## Beginners guide to common adhesives/sealers used in Bead Mosaics

## PVA glues are most common, but What is PVA glue?

- Polyvinyl acetate, PVA's main chemical component, was discovered by the German, Fritz Klatte in 1912. The resulting glue doesn't give off smells or dangerous fumes and is perfectly safe to handle with bare hands. *commonly referred to as wood glue, white glue, carpenter's glue, school glue, or PVA glue.* 

PVA sets when there's good air circulation, and dries fastest at room temperature. It's quick drying with a high bond strength. PVA is flexible, permanent and only toxic if you eat it. It has a neutral pH value and is water soluble for easy clean up.



With bead mosaics these type of products work well in full strength or diluted versions, depending upon your technique.

Differences include glue strength when dry, ability to re-animate in high humidity and the clarity of the final dry product. Prices vary greatly as well as dispenser types and availability. It really comes down to personal preference on this, I encourage you to test beads and adhesion when changing brands as some beads may react differently to various glues and you don't want to be surprised when it really matters.

\*Note: Some adhesives will react to others when in close proximity, remember they are all chemicals and need time to cure not just dry. Be careful if using dissimilar products on the same project.

## Other adhesive types include:

*Silicone-* Thick sometimes clear glue that will hold almost anything. It takes days to dry fully (or cure) and can be toxic to touch and breathing. It's more costly and hard to get in small dispensers. Works well for 3D works or when holding something heavier.

**Apoxy Sculpt-** This two part play dough like epoxy mix is great for bead mosaic work that is more sculptural. It's toxic so mix it with gloves on. When mixed it's like thick putty and can be placed or shaped into anything, when beads are pressed into it they will stay forever. **Jewelers glue-** also known as industrial strength glue in small dispensers. These can be two part products or not. The beads will be stuck forever but due to it's toxicity many bead finishes can react with color changes or worse. These glues may also react to dissimilar glues near them due to the toxic fumes and they take up to 72 hours to dry. Well sealed mosaics probably wont need this much strength.

<u>Sealers</u> – make sure any existing glue is completely dry and cured.
Included here because they aid in adhesion and are very similar. All are available in various brands and finishes from matte to glossy.
Triple thick crystal clear glaze spray- Easy to use sprays give even coverage. Most are non-yellowing and should be used outside.(fumes and off gassing) if conditions are right they dry clear and seal well.
Clear acrylic sealer – dries transparent and is usually brushed on surface. Most brands won't harm the beads and dries with a thicker coating than the spray. Can be used indoors in well ventilated area, check label for non-yellowing. Not the same as Polyurethane or Shellac, do not use these as they will yellow over time.
Resin– most resins are two part and need to be mixed. They are toxic and will yellow over time. They will coat the mosaic and hold everything in place forever, but tend to be thicker and mask the beads

\*\*\* Please use all of these products in well ventilated areas, read the instructions and avoid touching them if possible.\*\*\*

personality.

