

# RUNNER'S WORLD

[PRINT THIS PAGE](#)

## Injury Prevention: Injury Prevention

### Build a Better Knee

Key exercises to get (and stay) pain-free

By Ted Spiker

The same training philosophy applies whether you're recovering from a [knee injury](#) or trying to prevent one. Ideally, your off-road workout should include stretching and strengthening--stretching to keep the [IT band](#) from causing friction, and strengthening your [hip abductors and glutes](#) to keep you stable. Stability will help you avoid IT band syndrome and patellofemoral pain syndrome.

#### Stretches: IT Band

Lean into each stretch for 15 to 20 seconds, then switch sides.



**Wall Banger:** Stand with your right side about six to 12 inches from a wall. Squat and lean your upper body to the left until your right hip touches the wall. "It stretches the IT band and strengthens the glutes," says Nancy Cummings, Ed.D., assistant professor at Florida Southern College.



**Side Stretch:** Stand with your left foot crossed in front of your right, and lean your upper body to the left with your hands overhead. Lean as far as you can without bending your knees.



**Backward T Stretch:** Stand, feet together, facing a wall about six to 12 inches away. Hold your arms to your sides like you're forming a T. Without bending your knees, reach down and back as far as you can with your right hand.

#### Strength Moves: Hips, Glutes, and Quadriceps

Do independent of running so your muscles aren't fatigued during this program.



**Leg Lift:** Strong hip abductors help prevent strain of the IT band. "There's less torque on the band because you're decreasing the amount of hip abduction," says sports-medicine specialist Sharon Flynn, M.D. Lie on your side with your elbow on the floor. Lift your upper leg up about a foot and return to the starting position. Do 20 to 30 on each side.



**Four-Way Kick:** Attach your ankle to a cable machine (or use a resistance band). Face the machine. Kick your leg backward 20 times. Rotate 90 degrees and kick to the side. Repeat in all four directions (when you're facing away from the machine, kick forward). Start with two sets of 20 in each direction on each leg, and work up to three sets of 50 in each direction.



**Lateral Step Up with Kick:** Stand with your left side next to a step that's eight to 12 inches high. Step up with your left foot, driving the right foot in the air so it's even with your waist. Step back down and repeat. It strengthens the [lateral muscle of the quad](#) to help protect the knee, Cummings says. Do two sets of eight to 12 repetitions on each side.



**Hip Lift:** Balance on your right foot (use a wall for balance). With your left knee bent, drop the left hip and lift it up. "Let the hip drop, and try not to bend the left leg," says Stephen Pribut, D.P.M., a sports podiatrist in Washington, D.C. "You'll feel it in the glutes." Do 15 to 20 times on each side.



**Step Down:** Stand on a step on your right foot. Lower your left leg toward the floor, making sure the knee of your right leg is centered over your foot. "With the step down, you're putting more focus on the glutes," says Matt Schneider, athletic trainer and physician assistant at the Boulder (Colorado) Center for Sports Medicine. Do two sets of 10 on each.

Copyright © 2008 Rodale Inc. All rights reserved.