Lab - Spare Tire

Students: 1. _____ Date: _____
2._____ Block:_____
3._____

VEHICLE IDENTIFICATION			
Year:		Make:	
Model:		Mileage:	
VIN Number:			

GETTING STARTED

- ☐ Find and remove your car's spare tire, jack and tire iron
  - Underneath the floor mat in the trunk
  - Mounted on the tailgate (SUVs for example)
  - Underneath the vehicle (trucks, for example)
- ☐ Make sure that the car is in gear (or in "park" if the car is an automatic) and the emergency brake is set
- ☐ The car should be parked on a flat piece of pavement
  - Do not attempt to change a flat if the car is on a slope or if it is sitting on dirt - the uneven ground may cause the car to fall! VERY DANGEROUS
- ☐ Block the tire opposite of the flat tire
  - Blocking the tire aids in preventing the car from rolling off the jack
  - If the left front tire is flat, place a brick or other large, heavy object behind the right rear tire
- ☐ Use the tire iron (the L-shaped bar that fits over the wheel nuts) to loosen but not remove each wheel nut (having the wheel on the ground helps hold the wheel while you loosen them)

STOP! INSTRUCTOR'S INITIALS: ☐

RAISING THE VEHICLE

- ☐ Place the jack underneath the car's jacking points
  - If you don't know where the proper jacking points are, look them up in the owner's manual, or ask your Instructor
- ☐ Most car jacks nowadays are a screw-type scissor jack, which expands when a knob at the end of the jack is turned by the provided metal hand crank
- ☐ Raise the jack until it contacts the car's frame and continue expanding the jack until the tire is off the ground

INSTALLING THE SPARE

- ☐ Remove the Flat and Install the Spare
- ☐ Raise the car with the jack until the flat tire is completely raised off the ground

- ☐ Remove the wheel nuts completely
- ☐ Set the nuts aside in a secure location where they can't roll away (like the hub cap?)
- ☐ Position the spare tire over the wheel studs
  - It may help to balance the tire on your foot while moving it into position.
- ☐ HAND-THREAD each of the wheel nuts back on
  - Do not cross-thread them; they should screw on easily
- ☐ Make sure that the wheel is fitting flush against the brake hub and that all the lug nuts are threaded evenly
- ☐ Use the tire iron to snug the wheel nuts

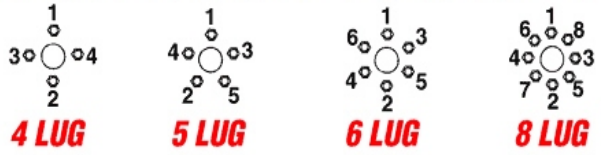
STOP! INSTRUCTOR'S INITIALS: ☐

LOWERING THE CAR

- ☐ Carefully lower the jack
- ☐ Pull the jack away from the vehicle
- ☐ Tighten down the nuts evenly and completely - use a "criss-cross" tightening pattern
  - Always use a torque-wrench

Typical Lug Nut Torque Specifications

Tighten Lug Nuts in a Criss-Cross Pattern for Best Equal Torque Distribution.



Lug Size	Ft/Lbs Torque
7/16"	55-65
1/2"	75-85
9/16"	95-115
5/8"	135-145
12mm	72-80
14mm	85-95

IMPORTANT NOTICE: As with all types of wheels retorque lug nuts after the first 25 miles & at 100 mile intervals until lug torque is maintained.

Note: Always refer to Owner's Manual for proper factory specifications that take precedence over the listed recommendations.

- ☐ Put the flat tire in the space where the spare tire was and put the jack and tire iron back in the car
- ☐ Most compact spare tires are smaller than regular tires so might not fit in the spare tire well. Also, compact spares have a limited top speed. The tire's top speed will be written on its sidewall. If your vehicle has a full-size spare, you won't encounter these problems. With the spare installed, you should be able to reach your house or the nearest service station.

15 Is the spare a "space-saver" and if so, what is it's maximum speed rating?

What type of jack did the vehicle come with?

STOP! INSTRUCTOR'S INITIALS: ☐

