

# COSMETICS



# RESTORATIVES

**DiaDent**<sup>®</sup>

DiaDent Group International  
www.diadent.com | 1.877.342.3368

## FEATURES & BENEFITS

**DiaFil™** is a light-cured nanohybrid composite. Utilizing the latest in nanoparticle technology, DiaFil maximizes the advantages of both the esthetic of microfilled composite and the strength and durability of hybrid composites. It creates a beautiful and durable restoration that maintains a long-lasting gloss shine.

### Excellent Handling

- Easy to place and does not slump
- Does not stick to instruments
- Marginal adaptation: adapts well to margins and easy to sculpt

### Fast Polymerization Time

- DiaFil can be polymerized in only 20 seconds

### Outstanding Versatility

- DiaFil can be used for both anterior and posterior restorations

### Superior Physical Properties- Wear & High Fracture Resistance

- Unique fillers reduce polymerization shrinkage for less post-operative sensitivity and secondary cavities due to marginal leakage
- Excellent fracture toughness, high tensile, compressive strength for long-lasting results

### Highly Esthetics

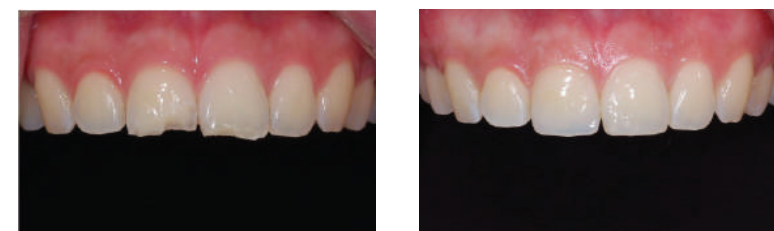
- Optimal translucency, opalescence, and fluorescence with remarkable color stability
- Available in 12 shades matching with tooth structure to make it easy to finish and polish

### High Level of Radiopacity

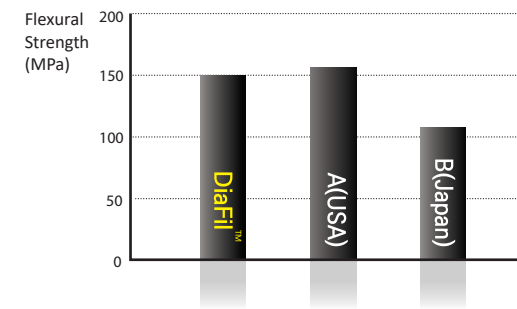
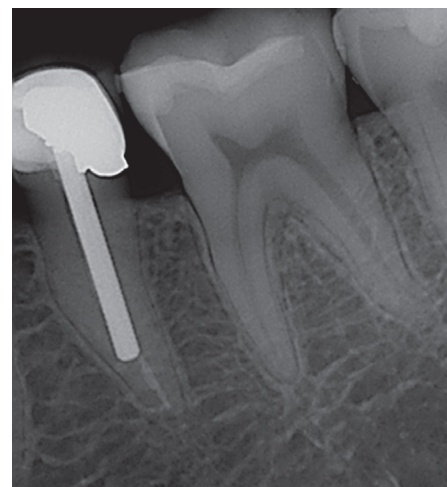
- Posterior Restoration



- Anterior Restoration

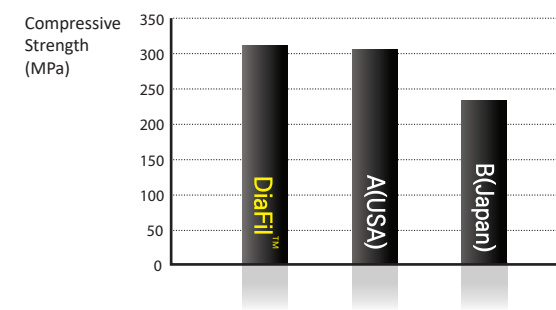
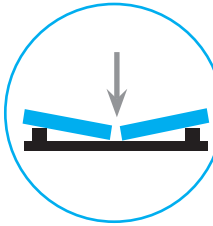


- Excellent Radiopacity



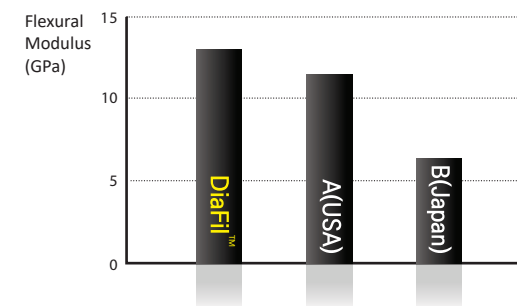
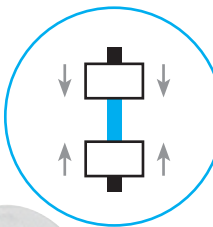
### Flexural Strength

The flexural strength of a material is defined as its ability to resist deformation and breakage under load. Flexural strength is the value obtained when the material breaks. This test combines the forces found in compression and tension. DiaFil shows a high level of flexural strength.



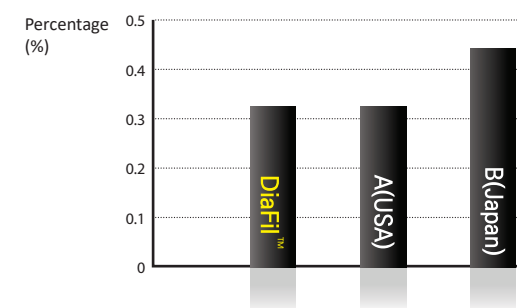
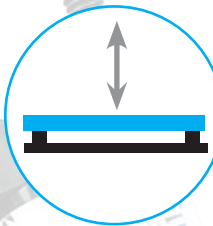
### Compressive Strength

Compressive strength is especially important because it is related to masticating forces. Simultaneous forces are applied to the opposite ends of the sample length vertically until the sample fractures or is deformed. The material failure is a result of shear and tensile forces. DiaFil's compressive strength is statistically higher than the other 2 brands.



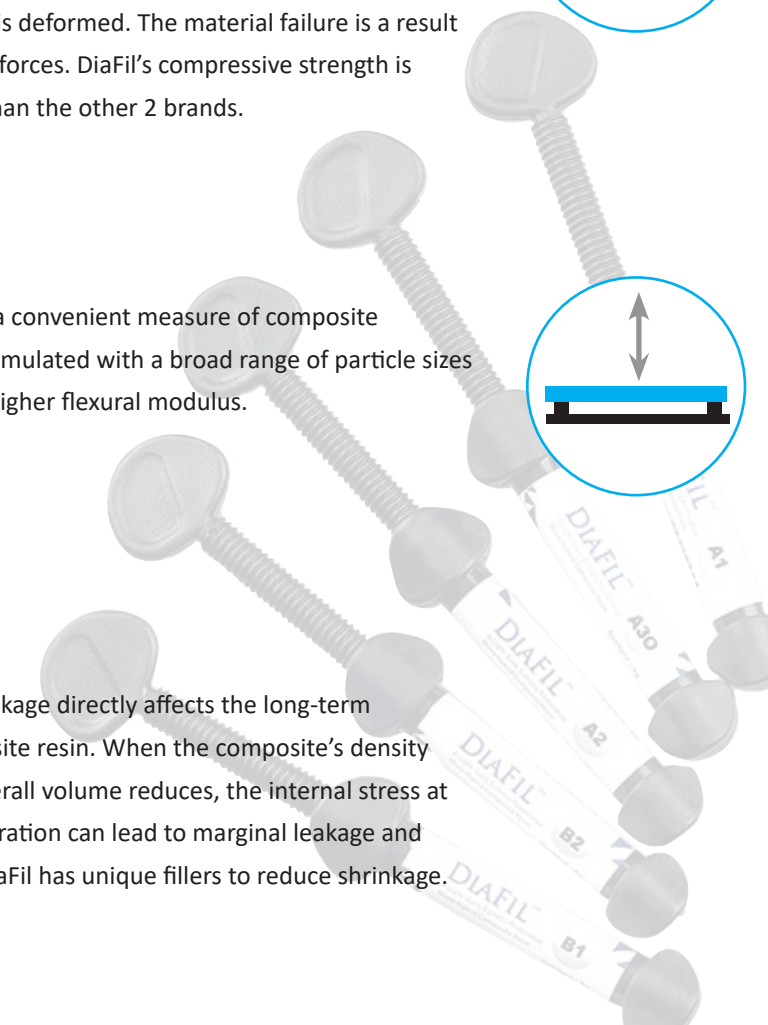
### Flexural Modulus

Flexural modulus is a convenient measure of composite stiffness. DiaFil is formulated with a broad range of particle sizes which results in its higher flexural modulus.

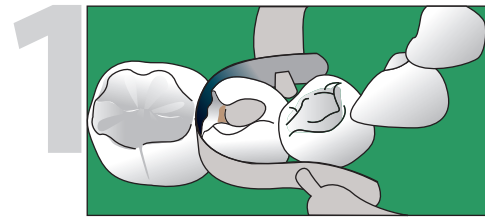


### Shrinkage

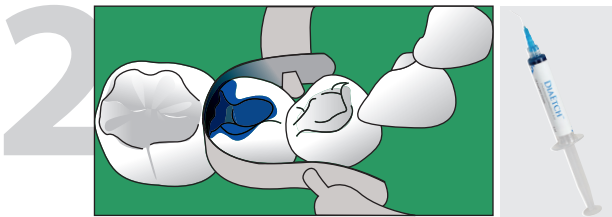
Polymerization shrinkage directly affects the long-term stability of a composite resin. When the composite's density changes and the overall volume reduces, the internal stress at the margins of restoration can lead to marginal leakage and secondary caries. DiaFil has unique fillers to reduce shrinkage.



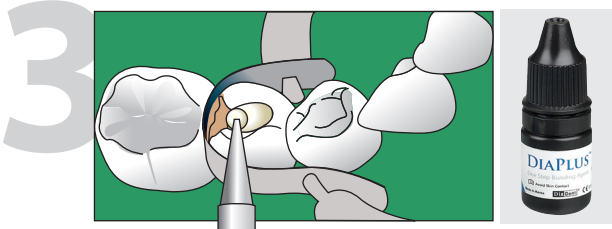
## TECHNIQUE GUIDE



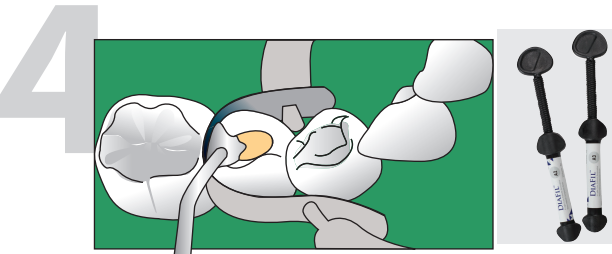
1. Prepare the tooth: Isolate the tooth with rubber dam and clean the tooth.



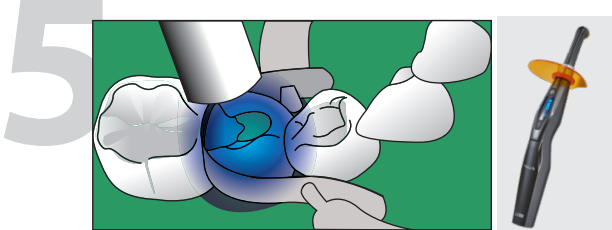
2. Etch: Apply DiaEtch™ (etching gel) to enamel and dentin and wait for 15 seconds. Rinse and blot the excess water, leaving the tooth moist.



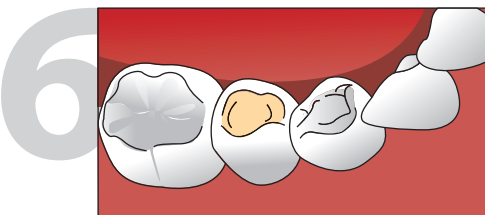
3. Bond: Apply 3 consecutive coats of DiaPlus™ (bonding agent) to enamel and dentin and wait for 15 seconds. Dry gently for 3 seconds and light cure for 20 seconds.



4. Place DiaFil™ in thin layers less than 2.0 mm.



5. Light cure each layer for 20 seconds.



6. Finish and Polish.

## ORDER INFORMATION

### • SYRINGE REFILL (1 x 4g)

A1	A2001-1201
A2	A2001-1202
A3	A2001-1203
A3.5	A2001-1204
A4	A2001-1205
B1	A2001-1206
B2	A2001-1207
B3	A2001-1208
C2	A2001-1210
C3	A2001-1211
A20	A2001-1212
A30	A2001-1213

### • CAPSULE REFILL (20 x 0.25g)

A1	A2001-1405
A2	A2001-1401
A3	A2001-1402
A3.5	A2001-1403
B2	A2001-1404

### • ACCESSORIES

20 x disposable tips (DiaEtch)	A2001-6103
100 x disposable tips (DiaEtch)	A2001-6109
100 x brush tips (DiaPlus)	A2001-6104
1 x brush handle	A2001-6105
Mixing pad	A2001-6106
Mixing well	A2001-6107





# DIAFIL™ FLOW

Light-Cured Flowable Composite

## FEATURES & BENEFITS

### Perfect Adaptation and Handling

- Easy handling with no slump and run
- Excellent flow and optimal viscosity: easy and convenient placement

### Multiple Indications for Use

- Restorations of minimally invasive cavity preparations
  - Class III, V, and shallow class IV
  - Air abrasion preparations
  - Tunnel restorations
- Base/liner under posterior restorations in Class I, II
- Repair of small defects in esthetic indirect restorations
  - Composite
  - Ceramic
- Undercut blackout
- Pit and fissure sealing
- Repair of acrylic temporary materials

### Excellent Color Adaptability

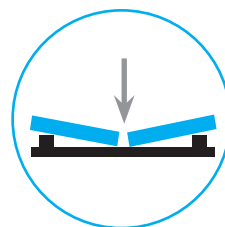
- 9 beautiful shades that provide natural esthetics and high-gloss polishability

### High tensile strength, Low Shrinkage, and Highly Radiopaque

- Unique fillers reduce polymerization shrinkage for less post-operative sensitivity and secondary cavities due to marginal leakage
- Excellent fracture toughness, high tensile, compressive strengths for long-lasting results

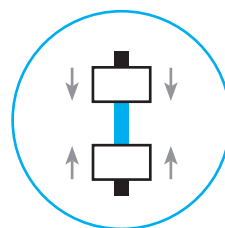
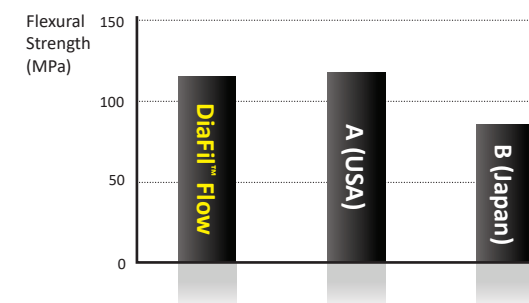


### • RESTORATION USING DIAFIL FLOW



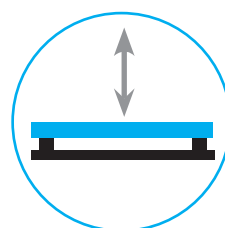
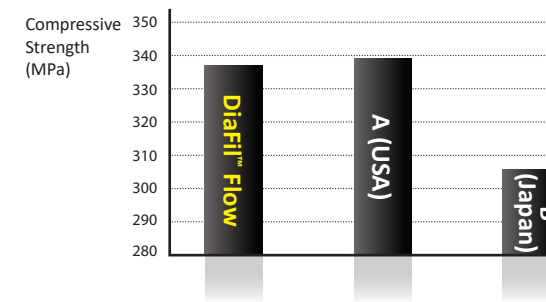
### Flexural Strength

The flexural strength of a material is defined as its ability to resist deformation and breakage under load. Flexural strength is the value obtained when the material breaks. This test combines the forces found in compression and tension. DiaFil Flow shows a high level of flexural strength.



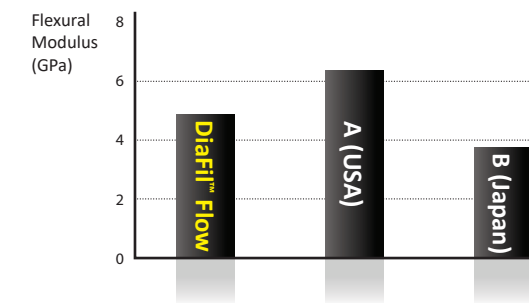
### Compressive Strength

Compressive strength is especially important because it is related to masticating forces. Simultaneous forces are applied to the opposite ends of the sample length vertically until the sample fractures or is deformed. The material failure is a result of shear and tensile forces. DiaFil Flow has a very strong compressive strength.



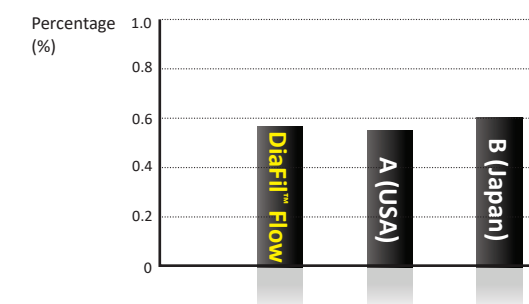
### Flexural Modulus

Flexural modulus is a method to measure a material's stiffness. A low modulus indicates the material is highly flexible.



### Shrinkage

Polymerization shrinkage directly affects the long-term stability of a composite resin. When the composite's density changes and the overall volume reduces, the internal stress at the margins of restoration can lead to marginal leakage and secondary caries. DiaFil Flow has unique fillers to reduce shrinkage.

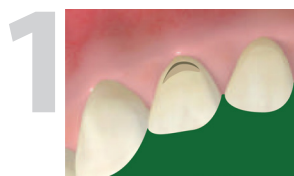


# DIAFIL™ FLOW

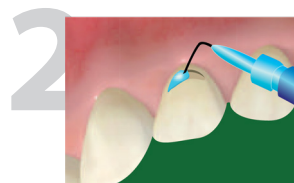
Light-Cured Flowable Composite

## TECHNIQUE GUIDE

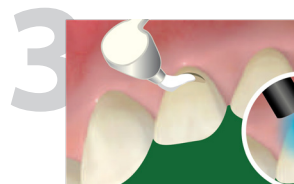
### • DIRECT RESTORATIONS



1. Prepare the tooth: Isolate the tooth and remove caries.



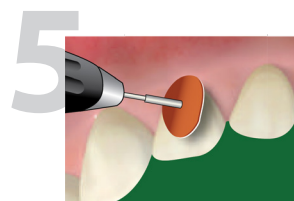
2. Etch: Apply DiaEtch™ (etching gel) to enamel and dentin and wait for 15 seconds. Rinse and blot the excess water, leaving the tooth moist.



3. Bond: Apply DiaPlus™ (bonding agent) to enamel and dentin and wait for 15 seconds. Dry gently for 3 seconds and light cure for 20 seconds.

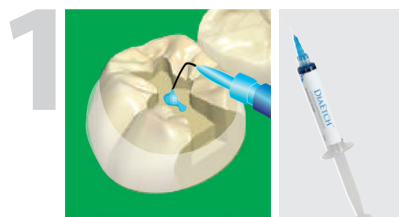


4. Place DiaFil™ Flow in thin layers less than 2.0 mm and cure each layer for 20 seconds.



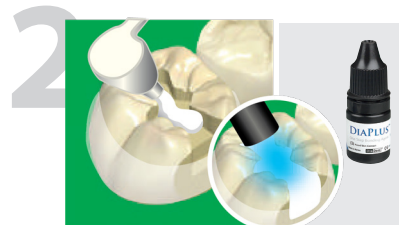
5. Finish and polish.

### • BASE/LINER DIRECT POSTERIOR RESTORATIONS

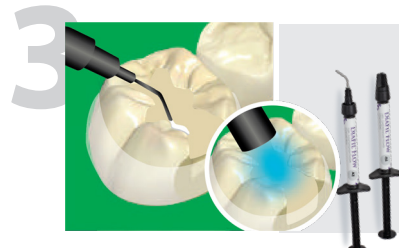


1. Prepare the tooth: Isolate the tooth and remove caries.

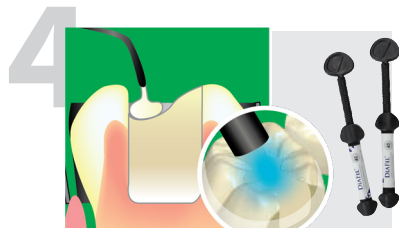
Etch: Apply DiaEtch™ (etching gel) to enamel and dentin and wait for 15 seconds. Rinse and blot the excess water, leaving the tooth moist.



2. Bond: Apply DiaPlus™ (bonding agent) to enamel and dentin and wait for 15 seconds. Dry gently for 3 seconds and light cure for 20 seconds.



3. Place DiaFil™ Flow in thin layers less than 2.0 mm and cure each layer for 20 seconds.



4. Place DiaFil™ in layers and light cure each layer for 20 seconds.



5. Finish and polish.

## ORDER INFORMATION

### • ECONO PACKAGE

- 4 x 2g flowable syringes
- 40 disposable tips (black)
- Shade guide

A1	A2001-4101
A2	A2001-4102
A3	A2001-4103
A3.5	A2001-4104
B2	A2001-4105
B3	A2001-4106
C2	A2001-4107
A20	A2001-4108
A30	A2001-4109

### • REFILL PACKAGE

- 1 x 2g flowable syringe
- 10 disposable tips (black)

A1	A2001-4201
A2	A2001-4202
A3	A2001-4203
A3.5	A2001-4204
B2	A2001-4205
B3	A2001-4206
C2	A2001-4207
A20	A2001-4208
A30	A2001-4209

### • ACCESSORIES

20 x disposable tips (DiaFil Flow)	A2001-6102
100 x disposable tips (DiaFil Flow)	A2001-6108





# DIAETCH™

37% Phosphoric Acid Etching Gel

## FEATURES & BENEFITS

- Quick and precise application with small gauge (25 gauge) pre-bent tip
- 15-second etch
- Excellent biocompatibility
- Ideal consistency and material thickness
- Washes off easily without any residue for predictable adhesion
- Beautiful blue color can be easily differentiated from the tooth

### #A2001-3101 Econo Package

Contains: 5 syringes of 5 ml and 20 disposable tips

### #A2001-3103 Regular Package

Contains: 2 syringes of 3 ml and 10 disposable tips

### #A2001-3202 Refill Package

Contains: 1 syringe of 5 ml and 5 disposable tips



# DIAPLUS™

5th Generation Bonding Agent

## FEATURES & BENEFITS

- Optimizes the enamel etching procedure in conjunction with all light-curing restorative materials
- Designed for both direct and indirect applications (enamel, dentin, porcelain, ceramics, amalgam, etc.)
- Low film thickness prevents adhesive show-through and creates a beautiful final restoration
- Ethanol-based bonding agent: exceptional bond strength
- Compatible with dual- and self-cure composites and core materials

### #A2001-2101 DiaPlus Bonding Agent

Contains: 1 x 5ml bottle



# DIA-X BOND™

Universal Bonding Agent

## FEATURES & BENEFITS

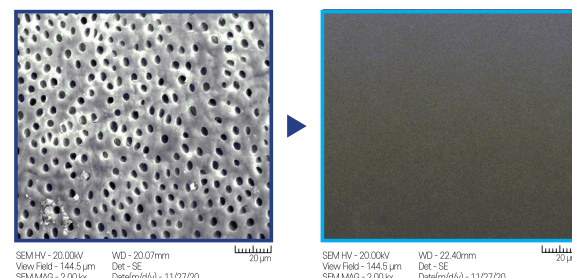
- Exceptional handling properties
- Convenient one-hand flip bottle top
- Saves chair time: true one-bottle bond
- Simple: for all etching techniques
- Versatile: for all direct and indirect restorations
- Uncompromising bond strength
- Low 2-micron film thickness
- Virtually no post-op sensitivity
- Long shelf life and stable in room temperature
- Advanced 10-MDP Monomer: both hydrophilic hydrophobic to improve adhesion strength and bond stability

### #A2001-2201 Dia-X Bond Universal Bonding Agent

Contains: 1 x 5ml bottle

**Universal**

SEM shows Dia-X Bond Universal's desensitization effectiveness by completely occluding the dentin tubules.

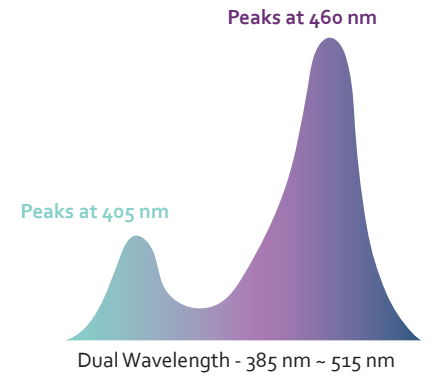


# D.LUX+

Cordless Dual-Wavelength LED Curing Light

## FEATURES & BENEFITS

- High intensity output of **2,400 mW/cm<sup>2</sup>** and **10W LED**
- **360° swivel light probe** and silicone ring tip ensure patient comfort
- Broadband spectrum of **385nm~515nm**
- Dual-wavelength with **4 LED lamps** can efficiently polymerize all dental materials
- **Wireless inductive charging system** eliminates any potential charging contact problems
- High capacity **2,600 mAh Li-ion battery** offers longer battery life and power intensity stability
- Designed ergonomically, the handpiece is light and elegant so it can easily reach all curing sites offering maximum comfort for both patient and clinician
- Designed for comfort, the light probe has an **optimal 10° angle** to reach all tooth surface even posterior area
- **Built-in Light Intensity Measurement Sensor** provides peace of mind so clinicians can always verify if the intensity is within normal range
- **5 versatile curing modes** allow flexible curing time and power intensity including **1-second curing** and **Orthodontic curing mode**:



1. **STD (Standard)**: 900 mW/cm<sup>2</sup> (±10%) light intensity for 5, 10, 15, or 20 seconds
  2. **SFT (Soft start)**: Light intensity gradually increases to 1,300 mW/cm<sup>2</sup> (±10%) for 10 or 15 seconds
  3. **HIG (High Power)**: 1,300 mW/cm<sup>2</sup> (±10%) light intensity for 5, 10, or 15 seconds
  4. **ORT (Orthodontic)**: 1,800 mW/cm<sup>2</sup> (±10%) light intensity for 3, 4, 5 seconds or P [pulse]
- \* **ORT P (Pulse)** mode: light turns on for 2 seconds and then off for 1 second eight times
5. **MAX (Max Power)**: 2,400 mW/cm<sup>2</sup> (±10%) light intensity for 1, 2, or 3 seconds

## ORDER INFORMATION

### #4008-1001 D-Lux+ Regular Kit

Contains: handpiece (with battery pack) & charger, light probe, light protector, disposable sheaths (200/box), power supply/adaptor, power cord

## Accessories

- #4008-1110 Handpiece
- #4008-1120 Charger
- #4008-1130 Light Probe
- #4008-1140 Battery Pack
- #4008-1150 Light Protector
- #4008-1160 Power Supply (Adapter)
- #4008-1161 Power Cord
- #4008-1170 Disposable Sheaths (200/Box)





## **DiaDent Network**

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### **DiaDent Group International (Korea & International )**

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