

# NATURAL HOOF PRINTS



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E D S S, I n c.



## THE STEEL NBS

As promised, the popular Natural Balance Shoe™ is now available in Steel! This shoe has been a long time in the making but is already proving to be a worthwhile wait.

As you may have noticed from the picture, there are a few design features that set this shoe apart from the Aluminum NBS and other steel horseshoes. The most obvious difference from the aluminum shoe is that fact that this shoe has a rim design, meaning that the nail groove continues across the toe. The primary reason for this was to eliminate weight, however other

benefits exist as well, like traction and toe wear. The other noticeable difference is the fact that this shoe has six nail holes on each side. This is a feature that has become very popular in Europe for a number of reasons. One being the fact that you now have options when trying to apply shoes to trashy or crumbly feet. This also allows you to alternate nailing positions between resets, or individualize left and right nailing patterns. *A special note however: at no time should you use all the nail holes at the same time. This is obvious to most, but should still be mentioned.*

Some other features that you cannot see from the picture is the finish work that has been done on the shoe, which includes boxing of the heels. This is one step that most farriers take, but is now eliminated with this shoe. Another aspect of this shoe that cannot be seen from this angle is where breakover begins. To help bring the breakover point to the optimal place on the shoe, the inner rim (at the toe) is slightly higher in elevation than the outer rim. This allows the breakover to correspond closely with that of the aluminum shoe.

As with the original NBS, the toe area of the foot side is seated out to eliminate sole contact beneath the tip of P-3. The toe portion also has greater mass which means more material for wear. **This will help maintain optimal P-3 and hoof wall orientation through a longer shoeing period.**

As like it's aluminum sibling, this shoe will be a useful tool for a wide variety of applications. We do not feel as though this shoe will in any way replace the aluminum shoe. The aluminum NBS has many special features that cannot be seen in any steel shoe. However, we believe that the Steel NBS will enhance and help support the overall usefulness of the Natural Balance principles. Even if we disregard the benefits of this timesaving and application-friendly shoe, there is still the optimal Natural Balance design that many have come to appreciate. We appreciate everyone's patience and hope you continue to be happy with the helpful tools we have tried so hard to supply.

### Steel NBS

Sizes: 00 - 4 (00 not available to late June!)

Prices: \$7.00/pr. or \$65.00/box of 10 pr. (all one size)

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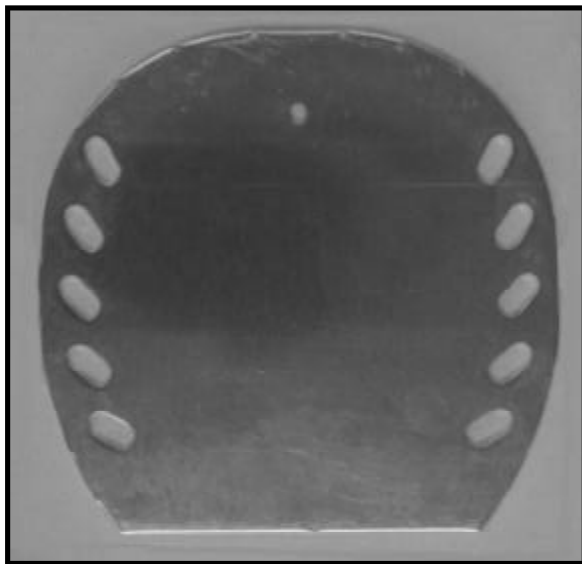
## P-3 AND NAVICULAR BONE FRACTURES

For the past several years, we have been faced with a multitude of lower limb pathologies ranging from laminitis to coffin bone fractures. Fortunately coffin bone (P-3) fractures are not as common as laminitis or Navicular disease. Luckily, wing fractures or margin fractures are normally not complicated or problematic. However, fractures of the coffin bone that involve the joint can be difficult to manage and have had a less than good prognosis. Navicular bone fractures are considered to be even more of a risk for complete recovery.

In the past seven years we have been using the EDSS treatment system on P-3 fractures. Over that period of time, our records (in the U.S.) show 15 cases of P-3 fractures that involve the coffin joint, have healed with no joint deviation and are back to performing at their pre-disease discipline. In all 15 cases, treatment with the EDSS P-3 Fracture system was started within 3 weeks from the onset of acute pain. At this time we have no records of any failures when diagnosis and treatment was performed early.

Navicular bone fractures are even less common and cases treated are fewer. The results so far are very promising and seem to parallel the results experienced with P-3 fractures.

Hoof preparation for P-3 fractures is slightly altered from normal EDSS applications. The normal



*P-3 Fracture Plate*

An 1/8" aluminum plate with predrilled holes for easy nailing & attachment to the EDSS Shoes.



*Applied P-3 Fracture Plate*

EDSS hoof preparation will allow the frog to be in contact with the ground, especially when dirt fills the space between the heels of the shoe. When you have frog contact, normal foot function takes place. Adequate blood flow and normal P-3 support are achieved through the lateral cartilage and digital cushion, which are attached to P-3 (coffin bone). Most feet stay healthy with normal trimming and shoeing when the frog is on the ground. However, when the coffin bone becomes fractured, and especially those fractures involving the coffin joint, forces that keep the bone (P-3) in place and healthy are the factors that can stand in the way of the patient returning to a pre-disease condition. The posture commonly seen with margin fractures is similar to horses with foot abscesses. Posture common with more complicated joint fractures is an unwillingness to put their heel down and bear weight. Unlike an abscess, a horse with P-3 fractures will get relief when the heel is supported in an extreme elevated position. The sole is painful when a compaction of dirt is left for any length of time. This will cause the bone to heal unevenly. Hoof preparation that does not leave the coffin bone flat to the ground will have the same effect as uneven compacted debris. Hooves that are longer than a well trimmed barefoot will compound the forces during breakover and increase the pull on the deep digital flexor tendon, hence separating the bone even more with each step taken. Confinement is normally prescribed for coffin bone fractures, which means the patient must turn continually and never travel in a straight line. These short turns cause torque to the fracture.

The EDSS P-3 Fracture System addresses nearly all of the needs for optimal healing. The foot is prepared so that the heel is left with whatever height is stable to discourage frog contact and increase the angle to help reduce tension on the DDFT. Attention should be given to have no sole or frog contact. The sole should not be trimmed excessively to attain this goal. **Leave hoof wall beyond the sole.** Trimming the frog at this point is **OK**. The hoof capsule should be allowed to contract some to help form a natural cast around the bone. The EDSS Shoe and solid fracture

plate is applied to the foot so that breakover occurs slightly forward, or directly under the tip of P-3. This will ensure ease-of-breakover and relieve the most dynamic forces on P-3. The tallest wedge rails are generally used in cases of articular fractures to maximize the release of the tension on the DDFT, statically. The rail's position inside of the nail groove will allow the horse to turn comfortably in small places, as well as being safe in smaller turnout areas. Adjustments can be made as often as necessary to regulate for the comfort of the animal. Pain altering medication should be minimized as quickly as possible so that the horse can care for himself with honest pain references.

Generally resets are done in 8 to 10 week intervals with no urgency to cut the foot too short. With the second reset, Impression Material is usually applied to EDSS standards, when a noticeable fibrous union is forming. It is common to see the gap appear to widen between the first and second shoeing. As long as the horse has a good comfort level, things generally work out well. Reduce the rail height when extreme heel landing is very obvious. The objective is to get the rail down to small rails in the 3<sup>rd</sup> shoeing period, then flat and barefooted after that.

Wing fractures are treated the same, but they will often feel more comfortable with the medium rails to start with.

Navicular bone fractures are treated the same as well. However, Impression Material is sometimes applied with the second shoeing. Good Luck!

## P-3 FRACTURE VIDEO

WITH BONUS FLEXOR TENDON LACERATION TREATMENT

We have recently completed a new instruction video that covers the complete treatment of P-3 fracture and Navicular bone fractures. The video starts with Gene Ovnicsek addressing a few common questions regarding Coffin & Navicular bone fractures. We then go into the hoof preparation, shoe application and then some maintenance tips. As a bonus, we have included an EDSS modification procedure for treating flexor tendon lacerations and other tendon related pathologies. The whole video is just under 1 hour in running time and is available now!

### Tendon Laceration Treatment

As seen with the P-3 fracture treatment, the EDSS shoe and rail system serve as the base for relieving the forces on the coffin bone, navicular bone, tendons and ligaments of the lower limb. For that reason, the shoes and rails have proven to be extremely versatile which makes them a useful tool for a wide range of applications. Quite often farriers are asked to fabricate a device that will elevate the foot above what a normal wedge pad or shoe will provide. Such is the case when treating flexor tendon lacerations or bowed tendons. The Patton shoe has been a good application for these and similar pathologies. Many



times, raising or lowering adjustments need to be made to improve the treatment protocol. In most cases a new shoe has to be fabricated or the existing application has to be remodeled, all of which require removal of the shoe, plus time and labor used to make the required alterations. To remedy this problem, EDSS has instructions for tendon related pathologies (lacerations, bows, strains, etc.) that make it simple and easy to treat these injury related pathologies by using the EDSS shoes, rails and some standard 1/2" to 5/8" wedge pads. This shoe and pad combination is light and provides relief from the strain of anterior and medial/lateral breakover, and adjustments can be made without removing the shoe.

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## NATURAL HOOF PRINTS

### NEW PRODUCTS

As always, we are in the process of introducing a few new product ideas we have been working on. The first development is a “cuff” shoe that was suggested and designed by longtime EDSS user, Mark Plumlee. This shoe will be very useful when needing to treat a foot that has a very poor hoofwall or a foot that has nothing to nail to. The welded cuffs offer you a chance to screw the shoe to the outer hoofwall. Hopefully this option will make treating some of those previously difficult cases, much easier.

The other project we are working on is a hard, poly carbonate multipurpose pad. This pad is a clear 1/8” or 3/16” thick pad that will be used for a number of applications. Many will find it to be a useful hospital plate and other will use it in place of the aluminum P-3 fracture plate.

We hope that you will find these few options useful in your practice. We will continue to strive toward supplying hoofcare professionals with the best possible products to promote soundness in horses.

### UPCOMING CLINICS

Gene has several clinics already scheduled for the summer and fall of 2000. A few are not set in stone, but as soon as dates are set, we will post them on the website: [www.hopeforsoundness.com](http://www.hopeforsoundness.com)

- June 11th - Live online chat will Gene Ovnicek at the [www.horseshoes.com](http://www.horseshoes.com) website.
- June 15th - 18th: Gene will be speaking & demonstrating at EQUITANA USA in Louisville, KY
- July 14th - 16th: 3 Day clinic just outside of Portland, OR
- August 4th - 6th: 3 Day clinic in Anchorage, AK
- Mid September: 3 Day clinic in North Carolina or Virginia & possibly a 1 Day clinic in Florida
- December 8th: co-speaker with Dr. Chris Pollitt at the Rochester Equine Clinic, NH