

TOM JIG® T3



**Personalized surgical guides system for
valgus-derotational high tibial osteotomy**

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TOM JIG® T3 system enables the performance of 3D osteotomies. In a single surgical step, it is possible to correct the tibial over rotation, tibial varus and crossed kneecap in patients with this combined deformity.

A 3D biomodel is generated from 2D CT scan images. The surgeon prescribes osteotomy location and angles to be corrected.

Digital Anatomics' software is used for calculating the osteotomy oblique plane as well as for designing the guide.

Thereafter, the biomodel and the guide are manufactured by 3D printing.



Pathology:

Rotational deformity of the tibia with converging kneecap resulting in clinical pain and/or patellar instability or overloading of the medial knee compartment and causing early joint degeneration

Use:

Valgus-derotational high tibial osteotomy.

Information about the device:

Custom Made Medical Device: surgical invasive product, class IIa transient use. Rule 6, Annex VIII, MDR 2017/745.

Material:

Biocompatible class IIa, sterilizable resin.



Shortening of operating times



High precision and safety



Reduction in X-Ray exposure



Technique facilitation



Minimally invasive



No initial investment

Surgical Technique

1. Positioning

01

Position the guide at the only fitting point



02

Kirschner wires are inserted. Firstly, the most anterior and lower one, to ensure the positioning of the guide.



2. Making the osteotomy cut

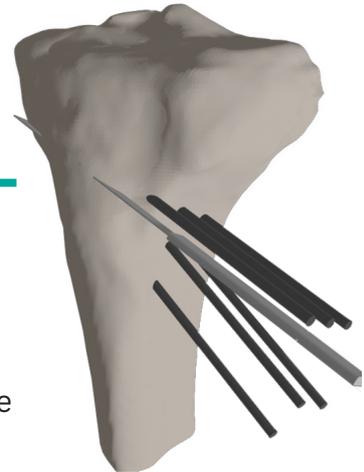
03

Insert the rest of the wires without exceeding the distance marked on each insertion point.



04

Start the cut with the saw, at the kneecap area to mark it. Remove part A. Place reference wire in the marked hole. Remove part B. Finish the cut by following the plane formed by the upper wires at the bottom.



3. Valgus-derotational correction

05

Rotate the tibia, aligning the reference wire with the most anterior and superior one.



06

Part B can be repositioned to check the positioning. Remove all the wires except the reference ones, and proceed to bone fixation.



Technical Features

Request Process

Nominal leadtime: 5 working days

Sending of the virtual prescription, provided by DA, with a CT



3D biomodel and TOM JIG® T3 surgical guides computer aided design

Digital files validation



Manufacturing by 3D printing

Physical product reception



Surgery

Surgeon

Digital Anatomics

A

Holes to introduce Kirschner wires

Contact surface according to the morphology of each patient

Bone positioning tab

Depth indicator to the end of the tibia

Cutting groove adapted to the thickness of the saw

B

Visual spin verification in both planes

Mechanical spin check

Parts fixing system

Hole to introduce the wires for stable fixation of the tibia part

Reference wire accommodation

TOM JIG® T3 **MD** Custom Made Medical Device

Operating Licence as MD Manufacturer nº M/919



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