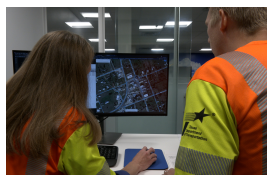
STEP 2

Data Collection and Study:
TxDOT collects field speed data to determine if the change is needed. The local TxDOT engineer also studies driver sightlines, road characteristics, and driveways (along with other speed-related safety concerns) to develop a recommended speed limit.

STEP 3
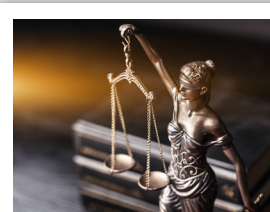
Recommendation Review:
TxDOT headquarters staff review the recommendation, verify the findings, and ensure consistency in how new speed limits are developed across the state. Once the review is complete, the new speed limit can be adopted.

STEP 4

Legal Framework:
The roadway's governing agency must provide a legal basis to enforce the new speed limit. A city council passes a new municipal ordinance for local streets; the Texas Transportation Commission approves a minute order for state roadways.

STEP 5

Sign Installation:
Once TxDOT staff install the new speed limit signs, the new limit is now enforceable. Though most jurisdictions allow a grace period for issuing warnings, law enforcement can cite violators for speeding any time after installation.

Who decides that this stretch of road should be 45 mph, while the stretch just over the hill is 55 mph? Why an interstate highway crossing west Texas is posted at 80 mph, while the limit on the same highway drops to 65 mph as it approaches the city?

Those speed limits aren't random. We don't pick a number arbitrarily and put it on the signs. There is research behind the process of establishing speed limits, and decades of experience guiding those decisions.

State law establishes the framework for speed management in Texas. Maximum speed limits are set by road type and driving environment; 30 mph for urban districts or streets, 60 mph on non-urban, non-state roadways, and 70 mph on non-urban state or federal roadways.

Some exceptions to these rules are allowed and managed under the authority of the Texas Transportation Commission. Speed limits can be adjusted and changed within these guidelines after being studied using the five-step process shown.