



SET UP PROCEDURES FOR SINGLE SEATERS

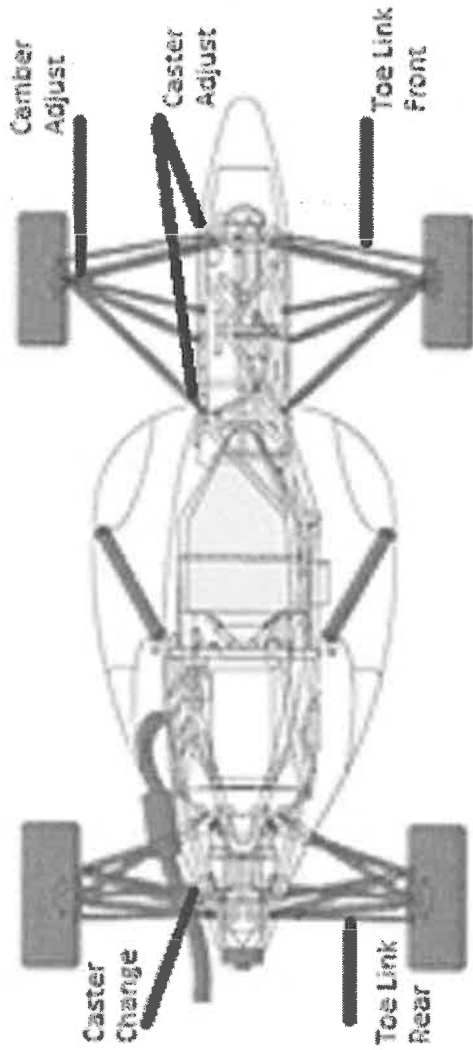
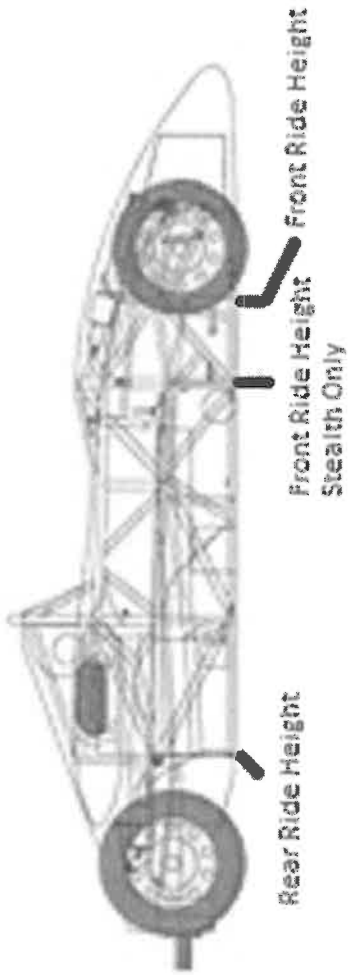
Note: after every adjustment balance and roll car to settle suspension

On chassis stand:

1. Level car front to rear and side to side if possible.
2. Check wheel base from front chassis point to rear lower wishbone and adjust to be equal side to side, reverse and measure from chassis (engine to bell housing) to lower front wishbone, equalise side to side.
3. Check and adjust front and rear caster (on top wishbones, pref longer arm).
4. Check and adjust bump steer if necessary.

Normal set up begins here, set car onto flat patch:

1. Set tyre pressures to 70% of hot pressures, remove anti roll bars and set spring platforms equally side to side, check and equalise damper settings.
With driver/ballast in car roughly set ride height and camber and eye up toe.
2. Remove driver/ballast jack up rear and triangulate car, level chassis on front pushrods accurately. Compress on centre line of car and ensure front rockers activate together. If not, tweak front spring preload to suit. Lower rear down until both tyres just contact flat patch, adjust rear push rods to suit.
Note: Pushrods and spring platforms must now be adjusted equally side to side
3. Refit driver/ballast, check and set front and rear droop. Adjust to suit adjusting spring platforms equally.
4. Set ride height allowing for any flat patch shims.
5. Set camber allowing for induced toe change (correct toe to ensure accurate measuring).
6. Set tracking – ensures rack clamps and hold steering wheel straight.
7. Connect and set anti-roll bars. Adjust to ensure zero preload in links.
8. Ensure all backing nuts are tight, set running tyre pressures and have fun!





Set Ups – Terms & Definitions:

- Ride height Front and Rear. Height from ground. Measured from skid.
- Rake diff in ride height, front to rear. Measured from undertray.
- Camber – angle of wheel to ground
- Caster – angle of kingpin or upright, measure 20° lock to lock
- Toe – in or out from centre line or set up bar strings.
- Bump steer - amount the toe changes when wheel moves up and down
- Spring – rate 16 per inch
- Spring Pre Load = amount of turns that the spring has, tighter from ride height
- Corner Weight – individual weights of wheels without roll bars connected
- Droop = amount car comes up from ride height

Shock

- Bump – shock movement down
- Rebound – shock movement up
- High Speed Bump – common
- High Speed Rebound – not so common



How to Adjust:

- Ride height = spring platforms or pushrods
- Castor = changing inner wishbone joints
- Camber = done by shims or top rod ends
- Toe = toe links front and rear, left and right
- Spring = spring checker or marked
Don't trust markings!
- Droop = how tight the spring is adjusted
- Bump = adjusted on shock and pressure nitrogen
This needs to be set from a datum all way in our out
- Rebound = adjusted on shock and pressure nitrogen
- Bump Steer –
Front = height relationship of toe links on upright to steering rake
Rear = by castor of rear upright
- Rake = difference in relationship front to rear, ride height
- Spring Preload = adjuster on spring platform to tighten or loosen spring