

By the Seat of Your Shorts

by Dario Fredrick

In my last fitting article, *Start at the Foot to Reach the Peak*, we examined the importance of proper foot connection to the bike and how this first of three contact points sets the biomechanical tone of your fit. Once the feet are well connected, the next contact point in the fitting process is the saddle. With so many saddle options and degrees of comfort, picking the right saddle can become an overwhelming task. Understanding the variations in saddle shape and placement can make the task seem much easier.

Pick the Right Shape

The main saddle dimensions to consider are width, lateral shape and lengthwise shape. Actual length is less important. The width of the saddle should accommodate and support the width of your sit bones (ischial tuberosity), providing a stable platform for the pelvis. Although the width dimension is measured at the widest point, keep in mind that you may not sit exactly on that part of the saddle. The lateral shape should also fit your sit bones, since the angle at which they contact a saddle can vary. This side-to-side shape ranges from flat and rounded and it becomes apparent right away which you might need by sitting on examples of each.

The lengthwise shape affects the distribution of weight along the saddle and can vary from flat to very “saddle” shaped. This is where channels and cut-outs come into play, designed to reduce pressure on the perineum or the “pelvic floor,” which otherwise can result in discomfort, numbness or nerve impingement. However, some cutout designs have minimal material or support in that area and can compress too much, ironically causing more pressure on the nose of the saddle. Channel-shaped designs have more recently addressed this limitation by using more material but with a groove instead of a cutout.

Firm or Soft

A saddle should not be too soft or it becomes unsupportive and loses its initial shape, often resulting in more pressure on the nose and even altering your saddle height as you ride. Softer saddles also tend to break in more, compressing to a point where it requires that you raise the saddle. Ultimately, the shape of a saddle is more important than the softness, and a relatively firm saddle with the correct shape will tend to be more comfortable and supportive in the long run.

A Fair Evaluation

The only way to give a saddle a fair evaluation is to make sure it’s positioned correctly for you. Saddle height and setback (relative to the bottom bracket) are really best determined through a proper fitting. There are many individual differences to factor into the process, from pedaling style, to body proportions, to injury history. If you do choose to set up or test out different saddles yourself, the first step is to level it. Make sure the bike itself is on a level surface and place a long leveling tool on the nose and the highest point at the back of the saddle. If a slight tilt is more comfortable, it’s fine to adjust it a little bit nose up or down, but avoid a large downward tilt. This will end up sliding you forward all the

time, which reduces efficiency, adding unnecessary muscular work. If you feel too much pressure on the nose of the saddle and a very slight downward nose tilt does not eliminate it, the saddle is either the wrong shape or not yet positioned correctly. Increasing the nose-down tilt in this case might simply slide you onto the nose even more. For the fore and aft and height positions, make sure you are positioned over the center of the bike in a way that you engage the quadriceps, glutes and hamstrings, as well as allowing enough extension of the leg so that you can apply force through the entire downward phase of the pedal stroke without rocking your hips.

We tend to sit on one of two key locations on the saddle: The most comfortable contact point between body and saddle shape and the contact point from which the pedal stroke is optimal. Ideally, these should be one and the same. However, if you find yourself starting out in one spot on the saddle because it feels right in terms of contact and comfort, but then migrate to another place on the saddle when producing more power (e.g. sliding back when climbing), try adjusting the saddle in the direction you move to, combining the sweet spot of comfort with that of optimal pedaling mechanics.

Fit is Saddle Specific

Because shape, firmness and size vary among saddles, fitting measurements are saddle-specific. If you already have or take fitting measurements from your current saddle, changing the saddle likely means refitting it. Even two different saddles with identical width and length measurements may need to be positioned differently to maintain your position and proper fit. Where we sit on each saddle and where and how they compress can vary quite a bit. One size does not fit all and there are always exceptions and individual needs, which is why optimal bike fitting is a one-on-one, unique process for each of us.

Testing out and finding the right saddle means finding the right size and shape first. Be sure the width and lateral shape accommodate your sit bones and the lengthwise shape and firmness allow the right distribution of weight and pressure.

Whole Athlete can help you combine ideal comfort with optimal biomechanics when positioning the saddle. We stock a wide variety of test saddles of varying shapes, widths, and firmness that riders may use for a few weeks to confirm that their choice is the right one. Sometimes a saddle will feel fine on the bike on the trainer, but not be comfortable after an hour on the road or trail. If these saddle elements all seem to work with the bike stationary, the next step and true test is to take it out on the road, dirt or track and put a few miles on it. Observe if you feel stable in the saddle or if you feel the need to move around, especially when producing moderate to high sustained power. Once you've combined comfort with stability, you've found the right saddle.

Whole Athlete founder, [Dario Fredrick](#) brings a unique blend of experience and well-rounded qualifications to the bike fitting profession. With over a decade of experience fitting a multitude of cyclists, a Master's degree in applied exercise science including formal training in biomechanics, 13 years teaching Iyengar Yoga and an accomplished cyclist himself, Dario is uniquely qualified in the fitting world. His fitting philosophy is to work with each individual in a holistic fashion without limits or confines of any one fitting system, formula or tool.