THE CoLS IS UNMATCHED IN VERSATILITY

As it can be used for **ACL, PCL, single bundle, double bundle, revisions, autograft & allograft procedures**—all using the same instrument set.

It's safe for **Pediatric Patients** because the growth plate is not crossed by the screw and tape fixation, while the manual retrograde reaming avoids epiphyseal plate lesions due to heat.[4]

The CoLS Fixation System utilizes two blunt-threaded screws and two tapes for a typical ACL reconstruction.

The blunt anchoring screws come in titanium or radiolucent, biocomposite PEEK® material. All screws are 10mm in diameter coming in lengths of 20 & 25mm (with an additional 12mm x 20mm rescue screw).

Polyethylene terephthalate anchoring tape

Peek® screw, radiolucent

Anodized titanium screw

Please note that the CoLS system is called the TLS in Europe and in the literature.

[1] Robert H, Bowen M, Odry G, Collette M, Cassard X, Lanternier H, de Polignac T. A Comparison of Four Tibial-Fixation Systems in Hamstring-Graft Anterior Ligament Reconstruction. European Journal of Orthopaedic Surgery & Traumatology. 2014

[2] Lopes R, Klouche S, Odri G, Grimaud O, Lanternier H, Hardy P. Does Retrograde Tibial Tunnel Drilling Decrease Subchondral Bone Lesions During ACL Reconstruction? A prospective trial comparing retrograde to antegrade technique. The Knee, 2016

[3] Robert H, Limozin R, de Polignac T. Work of the Societe D'Orthopedie et de Traumatologie de L'Ouest. Single Bundle Reconstruction of the Anterior Cruciate Ligament with Four Strands of the Semitendinosus using the TLS technique. Clinical results of a series of 74 knees with a minimum of 18 months follow-up. La Rochelle Meeting, June 2010, Communications

[4] Cassard X, Cavaignac E, Maubisson L, Bowen M. Anterior Cruciate Ligament Reconstruction in Children With A Quadrupled Semitendinosus Graft: Preliminary Results With Minimum 2 Years of Follow-up. Journal Pediatric Orthopaedics. 2013

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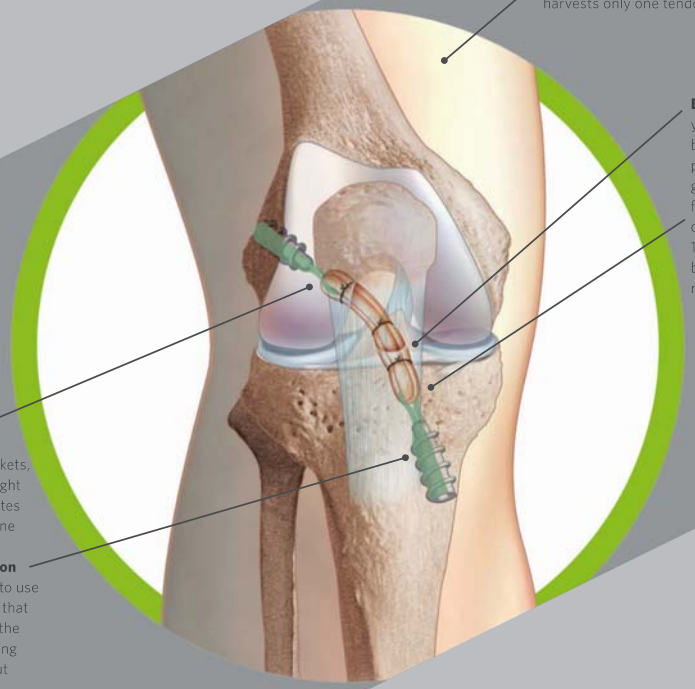
INTRODUCING

CoLS

AN INNOVATIVE ACL RECONSTRUCTION TECHNIQUE

Tissue sparing technique harvests only one tendon

Easy preparation yielding a quadruple bundled, pre-tensioned, patient-specific length graft, which completely fills **Short Bone Sockets** of 10 mm (femur) & 15 mm (tibia) created by manual retrograde reaming



Press Fit into sockets, creating a watertight seal which promotes 360° aperture bone healing with **Secondary Fixation** provided by easy to use tapes and screws that don't impinge on the graft, thus providing unmatched pullout strength

Specifically designed for full weight-bearing and full range of motion immediately following surgery.

THE HAMSTRING THAT MOST CLOSELY MIMICS THE NATIVE ACL

BY FH ORTHO INC.

THE CoLS HAMSTRING GRAFT ACTS MOST LIKE THE NATIVE ACL

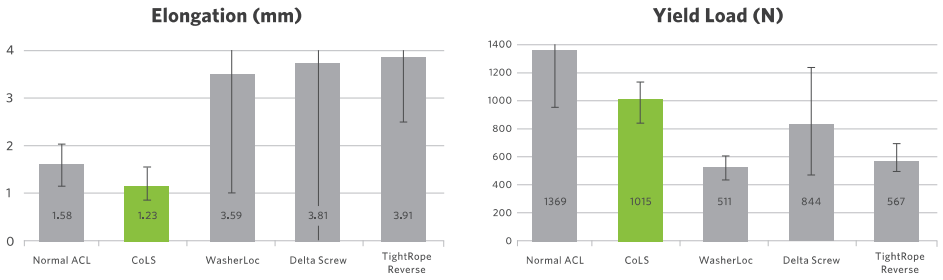
IN PLACEMENT

Outside-in targeting of both femoral & tibial graft insertion sites for accurate placement on native ACL footprint

IN HEALING

Arthroscopic view of a graft at 5 months with 360° intra-articular aperture healing

IN MECHANICAL PROPERTIES



Elongation & Yield Load are crucial in assessing the quality of an ACL repair. See how the CoLS System compares to other constructs in this comparative study.[1]

THE CoLS SYSTEM IS SUPERIOR TO OTHER CONSTRUCTS AND MOST LIKE A NORMAL ACL

THE CoLS SYSTEM DECREASES POST-OPERATIVE PAIN[2]

- Shorter sockets are bone preserving
- Manual retro-reamed sockets produce less edema
- No anterior knee pain vs. BTB; only one hamstring tendon required
- Pretensioning of the graft with minimal suspension minimizes post-surgical elongation and differential laxity

Graft is pretensioned at 300 - 500 Newtons for 30 - 60 seconds using the CoLS Tensor

WITH EXCEPTIONAL IMPROVEMENTS OF KNEE FUNCTION[3]

Results from a multicenter, continuous prospective outcomes study on 74 knees with 24 month mean follow-up

- Post-op rehab in the study included immediate weight bearing, free flexion without splinting, and gentle physiotherapy
- There were no general or infectious complications & no retears

Improvements seen between Pre-op & Post-op ACL procedures:

	PRE-OP	POST-OP
Mean IKDC Score	68	92
Mean Lysholm Functional Score	74	94
Mean Pain Score	3.4	1.1
Mean Differential Laxity	5.9mm	1.9mm
Negative Pivot Shift	8%	84%

Tegner Activity Score: 85% of patients could perform intense to very intense activities post-op compared to 16% pre-op