

# Prosthetic Transfers

By Todd Debrececi

3D prosthetic transfer appliances, is a relatively new technique sweeping through the makeup effects world, developed by Christien Tinsley. Before I knew how to make them myself, I used a number of appliances made for me by Christien for *The Enemy God* (2007), and when I returned from making that movie, I then began to research and develop my own method for crafting this type of prosthetic appliance.

While 3D transfers can be made using silicone as well, this tutorial article will deal with a material affectionately called 'bondo' in homage to the brand name Bondo, a polyester filler made by 3M that is used for repairing dings in automobile bodies. The makeup world's bondo is also used for seaming and patching tears and holes, but in prosthetic appliances, and is now also used as a material to fabricate prosthetics for stage and screen that are applied like temporary tattoos.

3D transfers have several benefits over more traditional appliances:

- Translucent appliance material
- Self adhesive prosthetic
- Very fast and easy to apply
- Edges blend and disappear beautifully
- Coloring and painting is easy
- Transfers accept almost all forms of makeup for coloring
- Appliance edges stay down all day
- They require very little to touch up (if any) during the shoot day or performance
- Move naturally with the skin
- Very effective even when used in and around water

3D transfers are perfect for gun shot wounds, stab wounds, lacerations, scars, bites, burns, stitched wounds, scratches, skin conditions, ulcers, and more. The possibilities and applications are almost endless. For the HBO movie *Grey Gardens*, Oscar winner Bill Corso very effectively used 3D transfers for age makeup on Drew Barrymore and Jessica Lange.

However, no technique is perfect, they do have limitations:

- Cannot/should not be used to cover highly contoured or curved areas such as full nose or ear
- Once the appliance is "touched down" onto the skin during application, it is stuck and rather difficult to reposition
- 3D transfers work best as thin appliances. Sculpt/appliances that are 1/4" or less in thickness look and work the best. Appliances greater than 3/8" – 1/2" in thickness are generally too thick to work well.

That being said, here is a tutorial to begin making your own 3D prosthetic transfers.

## 3D Prosthetic 'Bondo' or Pros-Aide Transfers

These bondo transfers or Pros-Aide transfers (Pros-Aide is the water-based acrylic prosthetic

adhesive the appliances are made from) are becoming more and more widely used worldwide for a variety of applications by great makeup effects guys like Oscar nominees Mike Smithson, Vittorio Sodano, Oscar winners Christien Tinsley and Matthew Mungle, Kevin Kirkpatrick, Antony McMullen, and me. They won Christien his 2008 Scientific and Technical Academy Award for the development of this process.

These transfers are not only easy to use, but they're also pretty easy to make – once the particular appliance has been sculpted and a flat negative silicone mold has been made – and kept on hand in enough quantity to last for an entire shoot, or just to have as a quick out-of-kit application possibility. They really are nothing more than Pros-Aide water-based acrylic adhesive that has been thickened, frozen, thawed and dried. That's the really simple explanation.

As with almost every process in makeup effects, the Pros-Aide can be thickened in more than one way; one way, the way I was taught, is to mix Cab-O-Sil – fumed silica – into the adhesive until it reaches a consistency you find usable – not runny, but not overly thick. However, another way – and I think this is the best method - is to forego the Cab-O-Sil and just use Pros-Aide alone in a mixer on its lowest speed for 8 or 9 hours, or until it's reached the thickness you want. I use a Sunbeam mixer. NOTE: Breathing fumed silica can cause Silicosis, so wear a respirator if you choose to try this method.

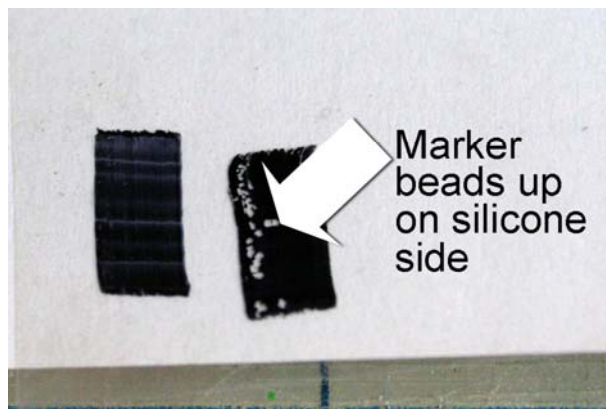


Sunbeam Mixer mixing on Speed 1 for several hours

If you whip it on a high speed, you'll create air bubbles, which you want to avoid; you just want to stir the Pros-Aide. Allowing the Pros-Aide to mix this way allows the water to evaporate without solidifying the adhesive; and you'll wind up with a softer appliance than if you add Cab-O-Sil as a thickener. As an additional softener, you can add from 5% – 16% DBP (Dibutyl Phthalate) Plasticizer to the Pros-Aide. This can be purchased from a number of makeup effects suppliers. This can be added during the mixing phase or after you've thickened it. If you have trouble finding it, let me know and I'll be happy to steer you in the right direction. You can color the Pros-Aide with flocking, or with a bit of pigment – food coloring, powder, etc. Do some

experimenting on your own; this industry thrives on innovation and experimentation. I use Createx pure pigment colors, and Liquitex Artist Acrylics to tint my bondo.

You will need a flat silicone plate mold of your sculpted appliance. If you want to try your hand at this, great, though pre-made molds can be purchased online. I even offer them on my own website. In addition to needing to have a silicone mold of your appliance, you'll also need temporary tattoo transfer paper – available from several sources, including Alcone, Motion Picture F/X Company and Nigel's Beauty Emporium. (The Internet is a wonderful shopping/research tool!) You can also buy the transfer paper together with silicone treated acetate. The acetate is treated on only one side; to determine which side, make a small mark with a permanent marker in an area that won't be in contact with the bondo. The silicone treated side will cause the marker ink to bead up.



Now you're ready to fill the mold. I suggest a light spray release such as Price Driscoll's Ultra 4 Epoxy Parfilm first. *Now you're ready to fill the mold.*



- Put some of the bondo into your silicone mold, being careful to avoid creating air bubbles between the mold surface and the bondo.



Ready to be Squeegee'd



- Place a piece of silicone treated acetate over the bondo (silicone treated side to the bondo) and squeegee to remove any surface air bubbles.



Ready for the freezer



Frozen and ready to be de-molded

- Put the mold into the freezer – no longer than an hour and a half – until frozen, and then remove the mold. You'll notice that the color has changed slightly.



- Carefully remove the frozen appliance from the silicone mold and allow it to thaw and dry; a great way to dry bondo transfers is in a fruit dehydrator. Some people prefer to leave the

flashing intact; I remove it while the appliance is still frozen before placing it in the dryer. Peel the mold away from the bondo rather than trying to peel out a frozen appliance.



Dry appliance ready to be put onto the transfer paper.

- Once the appliance is thawed and dry, it can be placed onto the tattoo transfer paper; apply a thin layer of Pros-Aide to the appliance out to the edge of the bondo. One nice thing about Pros-Aide (among many nice things) is that it brushes on white when it's wet, but dries completely clear. Make sure the adhesive is fully dry before placing it face down onto the transfer paper.



Applying a thin layer of Pros-Aide



The Pros-Aide dries clear

The transfer paper is shiny on one side, dull on the other. When the adhesive on your appliance is dry, press it face down onto the shiny side of the transfer paper, and then carefully peel off the

acetate. If the edges of the appliance start to come up with the acetate, press them back down until they do stick. If they are still sticking to the acetate, here's a trick to try. Take a can of Dust-Off or a similar air-in-a-can product, and turn it upside down, directing the long thin nozzle tube at the appliance. Be careful not to freeze yourself! The bondo will instantly refreeze and you can easily remove the acetate.



Ready to peel off the acetate



Ready to cut the transfer paper and apply

- Now you're ready to apply the transfer. The skin should be clean, dry and absent of any oils, hair and makeup. Cut the transfer paper close to the edge of the appliance (or appliances) so it will be easier to apply. Place the transfer face down onto the skin and press firmly. Wet the back of the paper with a moist paper towel and hold it in place for about 30 seconds.
- Peel off the transfer paper (carefully), and smooth the transfer gently with some water, and let it dry completely. If there are any visible edges, they can be blended off with a small brush or applicator and 99% isopropyl alcohol. On this application I also blended with a bit of bondo applied with a piece of makeup sponge to further blend edges since there were a couple of places where the edges had flipped over and stuck together.



My student John Cox



Ready for painting

- Paint the appliance – I used Premier Products' Skin Illustrator palettes (alcohol activated). I also added some crepe wool to replace part of the eyebrow and sideburn affected by the prosthetic.
- Seal it with a thin layer of Pros-Aide (let it dry first) and then powder, and seal with Ben Nye Final Seal, Reel Creations Blue Aqua Sealer, Graftobian Makeup Setting Spray, Kryolan Fixier Spray or something similar. There are numerous products to choose from.



Voila! Finished.



These prosthetics look terrific on stage and on screen, even in HD. Once they've been applied and sealed, you can even wear them swimming. When you're done, they can be removed with just about any makeup or prosthetic adhesive remover; even with 99% IPA. For the most part, these transfers are for one-time use only. Good luck, and have fun! Post some pictures!