

Reeve School of Motoring
01767 261433 mob: 07531084163

How to: Change Gears - When and Why

Caution! When driving, you should be able to change gears without looking down at the lever or your feet. Practise this sitting in the car with the engine switched off and the clutch pressed down.

The examiner on your driving test will expect you to:-

- Use the controls smoothly and correctly
 - Balance the accelerator and clutch to move away smoothly
 - Accelerate evenly
 - Avoid stalling the car
 - Choose the right gear and change in good time before a hazard
 - Brake gently and in good time
 - Know how and when to apply the hand brake
-

In most vehicles the first 4 gears form an 'H' appearance on the gear lever. Neutral is the middle position in the 'H' formation on the gear stick. To engage reverse gear you sometimes have to either push the gear lever down or lift it up towards you. Different vehicles have a different set up. So always check where reverse is on a new vehicle.

Reverse is often in one of the 3 positions marked in dotted red in the diagram opposite. There may also be a 5th gear.

- **1st Gear** is used for moving off, manoeuvring and for creeping slowly in traffic and at junctions.
- **2nd Gear** is used for moving off down very steep hills, building up speed after moving away and driving at low speeds.
- **3rd Gear** is used to build up speed and when you need more power for climbing hills. It also increases your control when going down steep hills and dealing with some bends.
- **4th Gear** is used for driving at speeds generally higher than 30 mph, where there are no hazards to confront.
- **5th Gear** not all vehicles have a 5th gear. which gives better fuel economy. This is normally used on open roads when travelling constantly at higher speeds.

To Practise - change UP through the gears on the road, first find a fairly straight, wide road where there is little or no other traffic. Move off in first gear and change into 2nd gear as soon as you can. Accelerate to about 15-20 mph, then change into 3rd gear. Accelerate in 3rd to 25-30 mph and then change into 4th. You will only need to practise using the 5th gear when you are competent using the first 4 gears.

To Practise - change DOWN through the gears When you have built up your speed to 30 mph and you are in 4th gear, Check the mirror to make sure it is safe. Brake gently to slow the car down to about 20 mph. Keep the brake pressure applied to reduce the risk of **coasting** and change into 3rd gear. Check the mirror again and, if safe, reapply the brake gently and slow down to about 10 mph. Keep the brake pressure applied to reduce the risk of **coasting** and change into 2nd gear. Check the mirror, if safe, build up your speed, changing up the gears, until you reach 30 mph again. Keep practising until you feel confident.

•The build up of speed through the gears can be greatly increased as you get more confident and depending on the road and traffic conditions. For example, Speed limits, weather conditions, traffic flow.

•For example, first gear can accelerate to 15-20 mph, second gear 20-30mph, third gear 30-60mph, fourth gear 40-70mph 5th gear 50-70mph

About Block Gear Changes

Some drivers have a habit of always changing through the gears one-by-one (1,2,3,4,5 - 5,4,3,2,1). This habit has stuck with some older drivers from when they originally learned to drive many years ago.

Today, in a normal car and for everyday on-road driving, it is not generally good practice to use the gears in this way. We can change down the gears in blocks (5th to 2nd or 4th to 2nd. etc)

Over the years, motor car design and engineering has improved.

Compared with cars of even ten years ago, modern cars are lighter, more powerful and more aerodynamic. These changes mean that the driving method that was essential in older cars is no longer needed in modern driving.

It is not necessary to change gears in sequence. For example: If you are driving along at 50 mph in 5th gear, and you want to turn left into a side road, you may be able to do so without having to stop. As you approach the junction you need to reduce your speed (using your brake) until you are going slowly enough to take the junction safely. When you have slowed down to a safe speed using the brakes, you have to select a gear that will drive the car comfortably at that speed. In most cars the best gear for the job will be 2nd. So, move the gear lever directly to the second gear position skipping the other gears.

The benefits of this style of driving include better fuel economy, less overall wear and tear, less driver fatigue on long journeys and more steering control in emergencies.

A typical set up on a modern gearbox. Note though how reverse may differ.

