

Bandaging

1. The incision is initially covered with non-stick gauze.
2. Then 4x4 gauze is opened up and carefully layered over the amputation site so as not to form a large single mass of bandages that could potentially shift in position and cause a pressure point inside the cast.
3. Fluff gauze is laid over this to even out the padding.
4. A amputation sock is gently rolled over the gauze to help shape the limb and minimize the post-operative edema.
5. Cotton cast padding is applied over the amputation sock to further pad the amputation site.
6. A reticulated distal foam end-pad is placed over the end of the amputation
7. Tibial crest pads are placed over the anterior-medial and anterior-lateral tibial flare regions. These two regions are loaded in a traditional transtibial prosthetic socket. Padding helps to protect the tibial crest and push the tibia back away from the cast to protect the skin over the distal end of the tibia. The narrow pad goes on the lateral side to avoid pressure on the peroneal nerve.
8. A patellar pad is placed over the patella to identify the location for the patellar-cut as the last step in the final casting procedure.
9. Two rolls of plaster with elastic gauze are used for the initial layers of the cast to both mold the amputation site and to compress the reticulated foam distal end-pad. Care must be taken to not wrap circumferentially as to avoid constricting the limb.
10. A 5 ply plaster splint is added to strengthen both the medial side of the knee and the distal end of the cast.
11. Two addition rolls of regular cast material with standard non-elastic gauze are used to complete the cast.
12. The casted limb is laid onto a pillow to allow 3 to 5 degrees of knee flexion, avoiding hyperextension of the knee; and to facilitate molding of the cast.
13. A supra-condylar mold is applied to contour the cast above the femoral condyle to control rotation and prevent the cast from falling off the patient. The larger the patient, the larger the supra-condylar mold.
14. The patellar area of cast is cut out to provide a landmark to assure the nurses, therapists, and physicians that the cast is indeed located properly and has not rotated or moved distally.

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