Complete Dentures - Primary Impressions

The following flowcharts are for upper and lower complete dentures, adapt to each case accordingly

Re-confirm the consent and MH

The patient's expectations must be managed. Do not over promise and assure the patient understands the anatomical limitations and that dentures do not function in the same way as natural teeth.

Choose the correct stock tray size for the primary impression

Edentulous trays are non-perforated so that the material is pushed into the sulci.
In resorbed ridge cases, the tray may be overextended. An acrylic trimmer can be used to adjust the tray flanges accordingly.

Consider border moulding the tray flanges with greenstick (compound)

Apply the appropriate adhesive and leave for 10 minutes

Insert the tray handle

Load the tray with the chosen impression material and take the primary impression

Materials of choice include alginate, medium-body silicone or polyether.
Ensure adequate border moulding.
For lower dentures, it is paramount that the patient displaces their tongue left, right and out of the mouth so that the floor of the mouth and full depth of the lingual sulcus is encaptured. This improves denture stability.

Inspect the primary impression

Retake if unsatisfactory.
Check for:
- Full coverage of the denture bearing areas
- No encroachment of the impression material on the tongue space
- Presence of a post dam area
- Adequate flange depth
- Presence of rolled borders with no drags
- Absence of drags, voids and tears

Mark the post dam and flange extensions with an indelible pencil

Repeat for the opposing arch

Fill in the lab card and send the disinfected impressions

Information to include:
- 'Please pour up the casts and construct a special tray.'
- Construct the special tray according to the included denture design and intended master impression material of choice. Factors include: perforation, spacer (2mm for silicone, 3mm for alginate) and an intra/extra-oral handle.
- Shade
- Clinical photographs will improve communication with the laboratory.

Go to the master impression stage