

#TechTipTuesday

Air Pressure

Let's cover the basics in regards to tires and air. First, you need to be sure the tires can make enough grip to get through the corner at speed, and produce the forces necessary to make the chassis work. If the tires cannot do this, nothing else will matter. You also need to be sure that the tires aren't too soft or too pliable for the track surface to chew them up. It is also possible for the tire to be too hard whereas it slides across the track and this too can eat up the tire's surface. You must ensure that both the tire's construction and durometer match the track conditions.

So, let's talk about overall air pressure... on dirt, when you add air pressure the tires will usually produce less grip, and will roll freer. But it comes at a cost - If you have too much air and do not have enough grip, the penalty is much worse (in terms of lap times and speed) than running the air pressure too low.

For most tires today the practical minimum amount of air that can be raced is in the 2 psi range. Although it is uncommon, there are special circumstances where setting the air this low will work (extremely low bite). That said, the normal range is from 4 psi to 8 psi. On extremely high bite tracks you may even see the pressures get upwards of 10 psi. Adjust overall air based on the amount of available bite/grip in the track.