

# the **CrossFit** JOURNAL ARTICLES

## Learning the Olympic Lifts The Stance

Mike Burgener with Tony Budding

All of the Olympic lifts (the snatch, the clean, and the jerk) are nothing more than a jump and a land. The jump is a vicious extension of the ankles, knees, and hips that creates momentum and elevation on the barbell. In the brief moment that the barbell becomes weightless from that jump, the lifter aggressively pulls (or pushes, in the jerk) himself under the bar and lands with it in the receiving position.

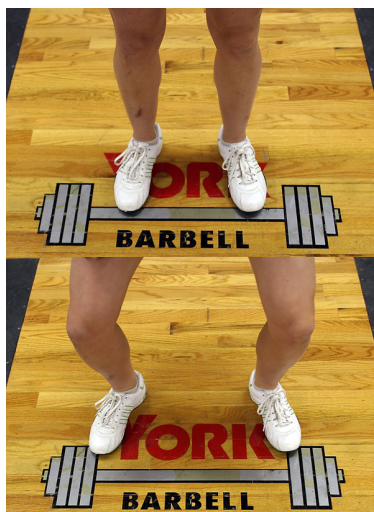
As simple as this may seem, there are many components to successfully jumping and landing with weight and many common obstacles that make it hard to move and receive heavy weights. This article is the first of a series in which I'll talk about single aspects of the lifts in detail, along with common faults and effective remedies.

### Jumping and landing positions

Proper foot placement during the Olympic lifts is critical to successful lifts. Years ago a good friend of mine, Senior International coach Steve Gough of Ennis, Montana, told me that 90% of all missed lifts performed in competition could be traced to the feet. The problem might be with the stance at the beginning of the pull, with the width of the feet in the receiving position, or with the placement of the feet during the drive portion of the jerk.

#### Good Movement

<http://media.crossfit.com/cf-video/Good.wmv>



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### Wide Catch

<http://media.crossfit.com/cf-video/Wide.wmv>

The proper stance in the pulling, or jumping, position aligns the feet under the hips. This jumping position allows more force against the ground when driving the bar upward. This is also the most natural stance—the one that 99% of the population naturally assumes when asked to prepare to jump high: the feet directly under the hips. If the feet are too wide, the potential for power is lost. If the feet are too close, both balance and drive are sacrificed. The remedy is simply to consciously place the feet under the hips to begin the pulling sequence.

The width of the landing position is approximately 1 to 3 inches outside the jumping position, or generally under the shoulders, with the knees bent, chest up, back arched, and weight placed on the feet from mid-foot to the heel. The movement of the feet from the jumping to the landing position should be fast and aggressive, without any excessive lift of the feet (which is known as donkey kicking). This is true for the clean, the snatch, and the push jerk. (The split jerk landing will be covered in a separate article.)

A lot has been written about weight distribution on the foot throughout the lifts. From a practical standpoint, the athlete should simply concentrate on keeping the weight back toward the heels. The posterior chain (glutes, hams, low back), which is the source of our greatest power, cannot be fully engaged if weight is transferred forward onto the toes. In most athletes, the heels will rise at some point between the jump and the land, but the longer it can be delayed (within reason), the more power is transferred to the bar.



### Common faults and remedies

If the feet are too wide in the landing position, the athlete loses the ability to receive the weight in a controlled manner, and his ability to recover strongly out of the low position is compromised. The same goes for receiving the weight with the feet too narrow, which both limits the athlete's flexibility and reduces the stability of the body in receiving the bar.

The landing position should be the same as the bottom of a proficient front squat for the clean and the bottom of a proficient overhead squat for the snatch. Many athletes with otherwise good squats still catch too wide because they are uncomfortable with the dynamic nature of these lifts. Practicing clean drops and snatch drops are a great way to develop confidence in the proper landing position.

In the assistance exercises I call drops, the bar is brought to the proper receiving position for a power version of the lift (racked on the shoulders for the clean, and locked overhead for the snatch). Without heaving or jumping in any way, the athlete aggressively pulls his body into the landing/receiving position. The feet should come off the ground to move from the jumping/pulling to the landing/receiving position, and there should be a noticeable sound when they reconnect. The body should be kept tight, and there should be minimal sinking once the feet hit. Practice landing as low as possible, tightening the core and lifting the knees without jumping. Obviously, this should be practiced with very light weight at first.

If the athlete is still landing too wide, lines can be drawn on the platform/ground at the proper landing width. The athlete gets immediate feedback on the success of the



## Learning the Olympic Lifts: The Stance (continued...)



landing. For extremely stubborn athletes with fully functional hips, a couple objects (perhaps something forgiving such as Dynamax medicine balls) can be placed just outside the proper landing position. There is some risk of injury with this, so caution should be employed.

Donkey kicking, or excessively lifting the in moving from the jumping to the landing position of the feet, is another common problem in the Olympic lifts. It creates too much hang time with the body, as well as instability in the landing, caused by too much impact with the bar upon landing.

Clean drops and snatch drops are excellent remedies for donkey kicking, as are clean lands and snatch lands. The only difference between drops and lands is that a slight heave or jump is permitted with the lands. The bar starts and ends in the receiving position in both. It can also help to cue the athlete to make the foot movement quicker, not louder.

Jumping forward is the third most common flaw in these lifts. The heavier the weight is, the more jumping forward tends to be a problem. It results primarily from jumping too early—that is, jumping from the knees without a scoop or double knee bend, which will be covered in a future article) and/or keeping the bar away from the body. If the forward jump results in the athlete rolling onto their toes (as in the attached video), any attempt with a significant load is guaranteed to fail, as the posterior chain has been disengaged.

The simplest remedy is to draw a line on the platform parallel to the barbell. The athlete should begin the lift with their toes on the line and compare that with the placement of the feet in the landing position. You can also use cues such as “Weight on the heels,” “Keep the bar close to the body,” and “Be patient. Bring the bar into the hips before jumping.”

### Forward Toes Video

<http://media.crossfit.com/cf-video/ForwardToes.wmv>

### Donkey Kick Video

<http://media.crossfit.com/cf-video/Donkey.wmv>

### Conclusion

The development of proper mechanics and movements should always be done with essentially no weight (a PVC pipe or wooden dowel). It is a myth that adding weight will correct flaws. Adding moderate weight may mask flaws, but the athlete's progress will be abruptly and artificially limited by the masked flaw. Once perfect technique is achieved at low weight, load can be increased gradually. If proper mechanics is lost at any point, the weight should be reduced until proper technique is regained.

These remedies can be used at any point to fix flaws. They can also be used as warm-ups to reinforce proper techniques. When training others, explain that they are going to jump the barbell through a range of motion, creating momentum and elevation on the barbell. Have them align their feet in the jumping position and then, on your cue, walk their feet out to the landing position, then back to jumping. After several repetitions of this, familiarity is established. Then, have them do several repetitions of jumping from the starting position to the landing position. This seemingly mindless exercise trains the mind and can prevent hours of frustrating attempts to correct improper jumping and landing stances.

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