



# Surgical Technique IN-OUT

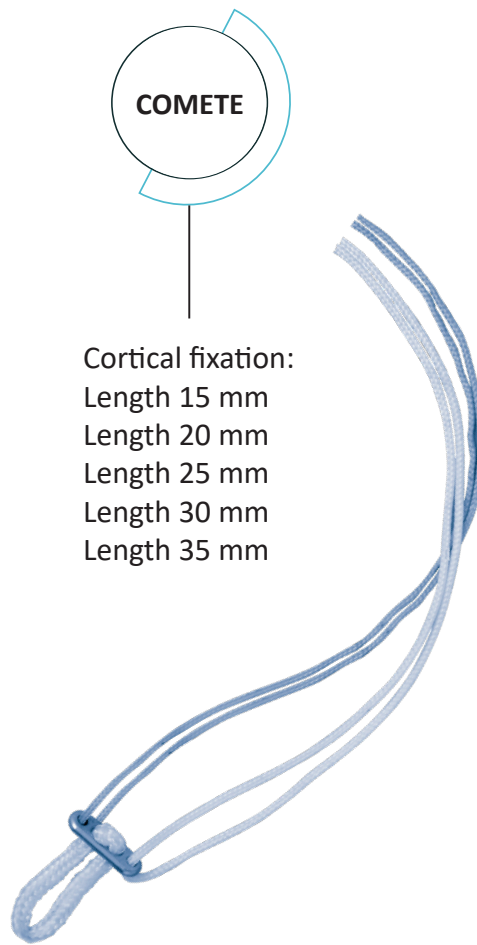


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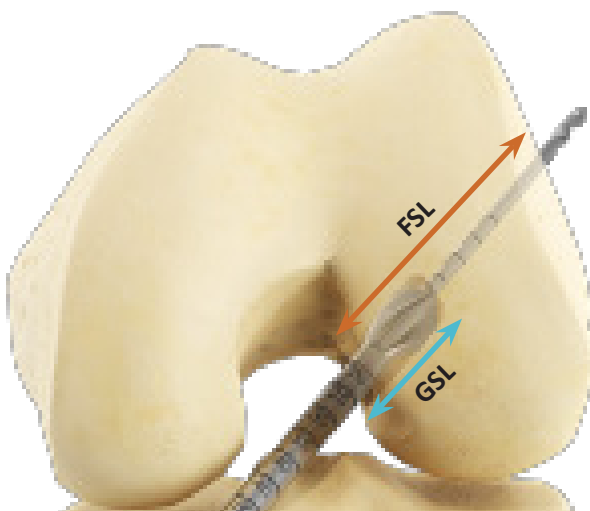


# Concept and range



Cortical fixation:  
 Length 15 mm  
 Length 20 mm  
 Length 25 mm  
 Length 30 mm  
 Length 35 mm

## COMETE Device choice



Femoral socket length (FSL)



Graft socket length (GSL)



5 mm



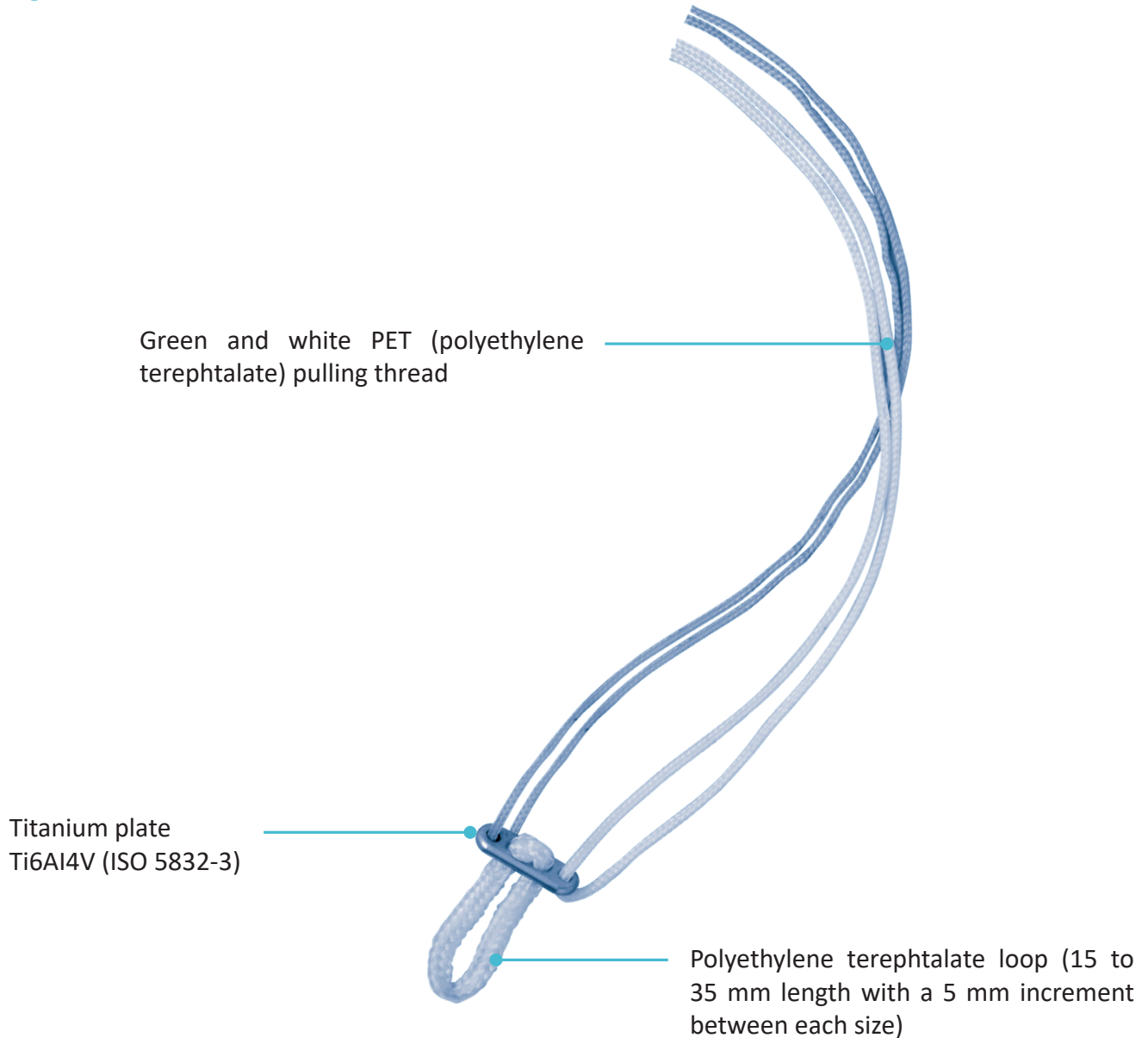
COMETE  
 Size

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# Concept and range

## COMETE device

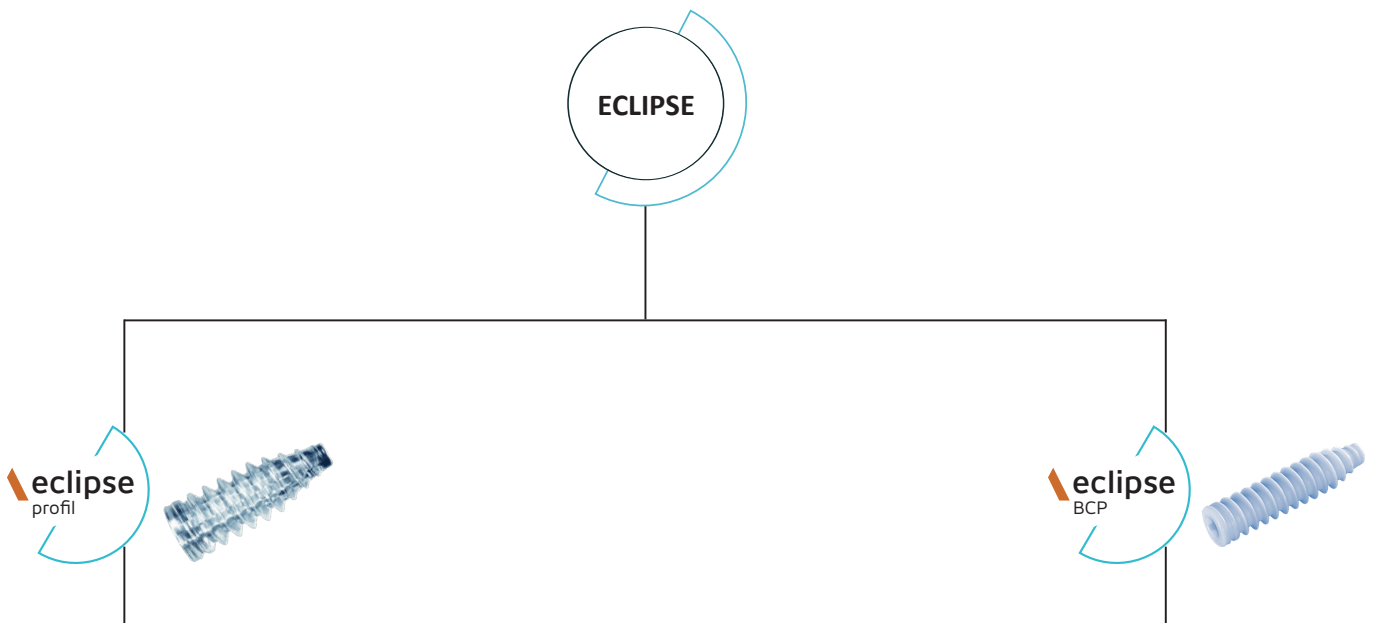
COMETE :








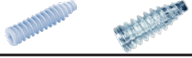
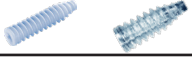






### NOTE

The purpose of this surgical technique description is to provide instruction on how to use the instrumentation properly. The surgeon is fully responsible for choosing and performing the approach and surgical technique

# Concept and range



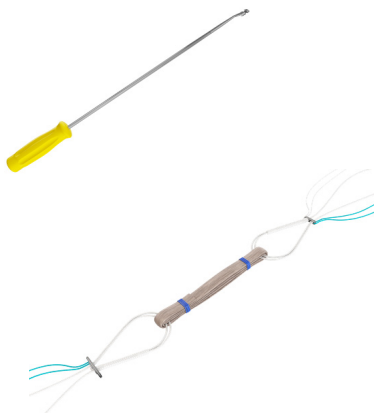
	Length 20 mm	Length 25 mm	Length 30 mm	Length 35 mm
Ø 7 mm				
Ø 8 mm				
Ø 9 mm				
Ø 10 mm				
Ø 11 mm				
Ø 12 mm				





# Surgical technique overview

**1** Harvesting and graft preparation



**2** Tibial preparation



**3** Femoral preparation

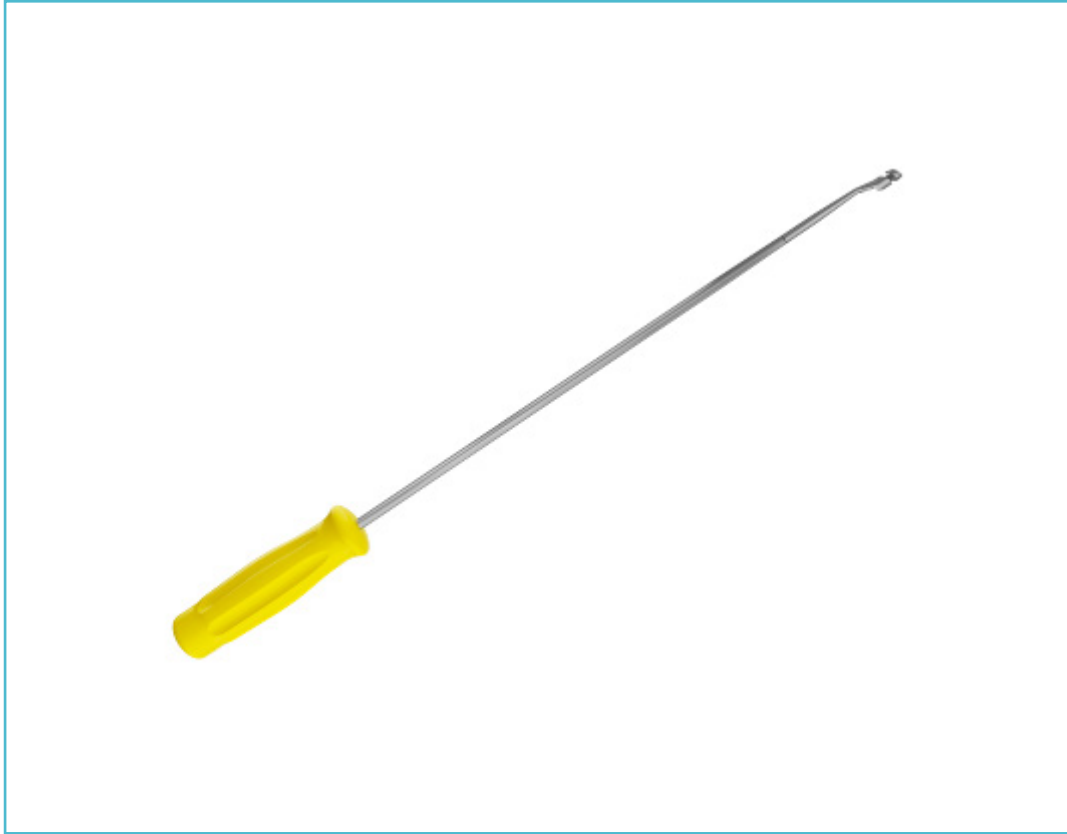


**4** Graft fixation



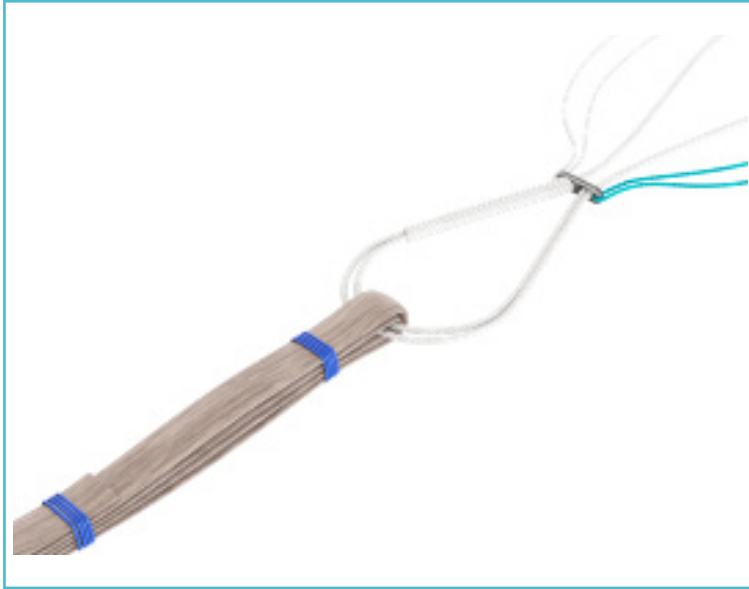
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# 1 Harvesting



Harvest the semi-tendinosus and gracilis with the open stripper.

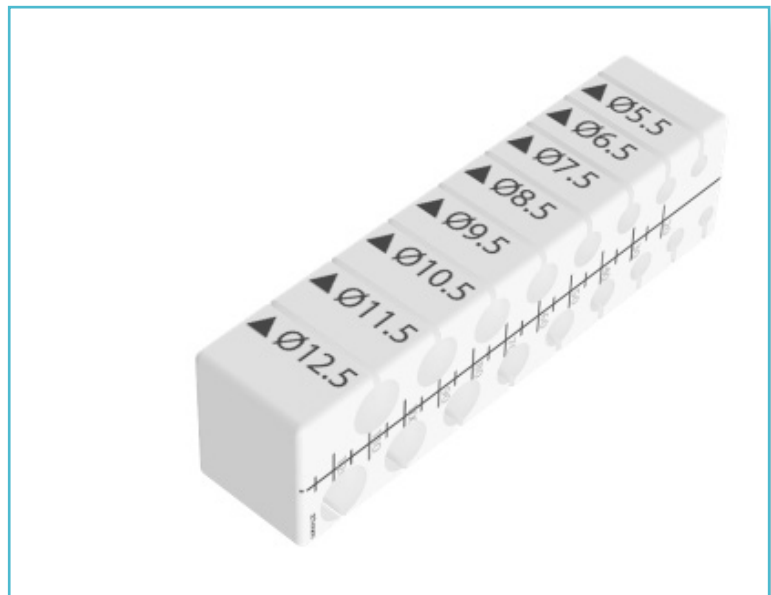
## 2 Graft preparation



Fold the semi-tendinosus and the gracilis in U shape into the comete Loop provided for femoral fixation.

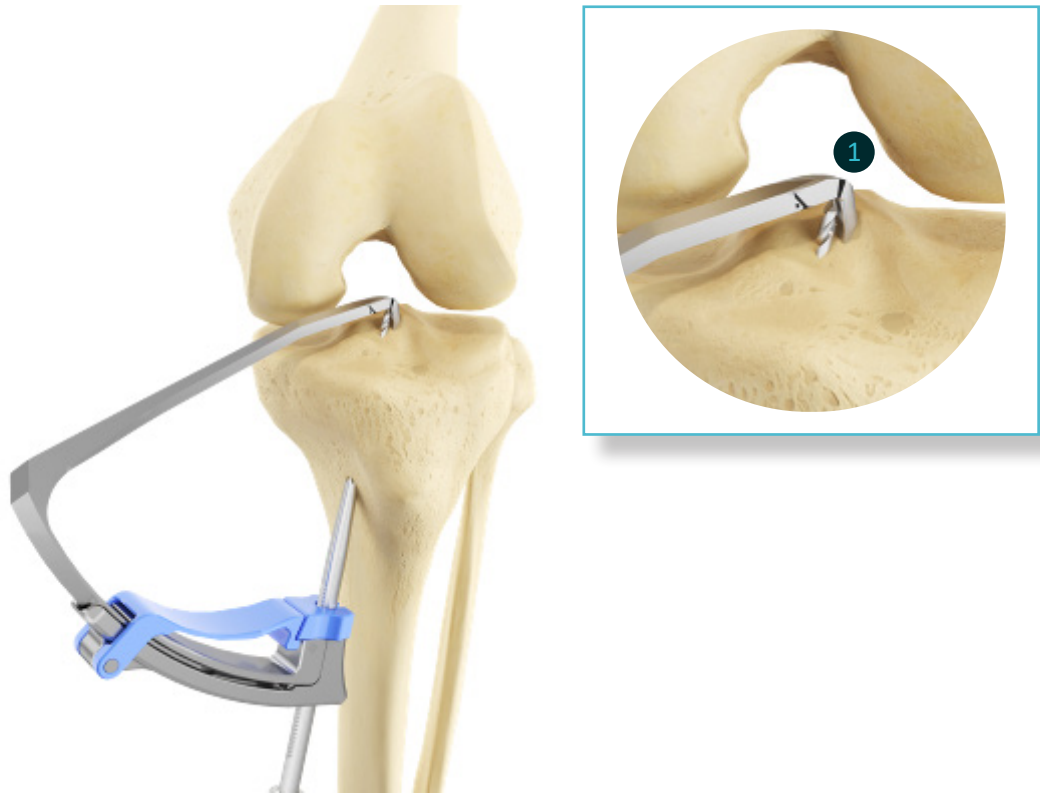
**Make distal and proximal suture linking the 4 strands of the graft.**

Calibrate (diameter and length) the graft using the graft sizer.



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### 3 Tibial placement



Assemble the tibial guide.

Insert the tibial guide through the medial portal. Then, place the tip of the modular tibial aimer on the ACL footprint.

The laser mark indicates the exit point of the wire pin guide. ①

Insert the tibial guide sleeve, flat surface facing upware. Apply only one clic when the sleeve is on contact with the cortex. Do not force the guide.

Drill the wire pin guide through the modular tibial guide sleeve.

Check the wire pin guide position, remove the tibial guide from the joint.

## 4 Tibial drilling

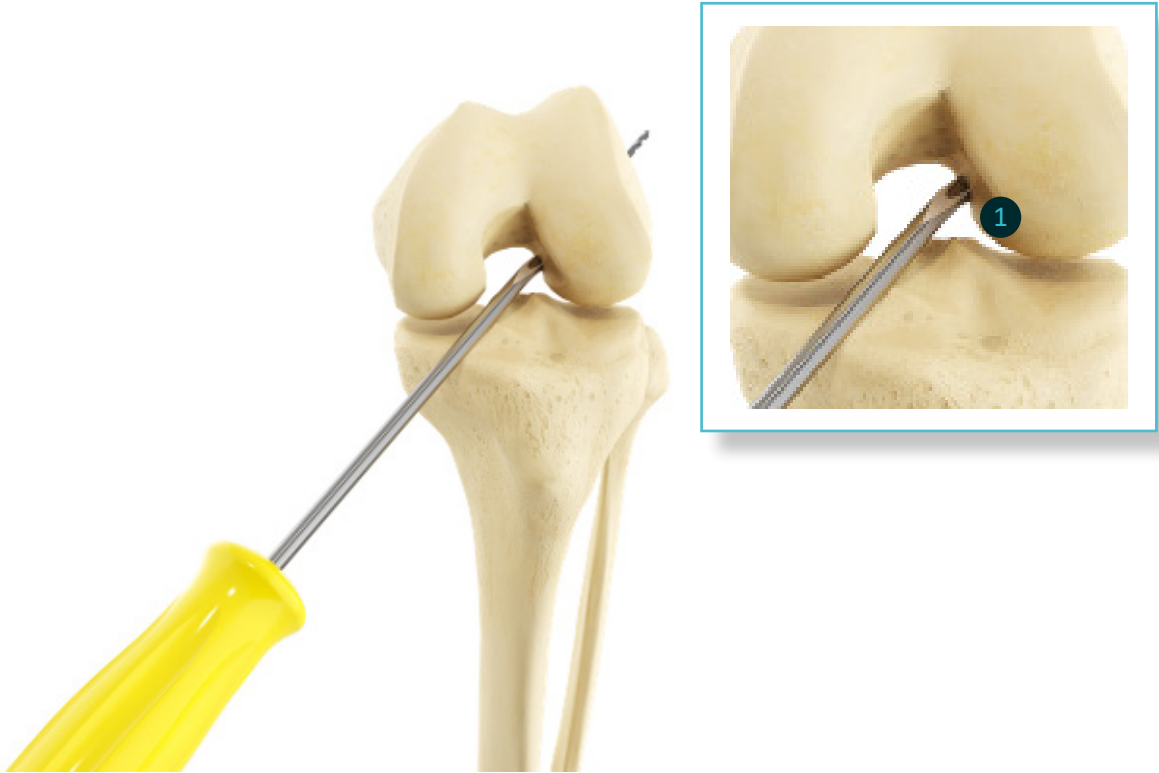


Select the reamer that matches the graft diameter.

Advance the reamer over the wire pin guide and drill the tibial tunnel.

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## 5 Femoral placement



Select the appropriate offset. 1mm more than the graft radius.

Place the hook of the femoral guide in contact with posterior cortical of the lateral condyle.

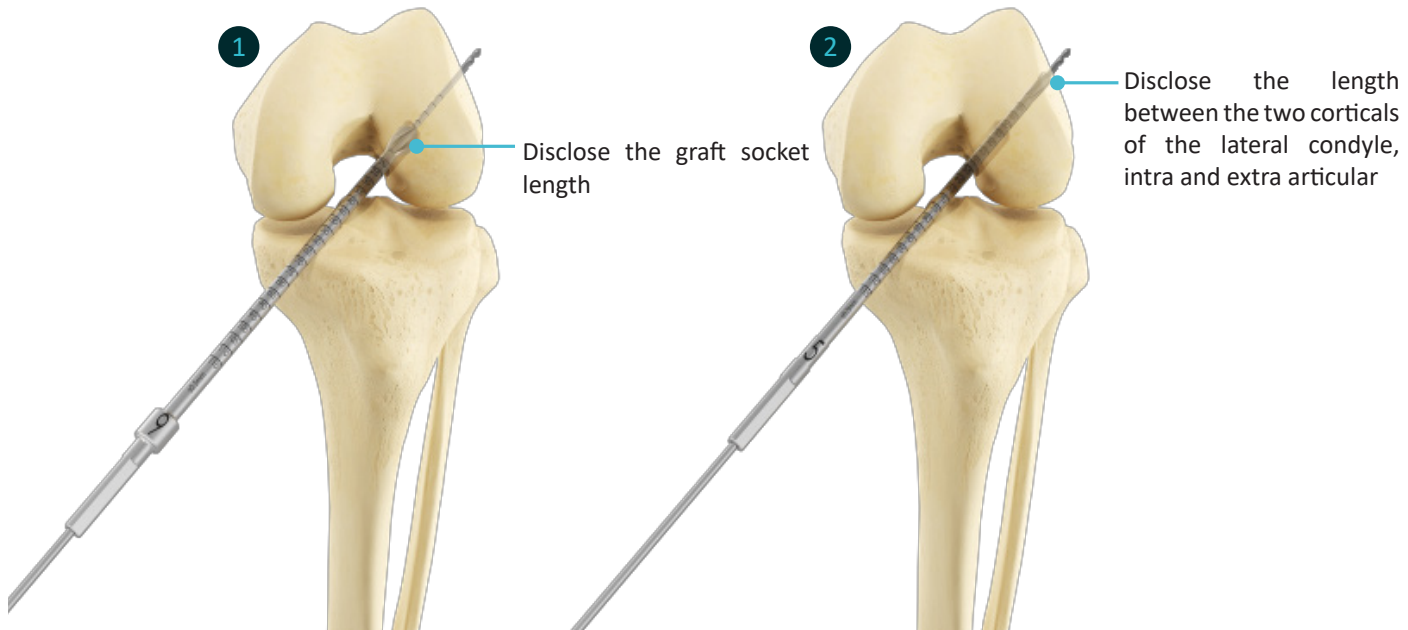
Drill the eyelet pin through the femoral guide. Pass the lateral cortex and skin. The graduated eyelet pin allow to determinate the total femoral socket length (FSL) by reading the graduation of the pin when the contact with the proximal cortical is reached.

Check the eyelet pin positioning on the femur.

### REMARQUE

The threaded graduated eyelet pin allow to measure the total femoral socket length (FSL) by reading the graduation of the pin when the contact with the proximal cortical is reached. 1

## 6 Femoral drilling



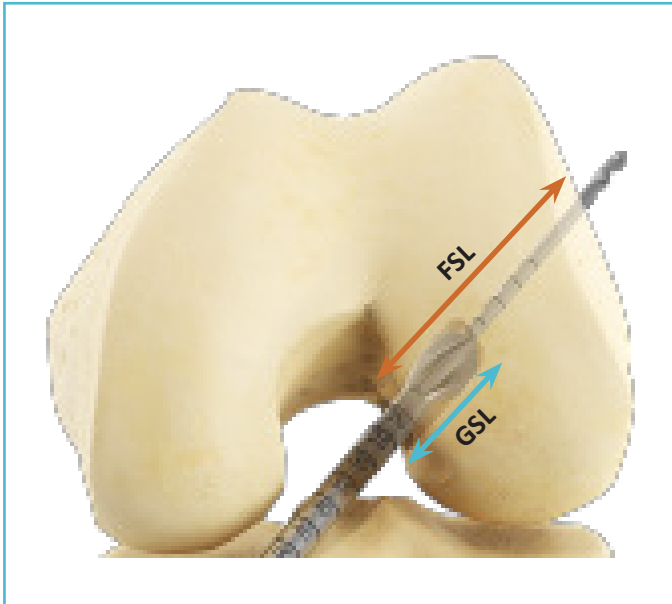
Select the reamer which matches.

Drill a graft socket at the desiderated length, chosen thanks to the reamer's graduation. 1

Take the 5 mm reamer.

Place the 5 mm reamer onto the eyelet pin then drill a a tunnel by crossing the lateral cortex. 2  
Measure the distance (FSL) between the two cortices of the lateral condyle (intra and extra articular) using the graduations of the reamer.

## 7 COMETE size choice



Femoral Socket Length (FSL)



Graft Socket Length (GSL)



5 mm



COMETE  
Size

COMETE loop made of PET (polyethylene terephthalate) length 15, 20, 25, 30 and 35 mm.

Select COMETE length loop = Difference between the Femoral Socket length (FSL) and the Graft Socket length (GSL) to which we add 5 mm.

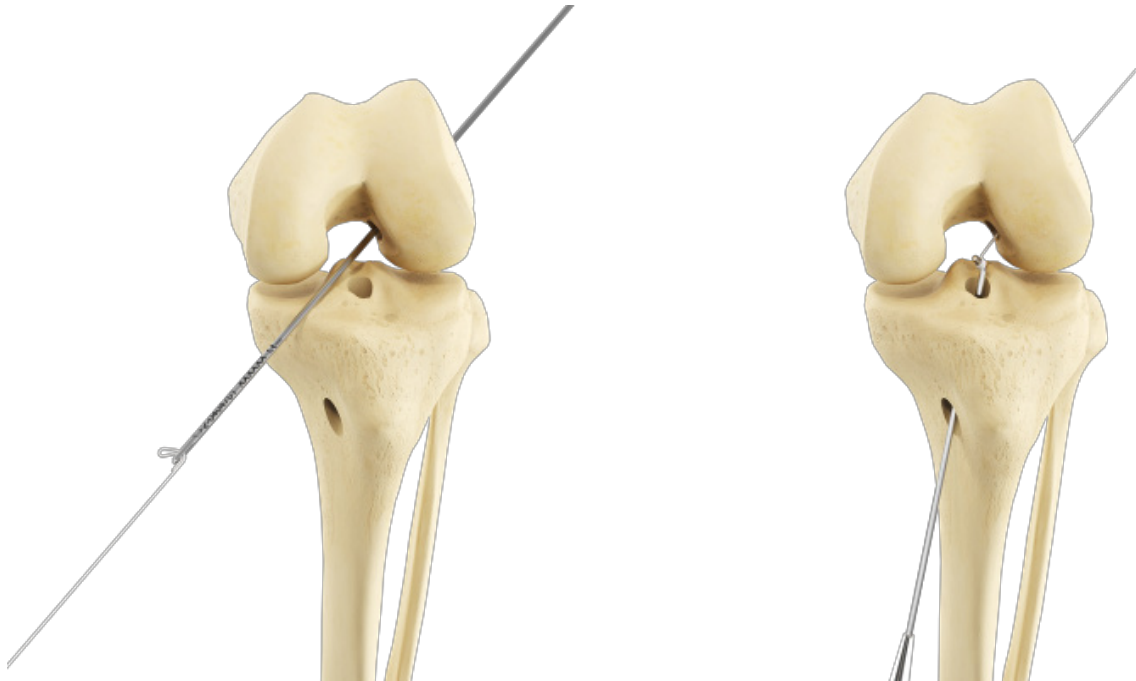
### Exemple :

Device COMETE choice in case of a 40 mm femoral tunnel length and a 20 mm graft socket length:

- Femoral socket (FSL) **40 mm**
- Graft socket (GSL) **20 mm**
- COMETE Length  **$40-20+5 = 25$  mm**



## 8 Suture loop passing



Pass a suture loop through the eyelet pin. maintain the suture loop and pull the eyelet pin to the femoral side until the suture wire come out at femoral side.

Pull the suture loop through the tibial tunnel by the intra articular way.

Exit the suture loop through the tibial tunnel.

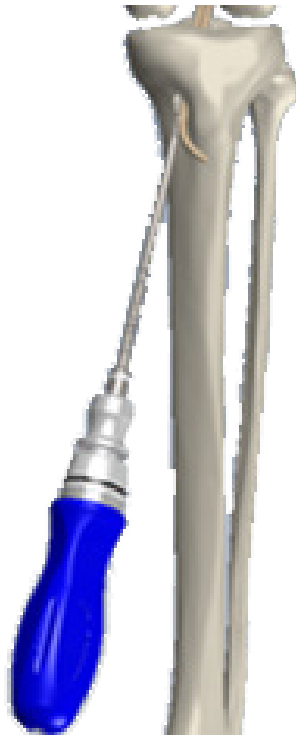


Pass the COMETE pullwire on the suture loop and tract it until the COMETE wire emerges from the femoral skin surface.

Pull the pullwires of COMETE applying a tension on white wire or green wire (this action orientate the Titanium plate in the axis of the tunnel). Stop to pull when the Titanium plate has passed the proximal femoral cortex.

Once the proximal femoral cortex has passed, pull the pullwire of the other colour than used for the traction in order to put the plate perpendicular to the cortex.  
Pull back the graft to control the fixation.

## 10 Tibial graft fixation by interference screw



### **Tapping:**

Pull the suture wire of the graft at the tibial level.

Place the screw guide wire into the tibial tunnel.

Pass the Starter Tap or the shank starter through the tibial tunnel onto the screw guide wire.

Thread the tunnel

### **Screwing:**

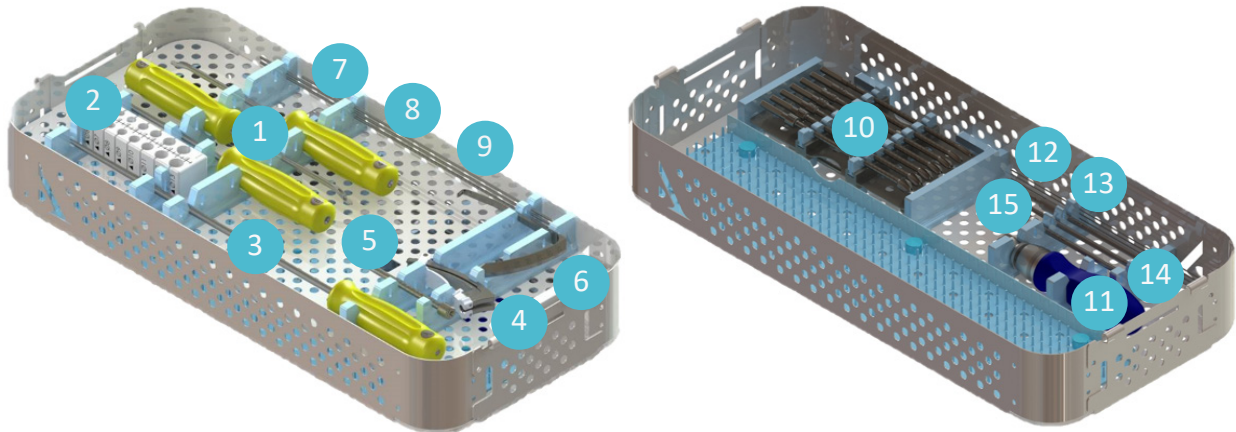
Put the interference screw ECLIPSE BCP or PROFIL onto the screwdriver diameter  $\varnothing$  7--12mm or the shank screwdriver.

Insert the screw into the tibial tunnel over the screw guide, keep the graft suture wire tension.



# Instrumentation

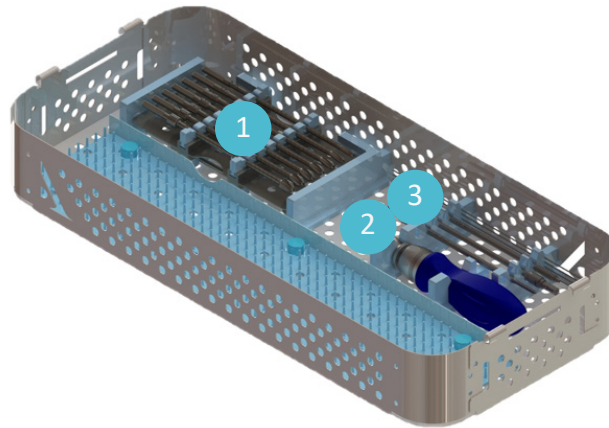
## Inside-Out modular instrumentation set



Item	Description	Reference	Qty
	5 mm IN/OUT femoral guide	2-0405305	1
1	6 mm IN/OUT femoral guide	2-0405306	1
	7 mm IN/OUT femoral guide	2-0405307	1
2	Graft sizer	2-0401800	1
3	Open stripper Ø5 mm	2-0405505	1
4	Modular guide body / handle	2-0404800	1
5	Modular tibial guide sleeve	2-0404900	1
6	Modular tibial aimer	2-0405000	1
7	Threaded graduated eyelet pin Ø 2,4 mm Lg 350 mm	2-0404700	1
8	Trocart eyelet pin Ø2.4 mm Lg 350 mm	2-0405400	1
9	Wire pin guide Ø 2.4 Lg 300 mm	2-0405600	1
	Reamer D 5.0 mm	2-0405210	1
	Reamer D 5.5 mm	2-0405215	1
	Reamer D 6.0 mm	2-0405220	1
	Reamer D 6.5 mm	2-0405225	1
	Reamer D 7.0 mm	2-0405230	1
	Reamer D 7.5 mm	2-0405235	1
10	Reamer D 8.0 mm	2-0405240	1
	Reamer D 8.5 mm	2-0405245	1
	Reamer D 9.0 mm	2-0405250	1
	Reamer D 9.5 mm	2-0405255	1
	Reamer D 10.0 mm	2-0405260	1
	Reamer D 11.0 mm	2-0405270	1
11	Ratcheting handle	2-0406400	1
12	Screw guidewire Ø1.1 mm length 240 mm	2-0405700	1
13	Nitinol guide wire Diameter 1.1 mm - length 300 mm	15INBR001F10	1
14	Shank screwdriver ECLIPSE BCP /Profil	2-0406200	1
15	Shank starter	2-0406300	1

# Instrumentation

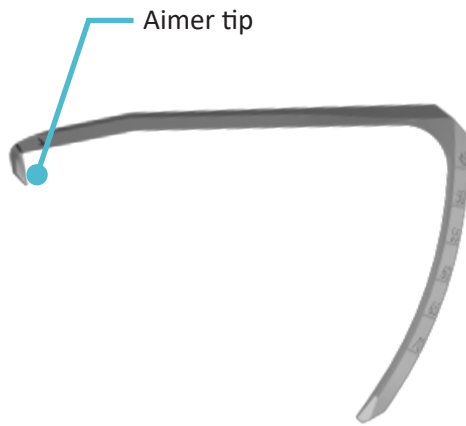
## Inside-Out modular instrumentation set



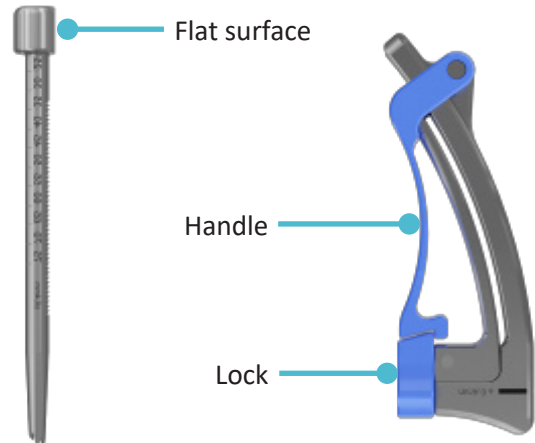
Item	Description	Reference	Qty
1	Short reamer D 5.0 mm	2-0406710	1
	Short reamer D 5.5 mm	2-0406715	1
	Short reamer D 6.0 mm	2-0406720	1
	Short reamer D 6.5 mm	2-0406725	1
	Short reamer D 7.0 mm	2-0406730	1
	Short reamer D 7.5 mm	2-0406735	1
	Short reamer D 8.0 mm	2-0406740	1
	Short reamer D 8.5 mm	2-0406745	1
	Short reamer D 9.0 mm	2-0406750	1
	Short reamer D 9.5 mm	2-0406755	1
	Short reamer D 10 mm	2-0406760	1
	Short reamer D 11 mm	2-0406770	1
2	Screwdriver diameter 7 - 12 mm	16INTO001	1
3	Starter tap	11INTA001	1

# Appendix A

## Tibial guide: Assembly

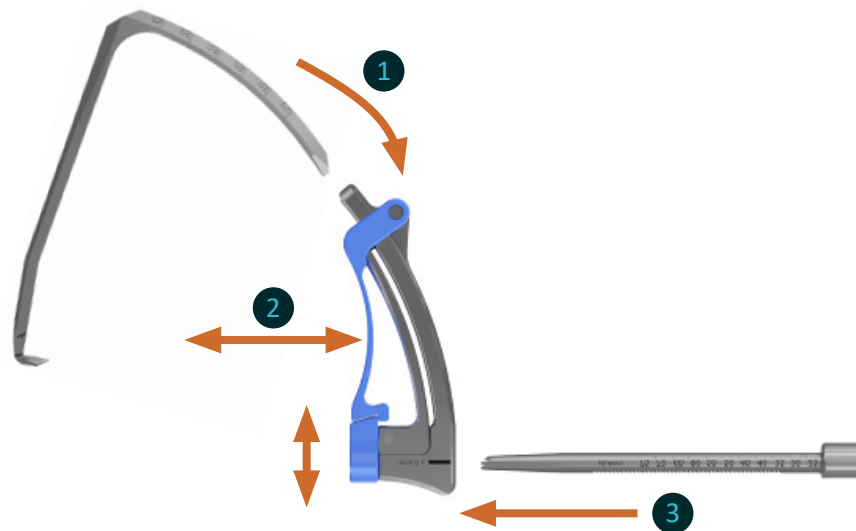


Modular tibial aimer



Modular tibial guide sleeve

Modular guide body/handle



- ▶ Insert the modular aimer into the modular guide handle to select angulation (1).
- ▶ Lock the guide (Modular tibial aimer + Modular guide handle) by pulling the blue handle towards the guide handle (2).

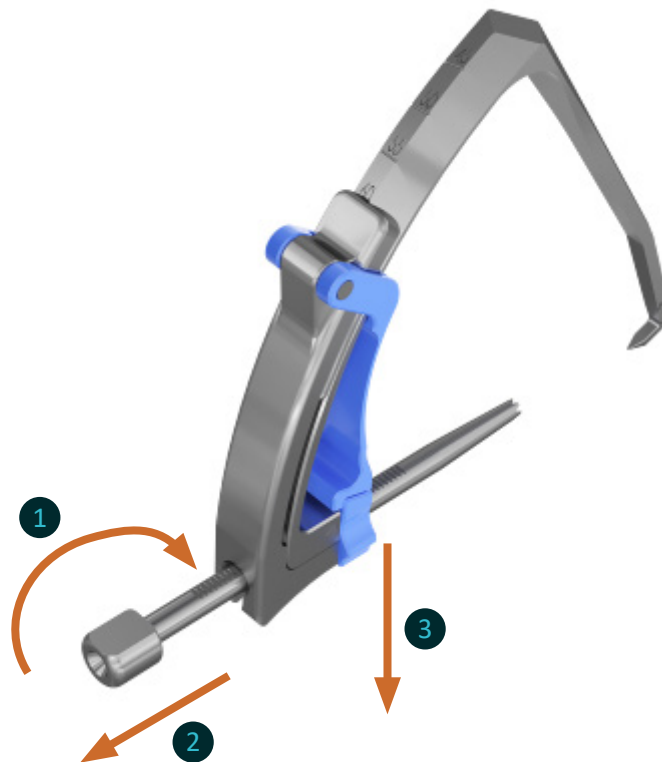
**Working principle : Move the lock down press the blue handle and move the lock up to block the modular tibial guide sleeve.**

- ▶ Insert the modular tibial guide sleeve into the modular guide handle, flat surface facing upware (3).
- ▶ The modular tibial guide sleeve cannot be inserted if the modular guide handle and aimer are not locked correctly. If this occurs, remove the aimer from the guide handle. Reassemble the handle and aimer, then reinsert the guide sleeve.

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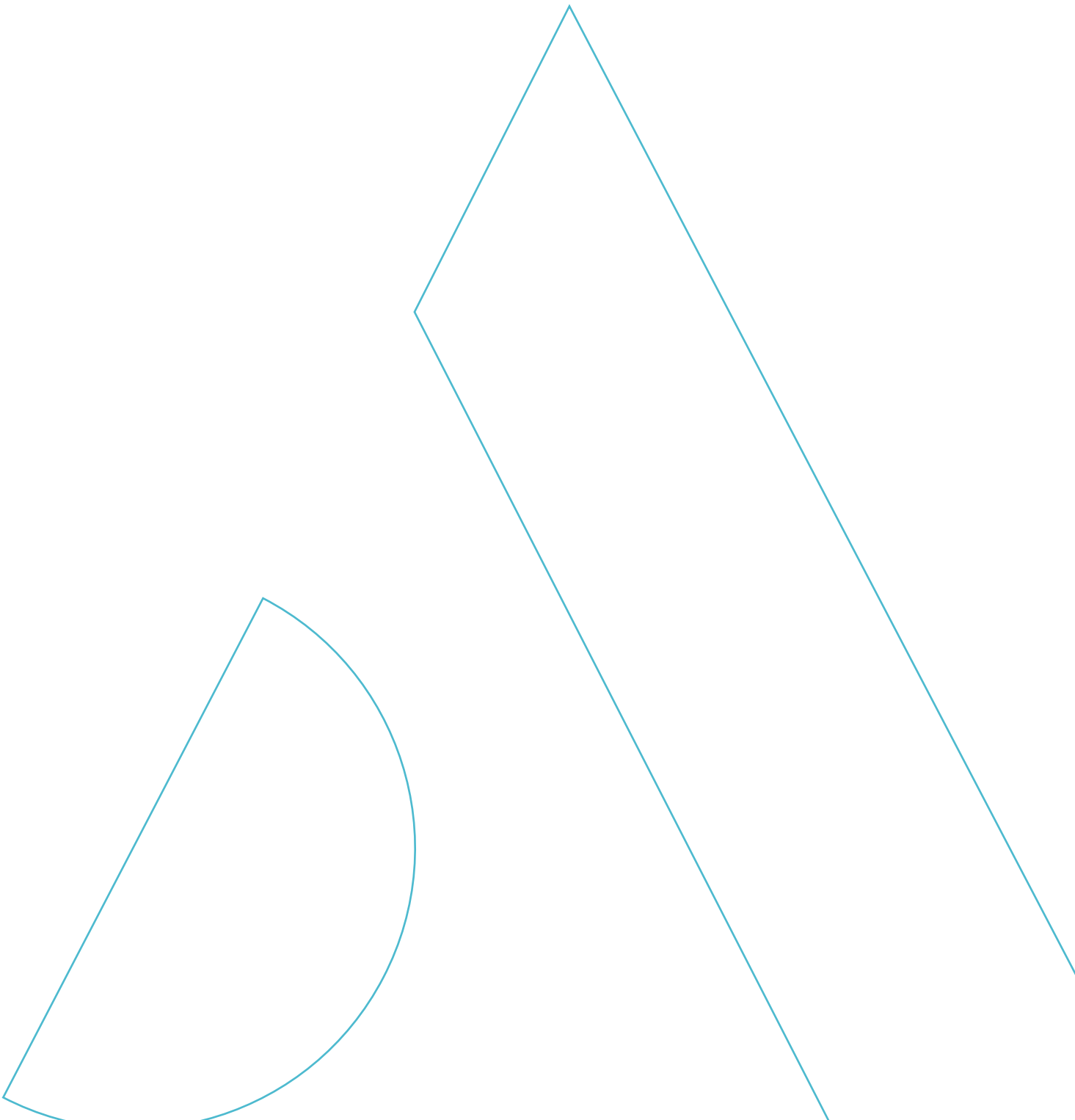
# Appendix B

## Tibial guide: Modification of the angulation



- ▶ Turn the guide sleeve a quarter turn (1).
- ▶ Remove the modular tibial guide sleeve (2).
- ▶ Unlock the tibial guide by pulling the lock downwards. This action releases the lock and the tibial guide sleeve (3).
- ▶ Change the angulation of the guide.
- ▶ Lock the guide then place the modular tibial aimer flat surface facing upware.







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