

DOC'S BLOCKS
AUTOMOTIVE AIR CONDITIONING REPAIR

Question:

What is the best time of the year to service an AC system?

Answer:

It has been tradition to service just before the hot weather begins. It doesn't mean that it has to be done at that time. The hotter it is, the easier it is. At temperatures of 110-115 degrees, it either works or it doesn't. At colder temperatures, the unit may seem to work but when the weather gets warmer, the less efficient the unit is.

Most of the reason for this is the one servicing the unit expects the unit to get real cold when the air temperature is cool. When there is no heat load, there is less heat to remove from the refrigerant so the air doesn't get as cold. Generally, more refrigerant is added in an attempt to make the unit work better.

As the ambient temperatures rise, the more the refrigerant expands. Over charging the system will cause the system pressures to rise and the unit to become less efficient. This also stresses the compressor and can cause it to fail.

If the system was empty and being recharged, service to 70% of the posted charge. If it doesn't work well when the temperature rises, test it then to find the reason. If adding refrigerant to a system to top it off, use the sub-cooling method of servicing and the system will never be in a state of overcharge. Count the number of times the clutch cycles to determine an undercharge.