## Know stopping distances to keep safer following distances!!

The National Highway Transportation Safety Administration reports 28 percent of crashes because of tailgating, 2,000 deaths a year and 955,000 injuries a year. Drivers ignorant of stopping distances cause tailgating crashes.

It is hard to get a perfect stopping distance chart because of varying situations such as used brake pads, lack of scanning to perceive and then to react to hazardous situations. Several charts will be given, but, first, consider:

Dangers of Following too Close

Many dangers arise from tailgating situations, for both the car ahead and the vehicle doing the tailgating.

- **Tailgating severely limits stopping time** With so little space between vehicles, if the first vehicle stops suddenly or maneuvers, the tailgating vehicle has little to no time to safely stop and avoid a collision.
- **Tailgating limits vision** When tailgating another vehicle, your forward line of vision is severely blocked by that vehicle. You may not be able to see upcoming hazards due to this, such as potholes in the road. The vehicle in front will also kick up more dirt, water, and debris onto your windshield, further limiting vision.
- **Tailgating has the potential to cause road rage** This is because tailgating is typically viewed as an invasion of space by the driver being tailgated. The tailgated driver may intentionally hit his or her brakes or retaliate in other ways.
- The tailgated driver may feel intimidated This can lead to stress, which pulls attention away from the task of driving, increasing the risk of an accident if the driver fails to notice hazards such as road conditions or traffic.

The Omni Calculator has the following total stopping distances at

10 mph – dry roads 41 ft (13m) and wet roads 43 ft (13m)

20 mph – dry roads 93 ft (28 m) and wet roads 107 ft (32 m)

30 mph – dry roads 153 ft (47 m) and wet roads 195 ft (59 m)

40 mph – dry roads 223 ft (68 m) and wet roads 311 ft (95 m)

50 mph – dry roads 302 ft (92 m) and wet roads 457 ft (139m)

60 mph – dry roads 392 ft (120 m) and wet roads 636 ft (194 m)

70 mph – dry roads 491 ft (150 m) and wet roads 849 ft (259 m)

Carforsale.com emphasizes to remember that stopping distances increase with your speed. Doubling your speed from 20 mph to 40 mph quintuples your stopping distance. Triple your speed, comparing 20 mph to 60 mph, and you'll need 16 times the stopping distance you did at 20 mph. Their stopping distance formula breaks down as follows:

- 20 mph: 22 ft. perception distance + 22 ft. reaction distance + 25 ft. stopping distance = 69 ft.
- 30 mph: 33 ft. perception distance + 33 ft. reaction distance + 57 ft. stopping distance = 123 ft.
- 40 mph: 44 ft. perception distance + 44 ft. reaction distance + 101 ft. stopping distance = 189 ft.
- 50 mph: 55 ft. perception distance + 55 ft. reaction distance + 158 ft. stopping distance = 268 ft.
- 60mph: 66 ft. perception distance + 66 ft. reaction distance + 227 ft. stopping distance = 359 ft.

•

Is speeding and following too closely to save time worth it? A U. Army study that involved the average 15-mile commute revealed time going the speed limits and the time going over 10 mph. of the speed limits:

15-miles with 35 mph speed=25.71 minutes ... over 10 mph – saved 5.71 minutes 15-miles with 50 mph speed=18 minutes ... over 10 mph – saved 3 minutes 15-miles with 65 mph speed=13.85 minutes ... over 10 mph – saved 1.85 minutes

Speeding goes beyond breaking the law. It endangers themselves and those around them. The National Highway Traffic Safety Administration shares more dangers:

Higher risk of losing control of the vehicle Reduced effectiveness protection equipment Increased stopping distances Higher crash severity Increased fuel consumption

Another chart of breaking distances will be on the next/last page.

## **Braking/Stopping Distances**

МРН	Ft./Sec.	Braking Deceleration Distance	Perception Reaction Distance	Total Stopping Distance
10	14.7	5	22	27
15	22	11	33	44
20	29.3	19	44	63
25	36	30	55	85
30	44	43	66	109
35	51.3	59	77	136
40	58.7	76	88	164
45	66	97	99	196
50	73.3	119	110	229
55	80.7	144	121	265
60	88	172	132	304
65	95.3	202	143	345
70	102.7	234	154	388
75	110	268	165	433
80	117.3	305	176	481
85	124.7	345	187	532
90	132	386	198	584

National Association of City Transportation
-3-