Faden: Different Surgical Strategies
When to use?
When to use?

- 10 ET
- 15 ET
- 25 ET
- 30 ET

Distance

Near
Traditional Faden Procedure
Distance
Near
Preoperative
Postoperative
10 ET
15 ET
25 ET
30 ET
Distance
Near
Faden stretch
Faden (stretch)
Surgical techniques with Faden Effect

- Bridge Suture
- Resect-recess (Scott – Buckley)
- Pulley posterior fixation (Clark).
- Faden with adjustable sutures (Jonathan Holmes)
- Y Split
Bridge Suture

Cüppers  Deller modification  Bridge suture

Alfonso Castanera: Length-Tension Diagrams of Medial Rectus Muscles after Cüppers Fadenoperation. Ophthalmologica 1989;198:46-52
Bridge suture: Advantages

- Does not touch the muscle (less adherences)
- No muscle atrophy in front of the faden
- Faster and easier to perform
- Easier to reoperate
CHAPTER 3
POSTERIOR FIXATION: ADJUSTABLE AND WITHOUT POSTERIOR SUTURES

Alan B. Scott

1. INTRODUCTION

The Faden operation of Cuppers, suturing the extraocular muscle to the sclera posterior to the equator of the globe, has been a major contribution to surgical management of non-comitant strabismus. A major limitation of the current procedure is the lack of the ability to adjust the muscle position to achieve optimum alignment when performed in association with muscle recession. Difficulty with far posterior exposure, especially on the lateral rectus, may lead to inadequate or more anterior suturing. These problems are addressed by the technic proposed.

Resect / Recess
Combined Resection and Recession of a Single Rectus Muscle for the Treatment of Incomitant Strabismus

Charles J. Bock, Jr. MD, Edward G. Buckley, MD, and Sharon F. Freedman, MD
Resect - Recess

**PROS**
- No need to place very posterior scleral sutures
- Adjustable
- Easier

**CONS**
- Uncertainty of scleral attachment in large resect/recess
- No nomograms.

Better for lateral and superior rectus where placing a faden is more difficult and risky.
Medial Rectus (MR) Pulley Posterior Fixation (PF): A Novel Technique to Augment Recession

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INTRODUCTION: MR pulley PF, a technique of suturing the pulley to its muscle without scleral sutures, is as effective as traditional PF in primary treatment of acquired esotropia (ET) with a high AC/A ratio. This study examines the effectiveness of MR pulley PF for other variants of ET.

METHODS: We retrospectively analyzed the pre- and post-operative alignment of eight previously operated patients with excess near ET, unilateral surgery in four patients who had sensory ET and excess near deviation, and two patients who had large angle infantile ET. Surgeries involved extracocular muscle resections and resections in standard doses combined with MR PF.

RESULTS: All eight re-operated patients were within 10° of orthophoria at distance. The excess near ET decreased from 12.4° pre-operatively (range 6-25°) to 1.2° post-operatively (range 0-4°). Two of the four patients with sensory ET were over-corrected at distance (exotropia of 10 and 15°). The excess near ET decreased from 13.5° pre-operatively (range 10-20°) to 2.5° post-operatively (range 0-10°). In both patients with large angle infantile ET, bilateral MR pulley PF increased the predicted effect of standard bilateral MR resection.
Pulley posterior fixation

- The pulley is fixed to the anterior surface of the muscle
- Causes a mechanical restriction towards the operated muscle which limits the muscle’s duction.
Faden with adjustable sutures

- Suture is placed underneath the muscle
- Not tied very tightly which allows the muscle to slide only a couple of mm when muscle is adjusted.

Y – splitting of the muscle

- Both halves of the muscle are split and separated over 10 mm apart.

- Reduces the muscle torque thus diminishing the rotational effect

- Advantages:
  - Easier
  - No posterior scleral sutures
  - Less adherences and cicatricial tissue

Different techniques to correct incomitant strabismus

Choose the one you feel more comfortable with

Remember that some techniques are more suitable for certain muscles than others