

Aurum's Cristal® Veneers

Technical Instruction Guide



For striking esthetics with minimal tooth reduction, look no further than Aurum Ceramic/Classic's exclusive, ultra conservative Cristal Veneers!

**Ultra Thin –
Ultra Conservative –
Ultra Beautiful**

- All the benefits of Pressed Glass-Ceramics – With minimal preparation.
- Can be as thin as .3 mm, based on your precise preparations.
- Combination of proven thermo-pressing technology and exclusive glass-ceramic materials provides high strength and precise marginal fit.
- Our experienced and talented veneering specialists have perfected unique techniques that allow for subtle changes in customized contour, fit or shade.
- Full palette of shades available. Far more resistant to staining and colour changes compared to traditional, thin feldspathic materials.
- Adhesively bonded to tooth structure.

INDICATIONS:

- Young patients.
- Closing spaces.
- Minor tooth position improvements (correcting rotation or overlap).
- Lengthening short or worn teeth. Improving tooth shape.
- Making aged teeth look youthful.
- Correcting teeth in lingual version.
- Post orthodontic treatment.
- Shade change/Brighten shade.

CONTRAINDICATIONS:

- Overly crooked or missing teeth.
- Teeth exhibiting extreme occlusal trauma or wear.
- Teeth with insufficient coronal tooth structure (less than ½ of coronal tooth structure remains).
- Teeth that are still actively erupting.

IMPORTANT CONSIDERATIONS:

1. Patient Expectations

- The most important part of an esthetic case is the discussion with the patient beforehand as to what their esthetic goals are. Carefully note what the patient is looking for and what are his/her expectations.
- Determine if a no or minimum prep veneer achieves these goals and still provides a functional restoration. Outline the trade-offs for the patient in terms of preparation, comfort, cost, time and outcomes of the various possible treatment possibilities.
- If no or minimum prep veneers are indicated, discuss with the patient if polychromicity and incisal translucence is desired.

2. Case Design

- Ensure there is adequate centric, protrusive and lateral excursive clearance when designing case.
- Single veneers are difficult to colour match and maintain, as adjacent natural dentition will normally darken over time. If teeth are relatively similar, a single veneer without reduction will always be too prominent. Encourage patients to place minimum of multiples of 2, 4, 6, etc. veneers as a minimum.

- It is recommended to start with maxillary cases involving well-aligned natural dentition until you have gained experience with minimal and/or No Prep veneers.

3. Light Tooth Surface Adjustment

- Slight tooth rotation can be corrected with Aurum's Cristal Veneers but occasionally a very minimal preparation of the enamel surface may be needed to bring teeth into alignment.
- It is suggested to prepare bulky areas that have undercuts and to disc down mesial and distal line angles to provide a more ideal arch alignment.

4. Incisal Preparation

- Incisal reduction is not recommended unless the teeth are naturally too long.
- However, an incisal wrap is often recommended to make seating easier and to slightly lengthen teeth, unless there is no wear whatsoever.

5. Mandibular Veneers

- Some preparation may be recommended when placing mandibular restorations to allow sufficient space for veneers, especially in the incisal areas.

6. Shade Management

- Due to veneer thickness, can be difficult to mask out very dark sub-structures. If the desired shade is more than three shades lighter than existing dentition, opaquing products may be required for the natural tooth and/or the lab can opaque the veneer. In the worst case scenario, preparation of the tooth may be needed to prevent show-through.
- Bleaching before treatment may be indicated (or more opaque bonding cements used to block out dark shades). The lighter the desired shade, the more opaque the veneers must be to hide underlying tooth colour if it is very dark.
- There are a number of excellent luting resin kits available (e.g., Variolink Veneer, Choice 2, RelyX Veneer) which offer shade adjustment systems.

7. Veneer Handling

- All veneers (no matter what the thickness) must be handled carefully.
- Any finger pressure must be very light and gentle.
- Occlusal adjustments should not be made on veneers prior to bonding.
- Products such as Ivoclar Vivadent's Optra Stick placement instrument are recommended to carry veneers to placement.

8. Alternative Veneer Indications

- Careful examination and complete smile analysis always recommended to determine best preparation level and material for each case (and each tooth within a combination case situation).
- IPS Empress® Esthetic "Traditional (0.8 - 1.5 mm) Prep" veneers are indicated for patients with mildly discoloured and/or severely misaligned dentition. Availability of "cut-back" techniques allows creation of three-dimensional effect.
- Aurum's Cristal Veneers are indicated for young patients, closing spaces, minor tooth position improvements (correcting rotation or overlap), lengthening short or worn teeth, improving tooth shape, making aged teeth look youthful, correcting teeth in lingual version, post orthodontic treatment and to brighten or change shade.

LABORATORY REQUIREMENTS:

1. Thoroughly detailed prescription denoting which teeth are to be veneered as well as selected shade.
2. Clear and accurate upper and lower full arch impressions or study models.
3. Bite registration.

SHADE SELECTION:

- For basic shades, use the Chromascop or Vita Lumin Shade Guides.
- For bleached shades, use the Chromascop Bleached Shade Guide or Vita 3D Master Bleached Shade Guide.

BONDING TECHNIQUE (TO ENAMEL OR DENTIN):

Tips:

- MUST be seated adhesively (i.e., place rubber dam, apply silane — porcelain

primer to internal surface of restoration, tooth etchant, adhesive, light-cure resin, etc.).

- The more clean up of excess cement that can be accomplished prior to curing, the greater the chance you won't have to use burs and other potentially dangerous clean-up methods with very thin veneers.
- You must use light-cured bonding systems when luting veneers.
- If the natural tooth shade is within normal limits, best results achieved with translucent resin cements.
- All recommendations for the bonding systems should be followed.

1. Try in final restorations one at a time, without try-in paste initially, to evaluate fit of each unit. Once all veneers have been tried individually, try-in all veneers at once with selected shade of try-in paste as per routine (Note: use of Clear shade is normally contraindicated unless the clinician desires the shade of the underlying tooth to show through). Adjust contacts as necessary. Do not adjust occlusion at this time.
2. Place rubber dam for isolation as per standard adhesive luting techniques.
3. Ease restorations gently off of tooth surfaces with cotton pliers. Rinse internal aspects of restorations with water spray to remove try-in paste. Dry with moisture- and oil-free air.

4. Etch inner surfaces with 37% phosphoric acid for 15 seconds, thoroughly rinse with water and dry with air.

5. Restorations are supplied pre-treated in the laboratory. Apply silane — porcelain primer for 60 seconds on inner aspects of veneer and dry. Do not rinse.

6. Etch enamel (for at least 15-30 seconds) with 37% phosphoric acid etching gel.

7. Thoroughly rinse phosphoric acid with water spray.

8. Apply dry air across the surface to remove excess moisture (dentin should remain slightly moist).

9. Apply thin layer of adhesive on enamel and disperse with air.

10. Apply appropriate shade of light-cured luting resin (e.g., Variolink Veneer, Choice 2, RelyX Veneer) directly on internal restoration surfaces.

11. Place restorations onto the teeth with slow, constant gentle pressure, ensuring excess cement is visible around all the margins. Begin by placing central incisors (#8 and 9) simultaneously. Correct placement of these two veneers is crucial to overall success of final esthetic case.

12. Slightly increase pressure and maintain for several seconds. Maintain pressure and spot cure a small area for a few seconds with a "narrow beam" tip to hold restoration in place (do not light-cure any proximal or marginal areas yet).

13. Gently hold veneers in place while removing excess with spatula or brush. Ensure that excess is removed from difficult to reach areas (e.g., proximal or gingival margins).

14. Completely light cure each section for 10-30 seconds depending on curing unit used.

15. Place remaining restorations to the right (or left) of the centrals, completing one side of the case at a time. Contacts have already been adjusted at try-in so all veneers should smoothly go into place following same technique as outlined for the centrals.

FINISHING AND POLISHING TECHNIQUE:

Aurum Ceramic/Classic is pleased to offer our Finishing Bur Kit, containing all the appropriate burs and diamonds (along with a Polishing Cup) required to efficiently and effectively finish and polish your Aurum's Cristal Veneers restorations. This kit includes the following:

- Fine needle diamond
- Extra fine needle diamond
- Round-end taper diamond
- Football diamond
- Small flame bur

- Large flame bur
 - Polishing cup
1. Once all veneers completely cured, occlusion can be gently adjusted as necessary. Failure to check occlusion (and adjust if necessary) is a leading cause of fracture or chipping of veneers. However, occlusion should never be adjusted until all veneers are firmly bonded.
 2. Use the Small flame bur for clean up of excess cured cement from interproximals and along the margins
 3. Remove the porcelain ledge with Round-end taper diamond.
 4. Adjust and polish the margins of the veneer with the Extra fine needle diamond.
 5. Adjust the margins in the interproximals using the Fine needle diamond.
 6. Using your explorer, check the natural tooth structure around the veneer to ensure there are no catches or bumps. If detected, use the Fine needle diamond to re-polish.
 7. Check the bite. Make any needed adjustments to high spots or length with the Football diamond. Use the same diamond to complete the incisal wrap as indicated.
 8. Employing finishing strips (e.g., 3M), separate the teeth. You may choose to employ a wooden wedge interproximally, depending on the clinical situation. Use your preferred finish-

ing system in sequence to smooth interproximals. Remove the wooden wedge, if employed. Continue to smooth the interproximals to final contour. Check interproximals with dental floss and continue to smooth if needed.

9. Finish and polish margins with Polishing Cup and paste (e.g., Ivoclar Optrafine Diamond Polishing System).

BONDING AURUM'S CRISTAL VENEERS TO PORCELAIN SURFACES:

Aurum Ceramic/Classic is pleased to offer our Bonding Kit, containing all the materials (tooth etchant, porcelain primer, adhesive and luting composites in a variety of shades) required to efficiently and effectively bond your Aurum's Cristal Veneers restorations to porcelain surfaces.

1. Check veneers for fit and interproximal contacts. Try-in dry for fit and utilize try-in paste to check shade. NOTE: Patient should not close on restorations.
2. Remove veneers. Clean internal surface of veneers and indicated surface of existing porcelain restorations with 37% hydrofluoric acid. Thoroughly rinse with water.
3. Apply silane — porcelain primer to inner aspects of veneer and surface of existing porcelain restorations and let dry. Do not rinse.
4. Apply a thin layer of adhesive on the internal surface of veneers and indicated surface of existing porcelain

restorations for 20 seconds. Avoid pooling of "Adhesive". Gently air dry both surfaces for 5 seconds each, achieving a "tacky" consistency (i.e., surfaces should still appear glossy). Light cure both surfaces for 5 seconds.

5. Fill internal surface of first veneer with appropriate shade of light cure "Luting Composite".
6. Place veneer onto the porcelain restoration surface with slow, constant gentle pressure, seating firmly apically and gingivally.
7. Place remaining veneers following the same technique.
8. Maintain pressure and spot cure a small area on each veneers for a few seconds with a "narrow beam" tip to hold restorations in place (do not light-cure any proximal or marginal areas yet).
9. Gently hold veneers in place while removing excess with spatula or brush. Ensure that excess is removed from difficult to reach areas (e.g., proximal or gingival margins).
10. Completely light cure each section (from lingual, facial, incisal) of veneers for 10-30 seconds depending on curing unit used.
11. Once all veneers have been completely cured, finish margins as per the Cristal Veneers Finishing and Polishing Technique outlined earlier in this Guide.



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