

HEADPOST AND CHAMBERS IMPLANTATION SURGERY

- Surgical knife handles No 3 and No 7.
- Mayo (straight and curved) and Metzenbaum (dissecting) surgical scissors
- Retractors (included in the surgical pack but we seldom use except perhaps for the hand held retractors usually employed by the sterile assistant to increase the surgical working field by e.g. retracting temporarily the muscle)
- Hemostatic forceps
- Tissue forceps including rat-tooth tip forceps (see Adson delicate in figure, 1x2 teeth are recommended) and intermeshing fine teeth forceps (see Brown-Adson in figure)
- Towel forceps
- Needle holders
- Periosteal elevators and dissectors (Penfield). Blunt and sharp blades (ends) are both useful
- Bone Rongeurs
- Bone cutting forceps
- Stapler and wound clips if staples are chosen over sutures
- Scalpel Blades: we use number 11 for the incision of the skin and number 15 for the conjunctiva incision in the eye coil surgery
- Suction tubes (suction cannula): (the stainless steel tube attached to the plastic tube of the suction pump. Angled suction tubes of different sizes (diameters e.g. 3, 7, 12Fr) are recommended.
- Sutures 2-O Ethilon for skin, 3-O Vicryl for fascia and muscle
- Wooden handles for taps and drills by Synthes for tapping and drilling cat # 311.43
- Hex Screwdriver by Synthes (for cortex screws) cat # 314.020
- Screw holder (sleeve) on screwdriver by Synthes (optional) cat # 314.060
- 2.7mm Tap by Synthes cat # 311.260
- 2.0mm Drill bit by Synthes cat # 310.190
- Bending irons for bending the headpost adjustments to fit the skull
- 2.7mm Cortex screws (titanium) by Veterinary Orthopedics Implants Inc of 6mm (T270.06, non self tapped and T270.06T self tapped) and 8mm length (T270.08)
- Drill guide sleeves (at least 2) by Synthes cat #312.96
- Sterile skin markers (pens)
- Irrigator
- Coagulator
- Headpost, chambers
- Zimmer bone cement (cat No 1102-016)

NOTE: All Synthes products can be purchased from Veterinary Orthopedics Implants Inc.



Surgical knife handles

Left #7 (Aesculap Scalpel handle BB 73), and right #3 (Aesc. Scalpel h. BB 77).



Surgical scissors.

From left to right: Straight Mayo (Aesculap Mayo-Stille dissecting scissors BC 578), Curved Mayo (Miltex Serratex-Mayo dissecting scissors 5-134), wire cutting(Aesc. Wire scissors DP 551), and curved Metzenbaum(Aesc. Metzenbaum dissecting scissors BC 606).



Retractors.



Hemostatic forceps.



Tissue forceps.

From left to right: Penfield watchmaker forceps(Codman 30-1194), Adson delicate tissue forceps (Aesc. BD 511R), Brown-Adson tissue .forceps (Aesc. BD 700R).



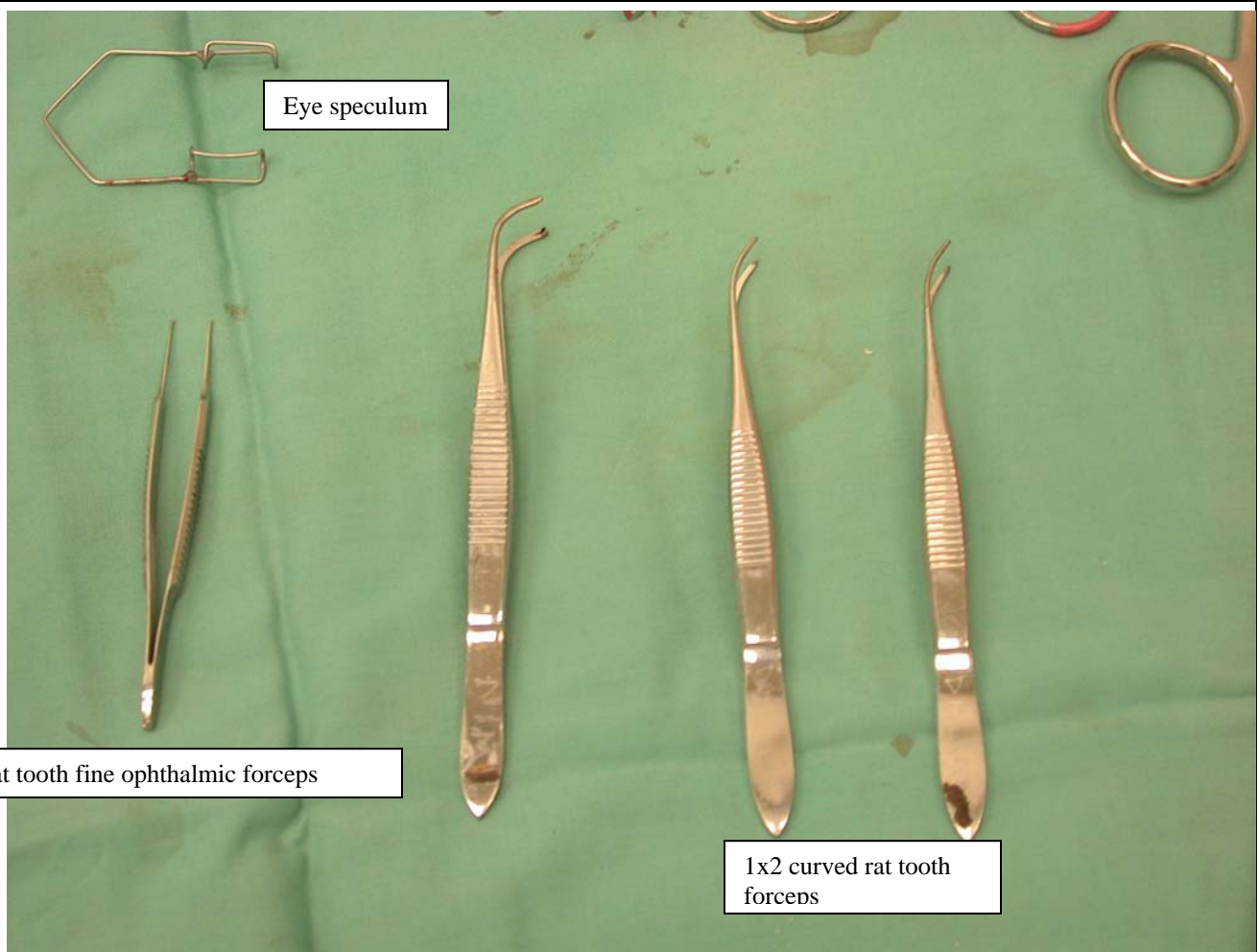
Towel clips.



Needle Holders.

EYE COIL SURGERY

- Eye speculum (pediatric size ?)
- Irrigator
- Forceps: at least a couple of fixation forceps, curved with 1x2 teeth tip, fine plain forceps without teeth, tissue forceps with fine teeth.
- Standard Needle holder
- Ophthalmic needle holder
- Ophthalmic scissors with straight and curved tips
- Small Metzenbaum scissors for blunt dissection of the Tenon's capsule.
- Scalpel blades (usually No 15 for the conjunctiva)
- Knife handles (preferably No 7)
- Absorbable sutures e.g. vicryl 6-O or 7-O for conjunctiva
- Long Needles to guide the wire through the outer surface of the Tenon's capsule, along the zygomatic bone and either out through an incision made on the zygomatic arch or directly underneath the temporal muscle. Not sure where these needles can be purchased from. They are shown in the pictures below.
- Multimeter
- Golden pins (female connector) purchased from Fine Science Tools, gold wire contacts cat #19003-01
- Plastic gray connector Powell electronics Northrop Grumman Component Technologies or Winchester electronics, part number SM2S series 8M
- Wire from Alpha Wire Company, 24 AWG part # 3050
- Wire cutter
- Wire stripper
- Solder (optional)
- DMC AFM8 Crimping tool.
- Eye coil (most commonly used sizes 17 or 18mm diameter): eye coil wire: used to be Cooner Wire (Chatsworth, CA) part # AS632 or AS633 (Sir Monkalot still has an AS633 which works fine). More recently we purchased wire from Alan Baird Industries 1x7x0.0012" code # S170012A7-FEP. We haven't tested it yet in the 4 monkeys we have implanted.



Eye speculum

1x2 rat tooth fine ophthalmic forceps

1x2 curved rat tooth
forceps



Long needles for eye coil surgery



