

## Compression Socks - Post-Amputation - Full Clinical Guideline

Ref No: CG-R&C/2008/001

### Issuing and Application of Post Lower Limb Amputation Stump Compression Socks

The aim of the guideline is to:

- Explain the purpose of a stump compression sock
- Identify when it is appropriate to issue a stump compression sock
- Recognize the procedure to follow prior to issuing a stump compression sock
- Clarify any contraindications
- Describe how to take measurements for a below knee and an above knee stump compression sock

#### The objectives of using a stump compression sock

The function of a stump compression sock (or Juzo which is the manufacturer's name) is to contain or reduce stump oedema. This may have been present pre-operatively, or arisen as a part of the tissue response to operative trauma. Effective stump support facilitates healing, stump moulding by dissipation of oedema and early prosthetic fitting.

Other reasons for wearing a stump compression sock are:

- It acts as a form of warmth, protection and support that many patients find psychologically beneficial
- There is anecdotal evidence to suggest that wearing the stump compression sock may reduce phantom limb sensation

#### Timing of issue of a compression sock

At the Amputee Rehabilitation Centre, the senior Physiotherapist, Occupational therapist, Prosthetist and the Band 4 Rehabilitation Assistant issue the compression socks. This is usually at the point when the stump does not require a thick dressing and level of pain allows fitting. Although in some cases the sutures or clips could still be in situ, this may be around 5-6 days post op. there is national variation as to this time point. Issuing compression socks between 4 days and 6 weeks post-operatively, cannot be truly explained although this could be due to Amputation Rehabilitation Centres only seeing patients for the first time at six weeks post op. the manufacturer of Juzo compression socks does not issue guidance on when to start using them, and despite ongoing discussions, there is no national protocol or guideline as yet.

#### Procedure

- The senior Physio and Occupational Therapists and Prosthetist will be responsible for the initial assessment of each patient individually to establish the suitability to be issued with a stump compression sock. After the initial assessment the Band 4 Rehabilitation Assistant can also issue a stump compression sock.

- If it is considered the patient has a potential to attain a SIGAM Mobility grade B or above the Amputee senior Physiotherapist will consider measuring and issuing a stump compression sock five to six days after amputation.
- Any dressings in situ should be thin, such as Comfeel ulcer dressing, Duoderm extra thin, Tagaderm, or Melolin and all measurements should be taken over the dressings.
- A stump compression sock can be considered for issue even when the clips or sutures are in situ. Exception to this would be if the patient complains of any pain or discomfort.
- Verbal and written information will be given to the patient on how to apply and remove the stump compression sock. If there is any doubt that the patient has understood the instructions then the stump compression sock should not be issued. Senior Physiotherapist and Occupational therapist will be responsible for addressing whether it is appropriate to involve carers.
- There is no clear guidance to indicate whether a stump compression sock should be worn at night, therefore this is left to individuals if they wish to wear the compression sock at night. However, we advise patients not to wear the sock if the amputation is due to peripheral arterial disease.
- If the patient has any pain or discomfort after applying the stump compression sock, day or night the stump compression sock should be left off and the senior Physiotherapist and Occupational therapist will consider re measuring, and application of the sock at a later date.
- Measurements and the size of the stump compression sock that is issued should be recorded in the Amputee Rehabilitation Centre patient's notes. For future reference and re ordering purposes, a prosthetic services card should be made out for each individual patient, including the size of the stump compression sock and the date of issue.
- Each patient will be observed putting their own stump compression sock on at their physiotherapy outpatient appointment.

### Contraindications

A patient presenting with any of the below contraindications should not have a stump compression sock issued:

- Excessive pain
- Discoloration other than bruising
- Cellulitis
- Dermatitis
- Acute thrombophlebitis
- Infection in the residual limb (stump)
- Weeping skin of the residual limb (stump)

How to measure for a below knee stump compression sock

Three measurements are required: (see attached diagram)

1. measure the circumference at the distal end of the stump
2. measure the circumference at the mid-patella
3. measure the circumference approximately 15cm above the mid-patella

Check these dimensions against the measurement chart to identify the most appropriate size. The first measurement at the distal end of the stump is the most important measurement.

If the stump size is between the stump compression sock sizes then select the bigger size.

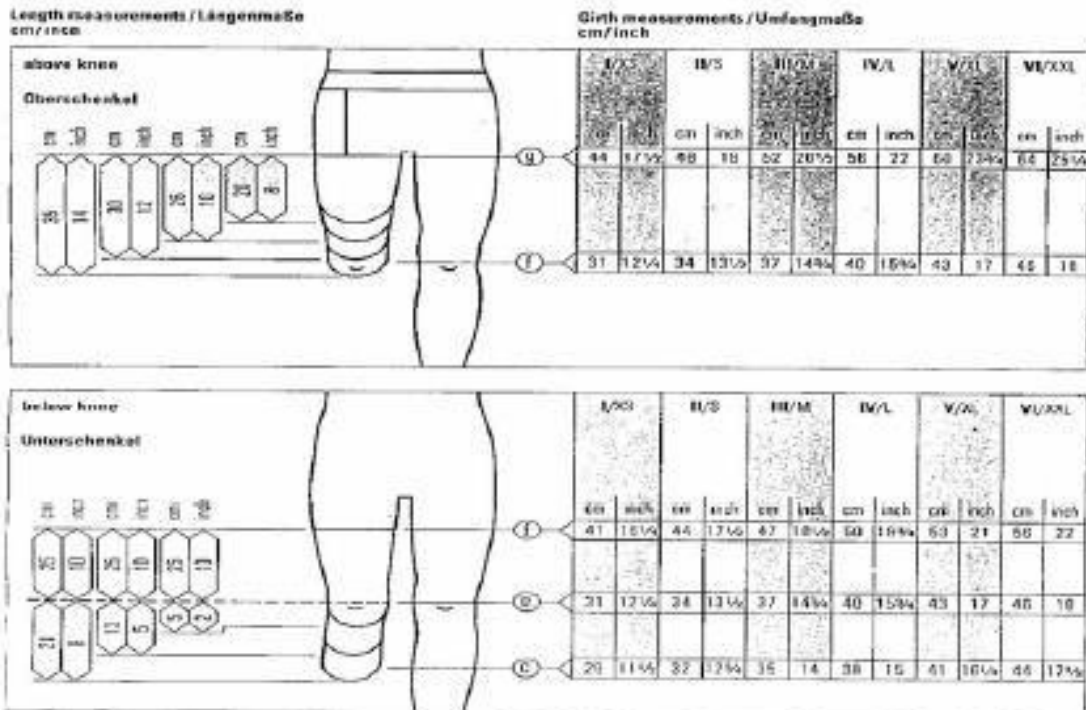
How to measure for an above knee stump compression sock

Three measurements are required: (see attached diagram)

1. measure the circumference at the distal end of the stump
2. measure the circumference at the thigh around the groin
3. measure the length of the stump from the groin to the distal end of the stump

Check these dimensions against the measurement chart to identify the most appropriate size.

Stump compression socks will accommodate 10% either way greater or smaller. It is possible to order a custom made sock but these will take several weeks to come and can be costly.



**Abbreviation:** SIGMA = Special Interest Group in Amputee Medicine

**References**

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Sheffield Disablement Services Centre, The Stump Shrinking Sock, Sheffield.

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