

Insoles for Rubber Boots for Concrete Work

Problem:

Walking/standing on rebar and hard surfaces to place and finish concrete can be uncomfortable. The rebar digs into the bottom of the feet and rubber boots don't often have a snug fit or good arch support. That can lead to less stable footing – transferring the risk to the low back. Additionally, when your feet sweat, moisture builds up inside rubber boots and can be very uncomfortable – or even cause blisters.

One Solution:

Use insoles that have impact absorbing material in the heel and ball of the foot to absorb some of the stress. Semi-rigid arch support will help create a better fit and allow for a more stable stance. Workers also report that there is less moisture build up inside their boots.



FACTORS:

- Standing on rebar or other hard surfaces can lead to contact stress on the bottoms of the feet – rebar “digs” into the bottoms of the feet.
- Pain on the bottom of the feet may compromise secure footing. Because of this pain, workers may be reluctant to really “plant” their feet on the standing surface. This makes the “coupling” between the feet and the standing

FACTORS:

- Insoles provide an impact absorbing material for the heel and ball of the foot.
- Semi-rigid arch helps support the foot in its natural position.
- Placing an arch support inside the boot helps make the fit more snug, making the foot more stable.
- When “coupling” is improved, the lower back is more protected.

<p>surface worse and could impact the lower back.</p> <ul style="list-style-type: none"> • Rubber boots often don't have a snug fit and feet sliding around inside the boots will also compromise "coupling", cause more fatigue and shift the stress of the movement to the lower back. 	<ul style="list-style-type: none"> • Helps to absorb moisture inside boots • Can reduce worker fatigue
<p>Tips for Use: Be sure the insole fit properly. It's okay to trim them with scissors to ensure a snug fit.</p>	

<h2 style="text-align: center;">Insoles for Rubber Boots</h2>	
<p>How Do the Insoles work?</p> <p>There are various styles and sizes available. Be sure that there is "sorbothane" or "viscola" impact material in the heel and the ball of the insole. A semi-rigid arch support will be flexible enough to work for most feet. Let your own comfort be your guide. They should fit snugly into your boots and offer comfortable arch support. The cushioning will also be a benefit. Another thing to look for is moisture absorbing capability. Decreasing the amount of moisture that accumulates inside your boots from sweating. Wearing socks that "wick" (absorb moisture)</p>	<p>How to Fit an Insole:</p> <p>Buy a size that matches your boot size or go one size larger. With some insoles, you can use scissors to trim the insole to custom fit your boot. The arch should fit the shape of you foot's arch – not too high or too low. Be sure that the arch is not so stiff that it becomes uncomfortable! It should flex slightly with movement.</p>



How Much Difference Do Inserts Make?

Construction Laborers whose primary work is to place concrete say that their feet are not nearly as tired at the end of the day, their boots fit a little better and standing on rebar doesn't hurt as much.



The **best** idea is to wear a combination of light weight steel soles AND the "sorbothane" insoles. This way, the rebar won't "dig into" the bottoms of your feet!

How Much Will it Cost?

Top of the line insoles will cost \$30 - \$35 per pair. This should include "sorbothane" (or other impact reducing material) for impact reduction and a semi-rigid graphite arch support.

An insole with impact protection, without semi-rigid arch support will cost between \$25 and \$30 per pair.

The "Lam-In-Sole" safety soles pictured above are available for less than \$20.

<p>How do Insoles Affect Productivity? Workers report feeling less tired at the end of the day. Reducing fatigue may increase productivity over the course of the day.</p>	
	<p>Contact Information: This Tip Sheet was sponsored by CPWR Agreement #1020-005-56. It was produced by Build It Smart, LSHFNA, LIUNA, AGC of Washington, The University of Washington, Western Washington Cement Masons Training Center and the StewartPrezant Ergonomics Group</p> <p>Special thanks to: Lease Crutcher Lewis!</p> <p>Contact: Build It Smart 360.596.9200 safetyhealth@aol.com</p>