mueller motorwerks

PRE DYNO CHECKLIST

This dyno tuning checklist is a guide to ensure your engine and vehicle are in proper condition prior to your tuning session at Mueller Motorwerks. Most unsatisfactory tuning results stem from mechanical issues that could have easily been corrected.

- [ ] **Do you have all fluid levels where they need to be?**
Depending on the type of oil you use and the type of driving you do, you may want to change your oil prior to your tuning appointment. Coolant, oil, and all other engine fluids should be inspected for proper level.

- [ ] **Have you done a vacuum/boost leak test lately?**
Vacuum and boost leaks will often lead to incorrect air metering to the engine creating inaccurate results while dyno tuning.

- [ ] **Do you have a sufficient amount and proper quality fuel in your tank?**
It is important that the fuel in the tank is the fuel you will normally use. Different fuel quality and type can have significant impacts on your vehicles performance. In order to get your tune as accurate as possible make sure your fuel type matches the fuel you will be using after your dyno session.

- [ ] **Do you have any Check Engine Lights (CEL), Codes, or Malfunction Indicator Lamps (MIL) on?**
Even something that may seem unrelated can have a large impact on your vehicles ECU performance, please make sure you do not have any Check Engine Lights, Codes or Malfunction Indicator Lamps lit before you come in for your tuning session.

- [ ] **When was the last time your fuel injectors were cleaned and checked for a system balance?**
Properly performing and matched fuel injectors are extremely important for consistent and accurate tuning.

- [ ] **Do you have sufficient electrical grounding?**
Electrical grounding is often overlooked. The vehicle ECU and all vehicle sensors need proper grounding to ensure proper signal output.

- [ ] **How old are your spark plugs?**
Make sure your spark plugs are in good condition and are properly gapped to the application. A proper gap is extremely important in preventing spark blow-out at high power levels.

- [ ] **Can your vehicle drive onto the dyno safely under its own power?**
The dyno will simulate a rolling road, it is important that the vehicle be able to handle speeds up to 150mph.

- [ ] **How strong is your battery/alternator?**
Flashing an ECU can range anywhere from a few seconds to a few minutes. A strong battery and charging system is important to prevent irreparable damage to your ECU.

- [ ] **What would you like to accomplish with your dyno tuning session?**
Communication is essential to ensure a successful and fun dyno tuning session. Several days before your appointment call or stop in to meet your calibrator. This one-on-one time will be spent touring the dyno facility and talking about your specific goals.