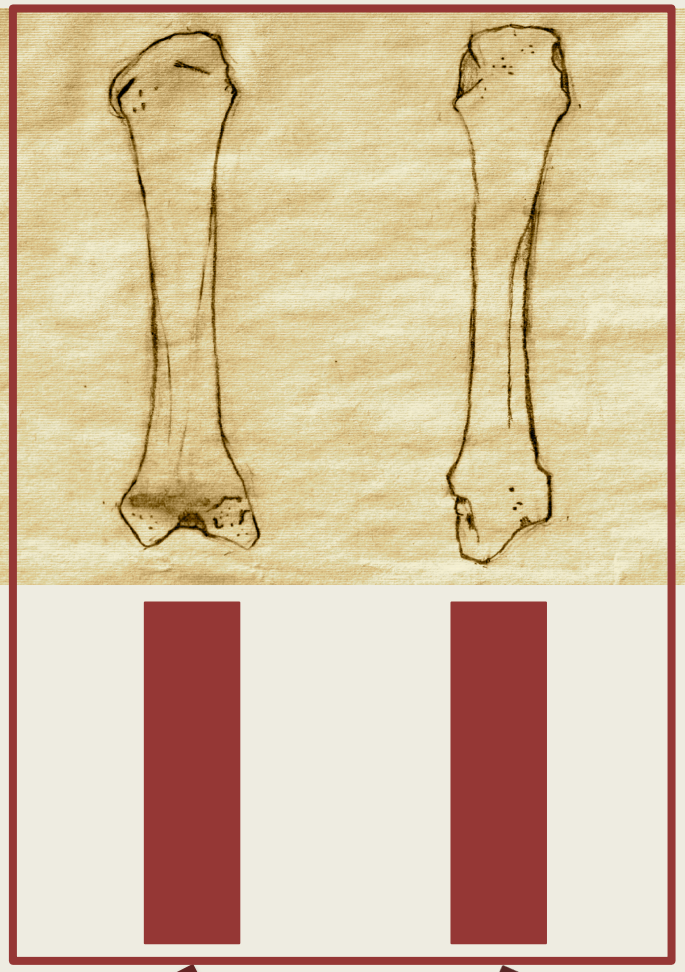
Corgi = Metacarpal

Greyhound = Metatarsal

# Step 1a: Recognize the shafts

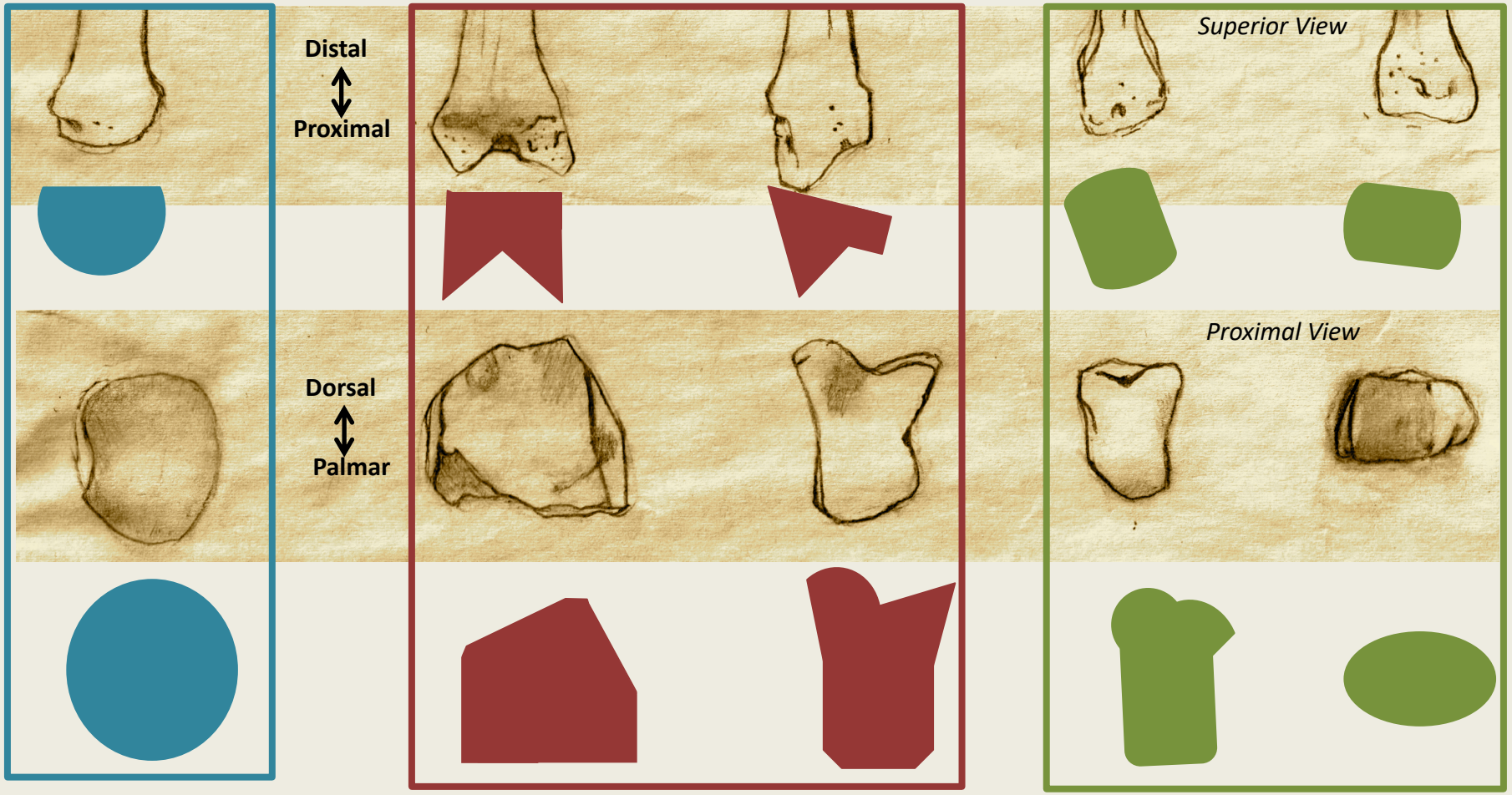



**MC1** has a shaft that is stockier and shorter than all other MC shafts.

**MC2 and MC3** have the longest and most robust shafts, that flare slightly at both their proximal and distal ends in superior view.

**MC4 and MC5** have the most gracile shafts. In superior view, their shafts seem to flare most at their distal ends, and then winnow proximally.

# Step 1b: Recognize the proximal ends

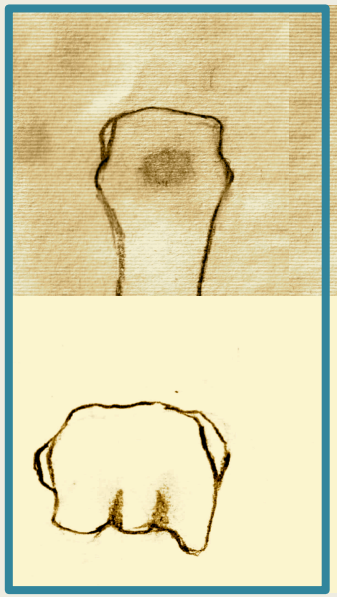


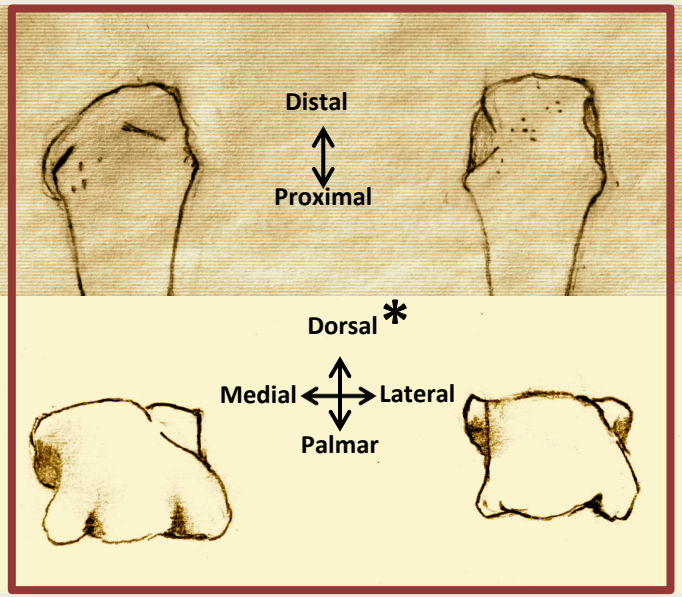

MC1 has a proximal end that is **semi-circular** in superior view, and an articular surface that has a **circular outline** and a concave center in proximal view.

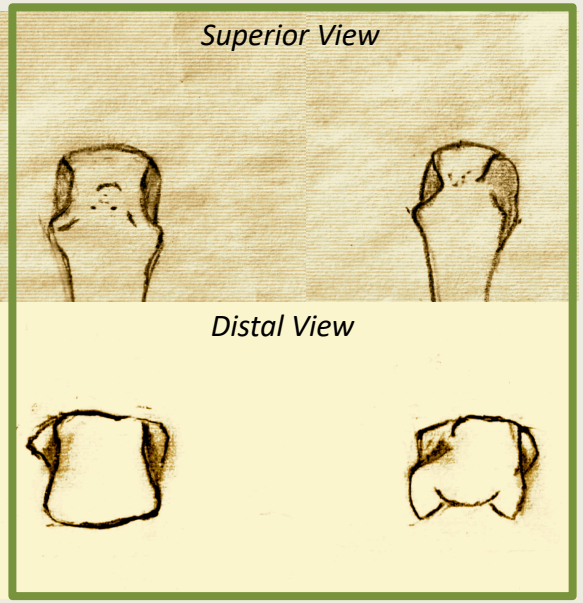
MC2 and MC3 have the largest proximal ends of all the metacarpals. Their ends are **pointy and triangular** in superior view. Though shaped differently, both proximal articular surfaces have decidedly **angular outlines**.

MC4 and MC5 have the smallest proximal ends of all the metacarpals. Their ends are **rounded and knob-like** in superior view. Their proximal articular surfaces have **rounded or oval outlines**.

# Step 1c: Recognize the distal ends






MC1 has a blocky distal end with three distinct projections, the largest of which forms a prominent lateral point. The distal end lacks deep medial and lateral divots.

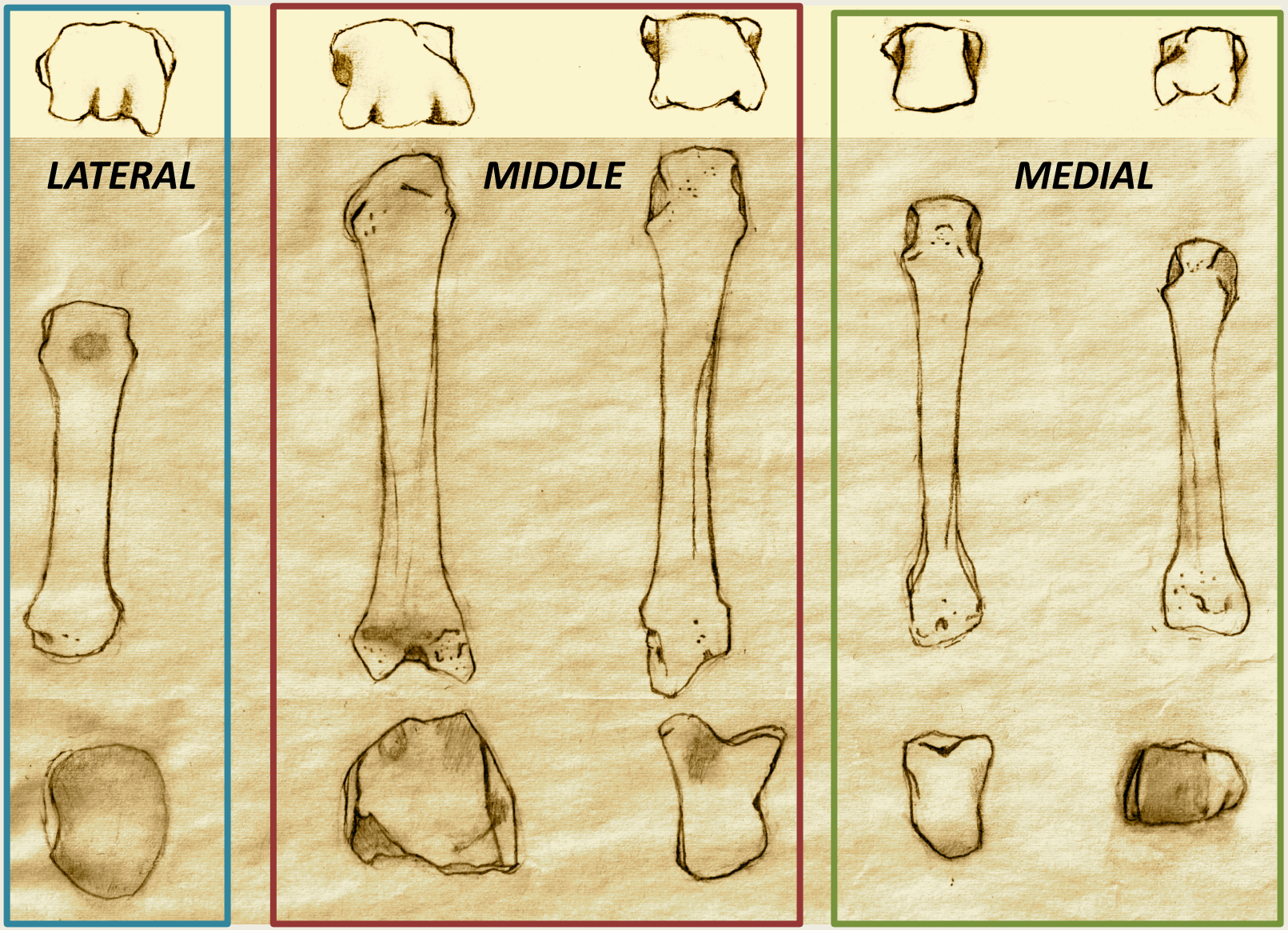
MC2 and MC3 have heads that are wider than they are tall. The heads have deep medial and lateral divots, and are more rectangular than the square heads of MC3-4.

MC4 and MC5 have the smallest heads of all of the metacarpals. Their palmar projections are less pronounced than MC2-3, and their outlines are more square.

* These directions work for each individual distal end pictured, but not the positions of the bones themselves (e.g. in SAP, MC2 is medial to MC1, not lateral to it).

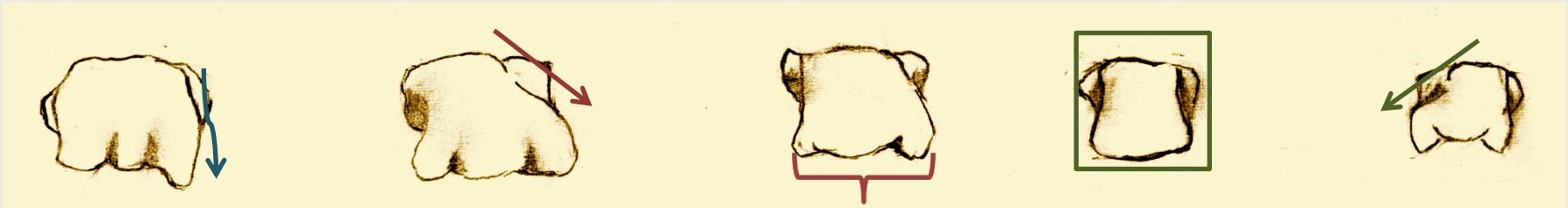
As an aside, I don't know whether this is widely agreed upon in the osteological community, but I find that the metacarpal heads look like octopus faces with large bulbous noses when examined in distal view.

# Step 2: Identify group




Now, use your newfound familiarity with the different portions of each metacarpal to decide whether the bone should go in the lateral, middle or medial group.

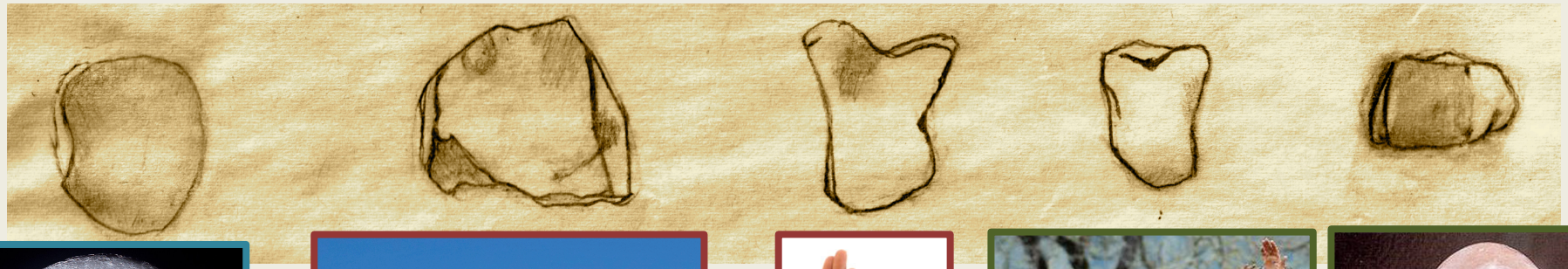
# Step 3: Identify which metacarpal you have



**MC1** is most easily distinguished by its wide head and asymmetrical, lateral projection.

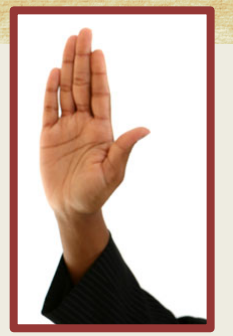
**MC2** has three distinct lobes on its palmar surface, and its lateral half has an oblique lateral slant. **MC3** has less distinct lobes, and a much less pronounced lateral slant.

The **MC4** head has the most square outline of the MCs. The head of **MC5** has a distinct medial slant.



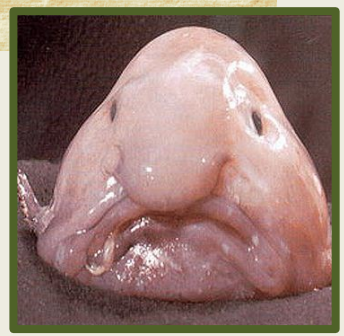
**MC1** has a circular and moon-shaped proximal articular surface. Its outline is more regular than any other MC.

**MC2** has a proximal articular surface that resembles a craggy mountain peak. It is flatter at the base (palmar) and more pointed at the top (dorsal).

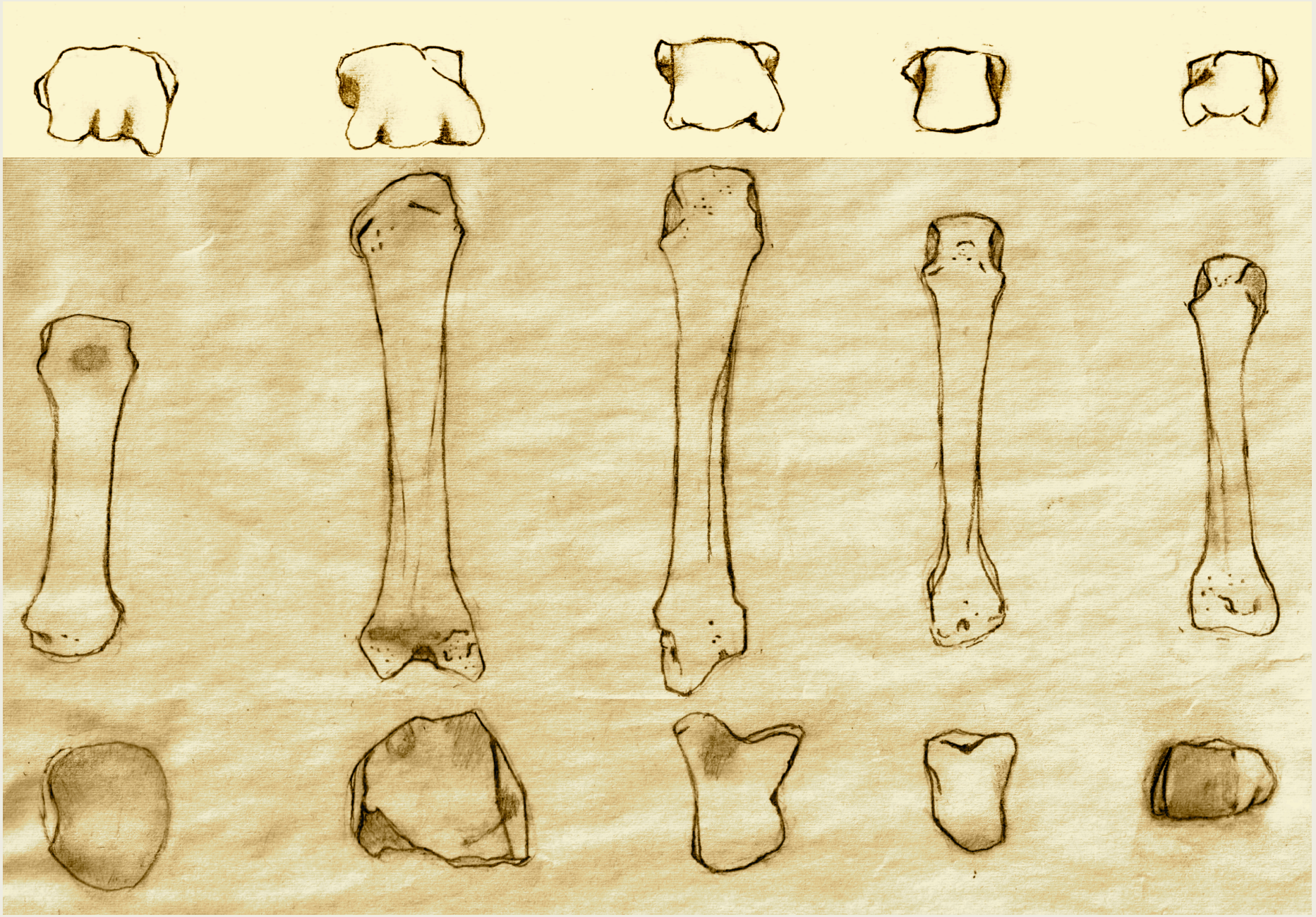


**MC3** is easily distinguished by its dorsal, lateral projection. This *styloid process* makes it looks like it's high-fiving MC2.

**MC4** looks like it is trying, and failing, to be an MC3. It has a similar outline, but is smaller, less angular, and lacks a styloid process.



**MC5** has a bulbous, ovoid outline that lacks the defining features and pizazz of the other proximal ends. It's kind of the blobfish of the metacarpal world.


Distal View
Superior View
Proximal View