Humerus Osteotomies

– palliative measures for the medial elbow

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Best bet for good elbows?
RIGHT LEG CAUDAL ASPECT

\[ \Delta \]

\[ F_{MC} \]

\[ M_{FG} \]

\[ F_{LCLL} \]

\[ F_G \]

\[ M_{MED} \]

\[ LAT \]
ULNAR PROXIMAL (PFEIL) OSTEOTOMY

LATERAL ASPECT

CAUDAL

CRANIAL
ULNAR PROXIMAL (PFEIL) OSTEOTOMY

CAUDAL ASPECT

\[ \Delta \approx 0 \]
Humeral Sliding Osteotomy

• Effect of humeral osteotomy on joint surface contact in canine elbow joints.

• In vitro force mapping of normal canine humeroradial and humeroulnar joints.
Humeral Sliding Osteotomy


HUMERAL SLIDING (SCHULZ) OSTEOSOTOMY

CRANIAL ASPECT

EFFECT OF GAIT ADJUSTMENT
HUMERAL SLIDING (SCHULZ) OSTEOSOTOMY

EFFECT OF GAIT ADJUSTMENT

PLUS ACCIDENTAL ANGULATION

MED

MED
Humeral Sliding Osteotomy

… ameliorates lameness and pain … at medium-term follow-up. Application technique is critical to minimizing morbidity.

So how about:

HUMERAL (EXTERNAL) ROTATION OSTEOTOMY?
HUMERAL (EXTERNAL) ROTATION OSTEOTOMY

MEDIAL ASPECT

CRANIAL  CAUDAL
HUMERAL (EXTERNAL) ROTATION OSTEOTOMY

CRANIAL ASPECT

MED

Δ

Δ ~ 0
ALPS 11 with a rotation hole distally
ALPS 11 with a rotation hole distally
1. clamp with forceps
2. drill 1, 2, then 6 at 5° or 10°
3. cut the bone
4. fix proximally (2 and 1)
5. special pin in 6
6. drill 5, screw 5
7. complete with locking screws in 3, 4 and 6
Caution!
Only gate matters!

(A) could be better off if

(B) brings the paw to the center line
Humerus Osteotomies

- all three are palliative
- surgical planning (?)
- surgical technique (?)
- morbidity (?)