

A racing product designed for short dirt tracks and twisty roads

- [] Fits 1988-2003 Sportsters with 39mm forks
- [] Will not fit rubber frames after 2003 with narrow ID necks
- [] Some later model Sportsters around 2002 may have heads IDs that are smaller than the early frames. If the ID of your head is noticeably less than 1.74" and the OD of the head less than 2 1/4", this kit won't fit.
- [] This kit is designed for stock trees or those of the same thickness
- [] Kit includes;
 - Fork concentric cups, one top & one bottom
 - Neck bearings and races, two
 - New fork stem, one

Machined from high carbon steel and plated for corrosion resistance. High quality bearings and races too.

My original QuikTurn kit was \$545 bucks. This Gen II kit is a smarter design, cheaper and requires no welding to install

The Sportster Racing QuikTurn-Gen II 27° DeRake kit is a product for those who race Hooligan Sportsters on dirt tracks. It works supremely well on shorter tracks. It can benefit road riders who enjoy very curvy roads. The kit won't necessarily benefit a regular street bike except in slower speed cornering.

Sportsters are big heavy motorcycles with a long 30° fork angle designed for stable road riding. The weight of the chassis and stock fork angle are designed to self-straighten in cornering. An attempt to put a stock Sportster on a short track will reveal a bike that pushes high into corners. Slow, awkward and difficult handling is the result. You shouldn't bother racing with a stock front end-it's that bad.

A steeper fork angle allows the motorcycle to "fall" into race corners for quicker and easier turning. A bike with a steeper fork handles bumps and ruts well. I would be very cautious about extreme high speeds with an altered front end steeper than 26.5°. Do what you can to maintain an angle at or above 26.5° angle. 25° is the absolute maximum alteration. **See the handling chart (below) that plots fork angles with different variables.**

Drop, chop and squirt

If you have prior short track experience and have mastered "sliding" into corners, this kit will be a happy addition to your ability to counter steer. This means steering to the right as you turn left with a spinning rear wheel.

As you enter a corner lean the bike down to the inside with left shoe out, chop the throttle and quickly apply power. The back end moves out to the right as it loses traction

because the rear tire patch is reduced and the front end is loaded. You steer right so the bike doesn't spin around in a circle and pitch you into the ether. This whole business of sliding into and part way through a corner allows you to redirect the line of the bike faster than a competitor who drives all the way around a corner before accelerating in corners 2 & 4 with an unaltered frame. Your drive and acceleration distance will be longer than his and you will beat him to the next corner all other factors being equal. If you don't know how to 'slide' you will be able to learn it with this kit and experiment during pre-race practices. [As you become comfortable with sliding, the drop/chop/squirt thing will turn into one smooth motion.]

There are vendors out there offering insanely priced "trick" triple trees. Don't buy 'em. These products only move the fork assembly forward or rearward from the steering head but maintain the same stock fork angle. Pro teams use these trees on long tracks but they are not needed for short tracks under a ½ mile" Again these trees do not make steering easier or faster. The only way quicker steering can be achieved is to alter the fork angle. This kit will help you win against stock Sportsters.

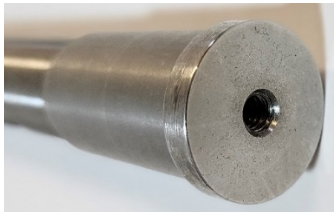
Installation steps-----

[1] Install stem into your lower tree. This photo is the bottom stem end. Secure stem into tree. Align cut-out so it matches the steering head lock position. A nice feature should you need to secure your bike when you go for a hamburger



Stem has machined cut out for fork lock

[2] Remove stock races in your head. Clean the steering head bottom thoroughly. Test fit the snugness of your bottom concentric cup in the steering head. It is machined for a press fit.



Top of bottom cup shown

[3] Slobber the bearings and races and set on a clean rag near your work area



Stem bottom with 1/4-20 threads

[4] Slide stem through bottom tree. Install race and bearing down the stem. Install wide part of bottom cup down on bottom race. If the bottom cup is sloppy in tree, you'll need to drill a 3/16" hole through the steering head and part way into cup to lock the two together with a 3/16" roll pin. The roll pin must be deep enough to create strength from banging of the steering stops on your lower tree. Don't drill into the bearing area. Not good! **Position so the fat steering stop tab is straight forward.**

[5] Slide stem, cup and bearing into steering head

[6] Slide top bearing down the stem



[7] Install **Top concentric cup**, down on the steering stem over bearing. Position Top concentric cup with the wide mouth down and the small dot on this part facing forward.



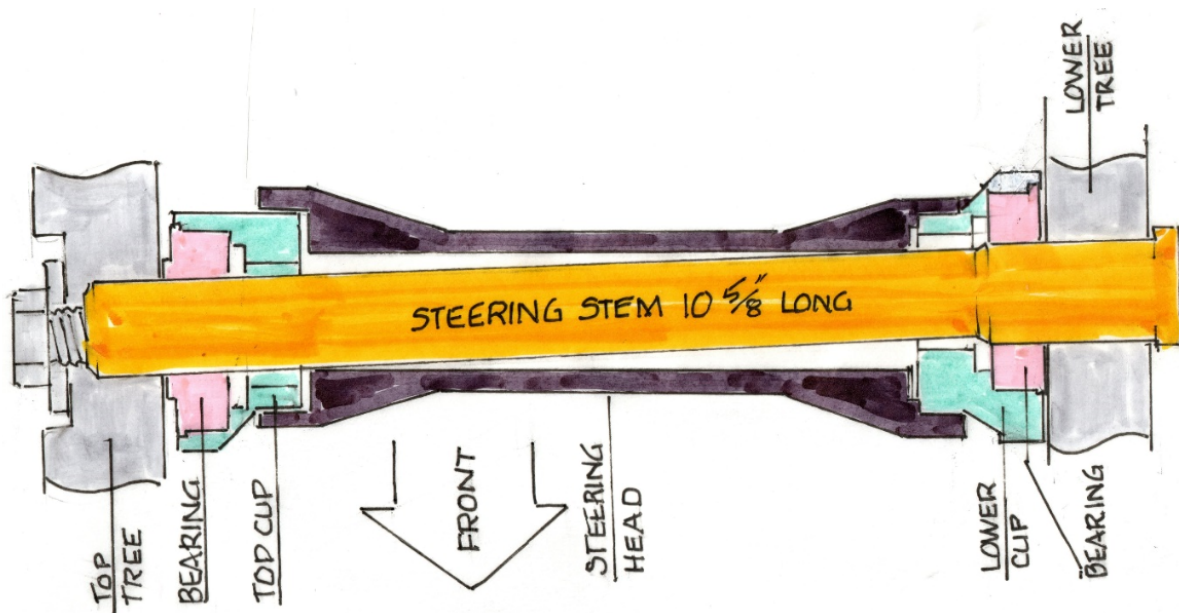
Align the dot dead forward

[8] Insert the assembly through the top tree and loosely affix washer and stem nut

[9] Install forks through trees with or without wheel. Now and secure clamping fasteners with Red Loctite



[X] Removing the kit. To remove trees notice the hole in the lower cup. Use a cylindrical drift, insert in hole and encourage the top cup to move up and out.



The variables of altering frame geometry



You will have moved your fork angle back 3° with this kit. This is general information derived from accepted flat track knowledge. The results of any changes are on you and you become responsible for any outcome, good/bad or safe/dangerous. You know racing is a dangerous activity because you do it and have observed (or have heard about)

negative happenstances. The Quick turn kit moves fork rake back approximately 3°.

1. Stock Sportster 2000 OEM

Wheel base 60"
Stock shocks 11 7/8"
Rake 29.6°

Great road stability. Awful on the track

2. Sportster w/ 15" shocks

Wheel base 60"
New Shocks 15"
Rake 28°

Fine for street. A tiny advantage on the track

3. Sportster w/ 15" shocks & 1" dropped trees

Wheel base 59"
Shocks 15"
Rake 27°

Now your' getting closer to the magic 26.5° or 25°

4 Sportster w/ 15" shocks, 1" dropped trees and 27° Quick steer kit

Wheel base 57.5"
Shocks 15"
Rake 25.5°

Ideal for FT racing. Acceptable streetability. Remember under 25° has the potential for high speed wobbles. Not particularly safe on street or long tracks.

Practice to be a Star without using your rear brake

Now use practice laps to perfect that drop/chop/squirt technique. Keep at it, you'll get it.

A wee warning-as you steer around the corner with you rear wheel, don't chop the throttle. The bike could suddenly straighten up and pitch your ass off in a high side. Try to keep the speed on even if you do a low side fall. Low side are better than a high speed pitch offs. Approach this technique in gradual steps under you master it. The first time you go through a corner at speed will be a total thrill. Now you are ready to go hunting.

Initially, practice this sliding trick kinda in the lowish/middle of the track. You have to know where your close competitors are. If you sense someone inside of you at your speed or faster know that concentric force will push him higher in the corner-right in front of you. Be ready. Without hitting his rear wheel, gas your bike so it's pointed to the inside of the track. He will be moving up the track as you are accelerating down the inside toward the ends of corner two or four. You will pass him evey time as you set up

for corners 1 or 3. If you master this, you could enter a corner on the very inside and gas all the way around the inside corner. Everybody behind you will slow slightly because in front of them is a sideways bike with no room to pass. This is your time dude.