



Diabetic offloading Orthotics

Patient Guide for Conservative Orthotic wound offloading



This guide aims to provide information on diabetic wound offloading and the different orthotic methods used to achieve optimal healing. Diabetic wounds and the treatment they require varies, please visit your doctor for an individualised treatment plan.

What is

Orthotic pressure offloading?

Foot Orthotic Offloading is the practice of redistributing or reducing the pressure over a specific area of the foot. It is an effective means of treating diabetic wounds and ulcers under the foot.

Different forms of Orthotic Offloading include:

- Walking boots (custom or off-the-shelf)
- Shoe modifications
- Custom Foot Orthotics/Arch supports
- Post-operative shoes
- Assistive devices i.e., crutches, wheelchairs etc.

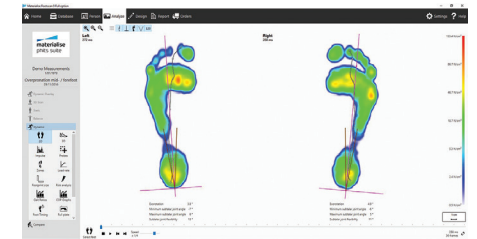


Why is

offloading important?

Offloading or alleviating pressure from ulcerated areas under the foot allows the body time to heal the wound or at the very least reduces and limits further deterioration of the wound or ulcer sites.

If offloading is not implemented, the constant pressure on the wound when walking can lead to complications, which, if left untreated, may lead to amputation.



Orthotics for Offloading

Custom made total contact foot orthotics

Performing a computer aided pressure plate examination of the individuals' feet, allows us to determine the design and material composition of the foot orthotic that will be constructed to support and offload at-risk areas. Custom-made Orthotics are measured, manufactured, and fitted within 7-10 working days from the initial consultation with the consulting professional.

The Orthotic is manufactured by:

- Taking an impression or mould of the foot to create a negative mould. The mould is filled with Plaster of Paris to create a positive mould.
- The positive foot mould is then custom rectified to allow for offloading of the high-risk areas and to ensure that pressure is distributed along the plantar surface of the foot.
- Specifically selected material is vacuum moulded over the rectified cast, in a multi layered format.
- The material properties and combination selected allows the orthotic to react with moderate compression under high pressure areas only, creating a total contact foot bed.
- The orthotic is shaped and fitted into the users shoe.



Shoe Modifications

Rocker bottom sole

A custom rocker bottom sole is an external correction that is made to the outer sole of a shoe. This modification can be a heel, midfoot or forefoot rocker modification. The rocker reduces the time spent on the affected area of the foot. Less time spent on the affected area, allows the body to heal the wound faster.

To ensure that both the shoes' outsoles remain the same height, both shoes may require modification to maintain an even leg length and a balanced body.



The SBi Motus Boot

The Motus boot is used for both acute and chronic wound offloading. It provides outstanding pressure redistribution during weight bearing and allows patients to walk comfortably and confidently.

Features of the Motus Boot include: An interchangeable acute and chronic rocking sole. A removable heat mouldable liner and an adjustable segmented varied density insole.



Offloading Orthotic Shoes

Off the shelf diabetic offloading shoes can be used with or without custom-made foot orthotics to aid in offloading ulcerated areas or wounds. They are best used during short distance walking only and are ideal to be worn in the house or while driving. The shoe design incorporates a mild forefoot rocker to assist with offloading

when walking. A rigid outsole reduces foot flexion across the length of the foot and the wide opening upper allows for easy fitting and accommodates large bulky dressings.



Short-term offloading orthotic prescription

may include a non-weightbearing phase to allow for healing of the wound while the individual is allowed to be mobile. Non-weightbearing offloading is achieved with the use of crutches, walking frames, a kneeling scooter, or wheelchairs. Rental options are available through our practice. If weight bearing is encouraged, then offloading of the wound is achieved with the use of



orthotic devices. The SBi Motus boot or diabetic offloading shoe with custom made total contact foot orthotics will promote faster wound healing.

The aim of **Long-term offloading orthotic prescription** is to provide the patient with the necessary orthotic devices to limit any future wounds from developing and to assist patients to progress to wearing regular footwear. Custom made total contact foot orthotics, along with any required shoe modification will limit the formation of high-pressure areas under the foot. Regular check-ups are required to determine the effectiveness of the foot orthotics and to allow for any adjustments or replacement.

If any pressure areas do occur, then the use of previous orthotic devices such as the SBi Motus boot or offloading shoes may be required until complete wound healing is achieved. Once healed, the patient can return to wearing their regular daily shoes with a custom-made total contact orthotic.



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