

# 6 Reasons to Consider **ACTIVA Presto** as Your Composite 'One-Syringe' Solution



**I**n the crowded composite market, what makes a new material stand out from the rest? Pulpdent recently launched ACTIVA™ Presto™, their next-generation universal composite. The versatile light-cure material offers stackable yet flowable handling, durability without sacrificing esthetics, and the full range of cavity class indications—all in a composite formulated to mimic the look, feel, function, and properties of a patient's teeth.

Dr. Howard S. Glazer describes the new ACTIVA Presto as a “one-syringe solution” for composite restoration. He notes the

new material builds on the success of ACTIVA BioACTIVE-RESTORATIVE while offering improved esthetics and easier dispensing and placement. Dr. Glazer is a frequent lecturer and author on the topics of dental materials, cosmetic dentistry, forensic dentistry, and patient management. He maintains a family and esthetic dentistry practice in Fort Lee, N.J.

We spoke with Dr. Glazer about his experience in evaluating ACTIVA Presto, as well as what to look for in a versatile dental composite. Here are the qualities he said are most valuable in these materials.

## 1. Restores oral health in a way that mimics nature

ACTIVA Presto supports the slow, natural biomineralization process of teeth through the release of calcium, phosphate, and fluoride, according to Pulpdent. In this way, ACTIVA Presto mimics the natural processes that restore and maintain oral health.

“Biomimicry is an accurate term to describe ACTIVA Presto, because it’s restoring what nature has lost,” notes Dr. Glazer, adding that Pulpdent’s ACTIVA brand was the first to bring the concept of biomimicry to the forefront. “By biomimicry, we mean that it’s helping to restore the health of the tooth by replacing the vital calcium and phosphate ions that are lost in the decay process. Fluoride, as we know, is readily available in the ion pool in saliva, and it draws from that as well.”

ACTIVA Presto is formulated with an active “moisture-friendly” ionic resin. This patented resin (Embrace™ WetBond™) interacts with saliva and the tooth structure to facilitate the exchange of calcium, phosphate, and fluoride ions.

In addition to these properties, ACTIVA Presto contains no Bisphenol A, no Bis-GMA and no BPA derivatives. “We have very savvy dental consumers,” noted Dr. Glazer. “Patients want natural, BPA-free materials. ACTIVA Presto is a good, clean material.”

## 2. Is easily dispensed, handled, and placed

One of the ways in which ACTIVA Presto differs from ACTIVA BioACTIVE-RESTORATIVE is that it is dispensed through a syringe versus a dispensing gun.

“[ACTIVA Presto] is comparable in hardness, wear, and fracture resistance to a packable, but is stackable and easily layered,” he says.

According to Dr. Glazer, this combination of stackability and injectability makes ACTIVA Presto an efficient option for composite restoration—the “one-syringe solution” that he describes. Of the “no-flow flowables”, as he refers to close competitors, Dr. Glazer considers ACTIVA Presto to be the most stackable of the available options.

The material does not slump and holds its shape prior to light curing, according to Pulpdent. ACTIVA Presto’s depth of light cure is 2.6 mm, with a recommended curing time of  $20 \pm 2$  seconds. It is dispensed in 1.2 mL/2 gm syringes that come with 20 applicator tips.

## 3. Resists wear, fracture, and chipping

Another way in which ACTIVA Presto mimics nature is in its shock-absorbing properties, which are comparable to that of natural dentin. Pulpdent uses its

patented “rubberized resin” technology from their Tuff-Temp™ Plus provisional material in their ACTIVA BioACTIVE products and now in ACTIVA Presto.

“It flexes like dentin and therefore is fracture resistant. It’s a brilliant chemistry. Plain and simple, it works,” says Dr. Glazer.

The rubberized resin chemistry is designed for strength and dimensional stability for enhanced restoration fits and reduced incidence of debonding or breakage. ACTIVA Presto offers compressive strength of 314 MPa  $\pm$  8 MPa and diametral tensile strength at 53 MPa  $\pm$  2 MPa. Deflection at break is 0.8 mm. Its dentin-like resilience resists wear and fracture, even in thin areas on beveled margins, according to Pulpdent.

“Fracture resistance is important because we generally spread these resins onto beveled margins where they can become very thin. That’s usually our Achilles Heel and when the chipping and fracturing occurs,” says Dr. Glazer. “Because of Pulpdent’s rubberized urethane technology, ACTIVA Presto can withstand those forces, which makes their material relatively fracture resistant.”

The versatility of ACTIVA Presto is further demonstrated by the fact that it works equally well as a dentin or enamel replacement material. While its strength, wear resistance, and shock-absorbing properties make it suitable for load-bearing posterior indications, it also offers a full range of shades for esthetic restorations in the anterior, according to Dr. Glazer.

#### **4. Is esthetic and offers a wide range of shades**

ACTIVA Presto offers esthetic qualities acceptable to the exacting standards of even the most highly cosmetic practice, says Dr. Glaser. “This is because you layer the material and blend. Remember, this is the art and science of dentistry. The science is in the materials we employ; the artistry is in our 10 fingers. You can accomplish beautiful esthetic dentistry with this material—both anterior and posterior.”

ACTIVA Presto is 70 percent filler by weight and includes the most commonly used shades (A1, A2, A3, A3.5, B1, Bleach White) as well as A4 and A6, which are well-suited to geriatric cervical restorations. “As our population ages, restorations typically translate to root decay that are typically darker in shade,” says Dr. Glazer. “So, in addition to handling the younger set with the bleach white shade, you can encompass the whole gamut of patient population—from pediatric to geriatric care. Just pick the shade and go.”

Having worked with ACTIVA Presto throughout its development, Dr. Glazer offers a tip for color matching. “When you apply the material, for example an A2 shade, it may look a little light when you syringe it into the area. But the minute you zap it with the curing light, it darkens to the shade it’s supposed to be.” Dr. Glazer recommends that a new user to ACTIVA Presto first dispense the material onto a pad and cure it, so they understand what the color change will look like—effectively making their own shade guide.

## 5. Is moisture tolerant

ACTIVA Presto has a unique relationship with water. Its controlled water absorption (slightly higher than other composites) enables it to mimic nature by facilitating ion exchange. Its low water solubility of 0.08 percent compares favorably with other composites, providing durability and longevity.

Regarding moisture tolerance, Dr. Glazer offers this caveat when working with ACTIVA Presto or any composite restorative.

“[Moisture tolerance] does not mean you can work in a puddle of saliva. Inversely, you never want to desiccate the preparation. The patient is breathing, so there will always be some humidity in the mouth and moisture on the tooth,” he says.

Dr. Glazer recommends that the prep be slightly moist, somewhere between wet and completely dry. “You should gently air dry for 5-10 seconds until there is an absence of all fluid movement on the tooth surface.”

## 6. Is highly radiopaque

ACTIVA Presto is highly radiopaque (2.5 Al or 250 percent), an important attribute for monitoring restoration integrity. “Radiopacity is key because you have to follow the restoration on a radiograph over time,” says Dr. Glazer. “You need to see the definite outline of the restoration to determine whether there’s been any breakdown. At this point in time, radiographs are the most cost-effective way to monitor this.”

“The tooth is the standard,” according to Pulpdent. Unlike other composites, ACTIVA Presto compares favorably to natural tooth structure in terms of esthetics, moisture-friendly properties, strength, calcium and phosphate release, and resilience and shock absorption.

Dr. Glazer summed up his experience with the new composite. “Dentists can overcome the fear of manufacturer hype with this product—ACTIVA Presto delivers.”

*For more information on ACTIVA Presto please visit [www.pulpdent.com/presto](http://www.pulpdent.com/presto).*