ALL-BOND UNIVERSAL®

Light-Cured Dental Adhesive

Instructions for Use
BISCO’s ALL-BOND UNIVERSAL® is a light-cured single-component dental bonding agent that combines etching, priming and bonding in one bottle. ALL-BOND UNIVERSAL® is an ethanol/water-based dental adhesive which bonds to dentin and cut and un-cut enamel. As a universal adhesive, ALL-BOND UNIVERSAL® has been designed to be fully compatible with light-cured, self-cured and dual-cured composite materials. ALL-BOND UNIVERSAL® can be used for the bonding of both direct and indirect restorations. ALL-BOND UNIVERSAL® may be used with or without phosphoric acid etchant.

Indications for Use:
ALL-BOND UNIVERSAL® Adhesive is used for:
1. ALL Direct Restorations (resin-based composite, resin-modified glass ionomers, core build-ups, etc.)
2. ALL Indirect Restorations (metal, glass ceramics, zirconia/alumina, etc.)
3. Desensitization/Sealing of Tooth
4. Intraoral Repair (chipped porcelain, additions to direct restorations, etc.)
5. Protective Varnish for Glass Ionomer Based Fillings
6. Orthodontic Bonding
7. Endodontic Post Bonding

Contraindications:
• Patients who have a history of severe allergic reactions to methacrylate resins.

Warnings:
• Avoid splashing into the eyes. If ALL-BOND UNIVERSAL® comes into contact with the eyes, flush with copious amounts of water and seek medical attention.
• The phosphoric acid in the etchant is a severe eye and skin irritant. Injury may result if the etchant is allowed to remain on the skin or mucosa for extended periods of time. If accidentally splashed into the eye, flush with copious amounts of water and seek medical attention immediately. In case of contact with other tissues, rinse immediately with plenty of water for several minutes.
• When using dental adhesives, saliva contamination will compromise dentin bonding and may result in decreased longevity of the restoration. A rubber dam is recommended for all direct restorations and other indications where contamination may be possible.
• Highly Flammable

Cautions:
• Cross-contamination: Product may contain items that are designed for one time use. Dispose of used or contaminated accessories. Do not clean, disinfect or reuse.

Precautions:
• ALL-BOND UNIVERSAL® is a light-curable material. Use ALL-BOND UNIVERSAL® immediately once it is dispensed in the mixing well. Prolonged exposure to air and light may lead to solvent evaporation and thickening of the adhesive.
• To avoid evaporation of ALL-BOND UNIVERSAL®, keep container tightly closed.
• Avoid contact with the skin; unpolymerized (meth)acrylate resins may cause skin sensitization in susceptible persons. In case of contact, wash skin with soap and water.
• If ZOE containing materials have been used on the tooth structure within 2-3 weeks, adequately clean the tooth surface with an abrasive prior to adhesive use.
• The emitting tip of the dental curing light should be held as near and vertical to the resin surface as possible. If a large resin surface is to be light-cured, it is advisable to divide the area into several sections and light cure each section separately.
• Low curing light intensity causes poor adhesion.
• See individual component labels for specific expiration dates.
• Safety data sheet available on request.

INSTRUCTIONS FOR USE
1. Direct Restorations
   SELF-ETCHING TECHNIQUE: Prepare cavity. Wash thoroughly with water spray. Use an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, to remove excess water (do not desiccate). 
   NOTE: BISCO’S SELECT HV® ETCH may be used on cut or uncut enamel to increase mechanical retention. This etchant was designed for precise selective placement.
   TOTAL-ETCHING TECHNIQUE: Prepare cavity. Wash thoroughly with water spray. Etch enamel and dentin using an etchant for 15 seconds. Rinse thoroughly. Remove excess water by blotting the surface with an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, leaving the preparation visibly moist.
   1. Dispense 1-2 drops of ALL-BOND UNIVERSAL® into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of solvent.  
   2. Apply two separate coats of ALL-BOND UNIVERSAL®, scrubbing the preparation with a microbrush for 10-15 seconds per coat. Do not light cure between coats.
   3. Evaporate excess solvent by thoroughly air-drying with an air syringe for at least 10 seconds, there should be no visible movement of the adhesive. The surface should have a uniform glossy appearance; otherwise, apply an additional coat of ALL-BOND UNIVERSAL® and repeat Steps 2 and 3.
   4. Light cure for 10 seconds.
   5. Continue with placement of the restorative material according to the manufacturer’s instructions.
2. Indirect Restorations
   Tooth Preparation:
   SELF-ETCHING TECHNIQUE: Prepare cavity. Wash thoroughly with water spray. Use an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, to remove excess water (do not desiccate).
   NOTE: BISCO’S SELECT HV ETCH may be used on cut or uncut enamel to increase mechanical retention. This etchant was designed for precise selective placement.
   TOTAL-ETCHING TECHNIQUE: Prepare cavity. Wash thoroughly with water spray. Etch enamel and dentin using an etchant for 15 seconds. Rinse thoroughly. Remove excess water by blotting the surface with an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, leaving the preparation visibly moist.
1. Dispense 1-2 drops of ALL-BOND UNIVERSAL into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of solvent.
2. Apply two separate coats of ALL-BOND UNIVERSAL, scrubbing the preparation with a microbrush for 10-15 seconds per coat. Do not light cure between coats.
3. Evaporate excess solvent by thoroughly air-drying with an air syringe for at least 10 seconds, there should be no visible movement of the adhesive. The surface should have a uniform glossy appearance; otherwise, apply an additional coat of ALL-BOND UNIVERSAL and repeat Steps 2 and 3.

**NOTE:** Due to the amount of solvent, ALL-BOND UNIVERSAL is easily spread thin and will NOT affect cementation procedures, even with tight fitting restorations.

4. Light cure for 10 seconds.
5. Continue with cementation.

**NOTE:** ALL-BOND UNIVERSAL has been designed for optimal bond strengths with BISCO’s dual-cured and self-cured composites and cements.

**Priming of Metal, Zirconia, Alumina, Composite and Post Restorations:**
1. Prepare the surface of the restoration according to instructions provided by the laboratory or the manufacturer. (e.g. particle abrasion)

**NOTE:** Do not clean surfaces with phosphoric acid before application of adhesive.
2. Apply 1 coat of ALL-BOND UNIVERSAL and air dry to remove excess solvent. Light cure for 10 seconds.

**NOTE:** It is recommended to light cure ALL-BOND UNIVERSAL for optimum strength and durability. If light curing is not desired, use Z-PRIME™ Plus instead.

**Priming of Porcelain (silica-based) or Lithium Disilicate Restorations:**
1. Since different ceramics require different surface treatments, contact the laboratory or manufacturer for proper internal surface treatment instructions.
2. Apply 1 coat of ALL-BOND UNIVERSAL and air dry to remove excess solvent. Light cure for 10 seconds.

**NOTE:** It is recommended to light cure ALL-BOND UNIVERSAL for optimum strength and durability. If light curing is not desired, use a silane instead such as BISCO’s PORCELAIN PRIMER*. BISCO’s research shows silane maintains bond durability, maximizing longevity to glass ceramics. For porcelain veneers it is strongly recommended to use BISCO’s PORCELAIN PRIMER.

**3. Desensitization/Sealing of Tooth**

**a.) Prepared tooth surface**

**SELF-ETCHING TECHNIQUE:** Prepare cavity. Wash thoroughly with water spray. Use an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, to remove excess water (do not desiccate).

**TOTAL-ETCHING TECHNIQUE:** Prepare cavity. Wash thoroughly with water spray. Etch enamel and dentin using an etchant for 15 seconds. Rinse thoroughly. Remove excess water by blotting the surface with an absorbent pellet or high volume evacuation (HVE) for 1-2 seconds, leaving the preparation visibly moist.

1. Dispense 1-2 drops of ALL-BOND UNIVERSAL into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of the solvent.
2. Apply two separate coats of ALL-BOND UNIVERSAL, scrubbing the preparation with a microbrush for 10-15 seconds per coat. Do not light cure between coats.
3. Evaporate excess solvent by thoroughly air-drying with an air syringe for at least 10 seconds, there should be no visible movement of the adhesive. The surface should have a uniform glossy appearance; otherwise, apply an additional coat of ALL-BOND UNIVERSAL and repeat Steps 2-3.
4. Light cure for 10 seconds.
5. Continue with provisionalization procedure. It is recommended to coat the preparation with a water-based lubricant such as PRO-V COAT and repeat prior to application of the provisional material, such as PRO-V FILL™.

**b.) Uncut tooth surface**

1. Clean root surface/uncut tooth by scrubbing with BISCO’s CAVITY CLEANSER™ and pumice or BISCO’s CAVITY CLEANSER on an absorbent pellet.
2. Rinse with warm water and blot dry with an absorbent pellet.
3. Dispense 1-2 drops of ALL-BOND UNIVERSAL into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of the solvent.
4. Apply two separate consecutive coats of ALL-BOND UNIVERSAL, scrubbing the preparation with a microbrush for 10-15 seconds per coat. Do not light cure between coats.

**Helpful Hint:** The “cold” from the initial application will often cause a mild response from the patient. However, ALL-BOND UNIVERSAL immediately permeates and seals the dentinal tubules, eliminating sensitivity.

5. Evaporate excess solvent by thoroughly air-drying with an air syringe for at least 10 seconds; there should be no visible movement of the adhesive. The surface should have a uniform glossy appearance; otherwise, apply an additional coat of ALL-BOND UNIVERSAL and repeat Steps 4 and 5.
6. Light cure for 10 seconds.
7. Remove the oxygen-inhibited layer with an alcohol-moistened cotton pellet or gauze.

**4. Intraoral Repairs**

1. Roughen any surface that will be bonded. Rinse and air dry.
2. Any porcelain or lithium disilicate surfaces present should be treated with hydrofluoric acid for the specified time and handled according to the manufacturer’s instructions. Apply a silane primer (e.g. PORCELAIN PRIMER) for optimum bond strength and durability of the interface.

**NOTE:** Z-PRIME Plus may be used on exposed metal and zirconia surfaces prior to application of ALL-BOND UNIVERSAL.
3. Dispense 1-2 drops of ALL-BOND UNIVERSAL into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of solvent.
4. Apply 1 coat of ALL-BOND UNIVERSAL to the repair site and air dry to remove excess solvent. Light cure for 10 seconds.
5. If Metal Masking is desired BISCO’s DUAL-CURED OPAQUER™ may be used to successfully mask the dark metal hue without influencing the subsequent shade of restorative materials.
6. Proceed with composite layering and finishing.

**5. Protective Varnish for Glass Ionomer Fillings**

ALL-BOND UNIVERSAL protects glass ionomer based cement/restorative surface against humidity, drying, and saliva contamination immediately after placing the restorations.

**Tooth Preparation:**
1. Place glass ionomer based cement/restorative according to the manufacturer’s instruction.
2. Dispense 1-2 drops of ALL-BOND UNIVERSAL into a clean well. Replace the cap onto the bottle promptly to avoid evaporation of solvent.
3. Apply two separate coats of ALL-BOND UNIVERSAL, scrubbing the preparation with a microbrush for 10-15 seconds per coat. Do not light cure between coats.
4. Evaporate excess solvent by thoroughly air-drying with an air syringe for at least 10 seconds, there should be no visible movement of the adhesive.
5. Light cure for 10 seconds.
6. Remove the oxygen-inhibited layer with an alcohol-moistened cotton pellet or gauze.

6. Orthodontic Bonding
1. Prophy teeth with an oil-free pumice or paste. Rinse with water. Isolate teeth.
2. Etch enamel using an etchant, such as SELECT HV ETCH or ETCH-37™ for 15-30 seconds. The area required to be etched is only slightly larger than the orthodontic appliance base. Rinse well with water and air dry.
3. Dispense ALL-BOND UNIVERSAL into a clean well. Place the cap onto the bottle promptly.
4. Paint a small amount of ALL-BOND UNIVERSAL on bracket bases and air dry.
5. Scrub ALL-BOND UNIVERSAL on all teeth and crowns that will receive brackets.
6. Remove excess solvent by gently air-drying with an air syringe for at least 5 seconds until there is no visible movement of the material.
7. Light cure for 10 seconds.
8. Continue with placement of the orthodontic appliance according to the manufacturer’s instructions.
To remove, use a ligature cutter to grab the adhesive at the enamel adhesive interface and pop the bracket from the tooth. Residual adhesive can be removed with a bur. The enamel can be polished.

7. Endodontic Post Bonding
1. Prepare post space according to post manufacturer’s instructions.
2. OPTIONAL: Etch post space for 15 seconds. Rinse thoroughly.
3. Remove excess water with a brief burst of air. Using a paper point, remove any pooled water from the post space.
4. Scrub 2 coats of ALL-BOND UNIVERSAL into the canal.
5. Blot the canal dry with a paper point; repeat with a new paper point until the paper point returns dry from the canal. This step is important to make sure that there is no interference in complete seating of endodontic post.
6. Dry thoroughly for approximately 10 seconds to remove excess solvent.
7. Light cure directly over the canal for 20 seconds.
8. Coat the post with ALL-BOND UNIVERSAL, air dry and light cure for 10 seconds.
9. Proceed with cementation according to cement manufacturer’s instructions.

DISPOSAL: Refer to community provisions relating to waste. In their absence, refer to national or regional provisions relating to waste.

STORAGE: (2°C/36°F - 25°C/77°F).

WARRANTY: BISCO, Inc. recognizes its responsibility to replace products if proven to be defective. BISCO, Inc. does not accept liability for any damages or loss, either direct or consequential, stemming from the use of or inability to use the products as described. Before using, it is the responsibility of the user to determine the suitability of the product for its intended use. The user assumes all risk and liability in connection therewith.

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