

Dimple Tape on a Great American Prop

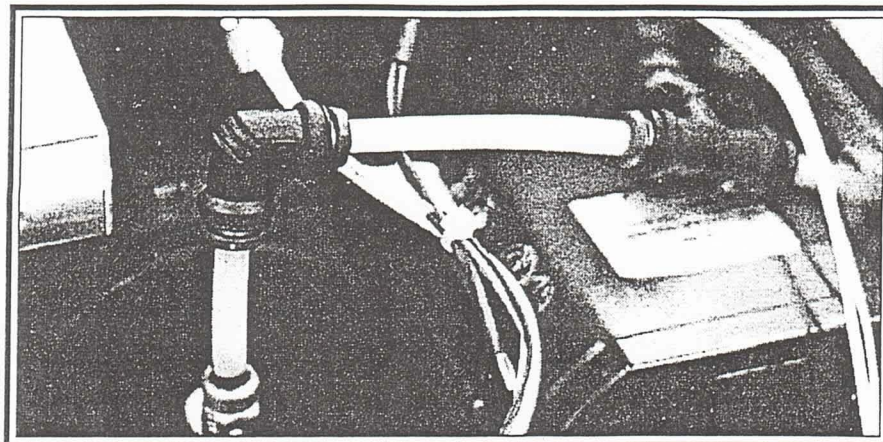
Vance Atkinson (TX) - Two weeks before Sun-n-Fun I put some dimple tape on my Great American prop. Here is what happened.

I called the manufacturer who was going to make it and sell it and found out the tape was 17 thousandths thick. I called 3-M and ordered a roll. That took a month to get. I then proceeded to punch in all the little holes using a gasket punch. That took another month. JUST KIDDING! The application process of the tape takes a couple of hours and the bottom line is the day we left for Florida (via several other states) was the first test flight. I took it up for 10 minutes landed and noted nothing horrendously wrong so we loaded up and left for the east coast. We flew about 23 hours on that trip and sadly, no change was noted, good or bad. I could not detect any sound difference. At around 16 hours I noticed one tape starting to peel at the end of the prop tip. On the previous leg we had flown though some moisture (about 10 min. worth of in and out of Florida's low clouds with no rain.) I then went ahead and peeled all the rest of the tape off and as we flew along on the next leg noted once again, no change.

This is the only place I have put the tape on, as you are required to sand the surface free of any defects before application. I agree with Klaus in that if you have a properly designed airfoil you most likely will not benefit from this tape. I am still planning on applying the tape on the landing gear legs top and bottom, as they are probably the most inefficient airfoil on the plane.

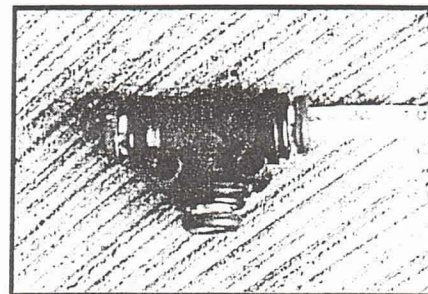
I would not recommend using this tape on the canard but instead, vortex generators to help your canard to "smooth out in the rain".

This tape is made for helicopter blades and costs about 90 bucks a 100' roll when ordered singly from 3M.



Instrument Line Fittings

Tim Mulvey (NY) - Parker Fluid Connectors are great for instrument vacuum or suction line and come in various sizes. No special tools are needed. Just insert the line until it bottoms and it is assembled. Ask for Parker Prestolok or Prestolok II fittings, in any store that sells Parker connectors for hydraulic applications. I got mine at K-D Supply 716-693-7600.



Old Epoxy Problems

ED: Sometimes old epoxy in our pumps will change consistency or develop crystals. The following is a guide on how to deal with the problem.

Gary Hunter (TX) - Trash the curing agent - it has probably absorbed moisture and will not produce good properties. A good way to dispose of it is to add little quantities of it to any unhardened leftover resin from layups. Not too much, or it will not harden enough for safe disposal in the trash. Eventually, the waste curing agent will be gone.

The Resin (Part A) is probably OK. - Not much can happen to the resin side of the system. Usually all that happens is crystallization. The first sign of crystallization is an increase in viscosity that you may or may not notice (or be able to measure). Visible indicators are haziness and/or lumpy curd or wax like consistency. Do not use it in this state. Simply

warm the material to about 120-140F and allow the heat to completely melt ALL the crystals. An easy way to do that is place the container of resin in a plastic baggie and submerge it in a pail of hot tap water from your faucet. If you don't have a baggie, just make sure the container is sealed and you have eliminated the possibility of water contamination during and after submerging it in the hot water bath. If the crystallized resin is in your epoxy pump pail and/or pump system, heat it with a heat gun or hair dryer. This will do the same thing.

If you have any concerns, use it for non-structural applications like fairings or microfill and such.

I hope this helps. You can call me directly for technical advice on epoxies if you like.

GARY A. HUNTER - Vari-Eze - N235GH - 810 hrs / 14 yrs.

Technical Service Representative
Epoxy Resins & Curing Agents
Toll Free in North America -
800-832-3766

International - 713-246-8295
E-Mail - gahunter@shellus.com

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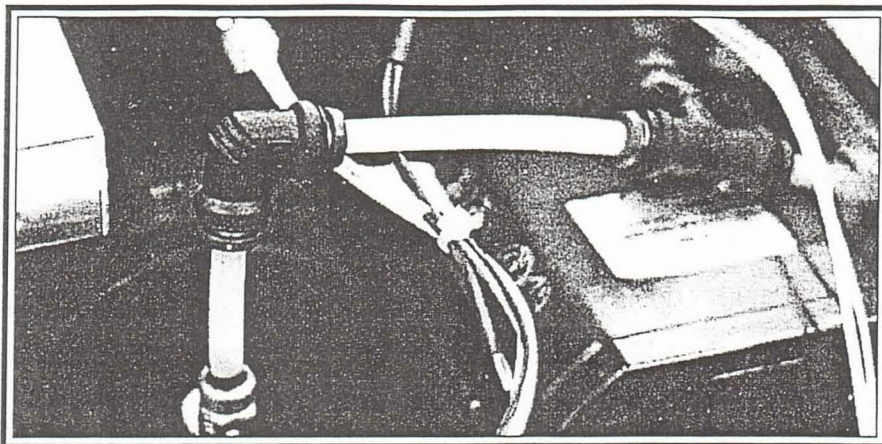
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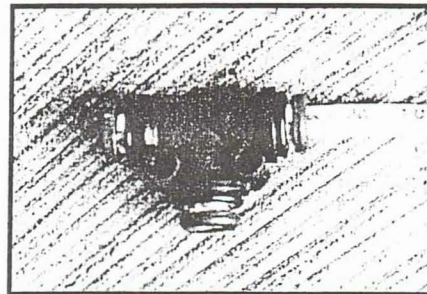
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