

DENNEY
AEROCRAFT
COMPANY

October 16, 1991

SERVICE LETTER #21

SUBJECT: Cotton Flox - Micro-Balloons

TO: Model III and IV Owners - Serial #1143 Thru Serial #1420

FROM: Denney Aircraft Company

You should have received recently our Service Bulletin #7, which dealt with cotton flox and fiberglass microballoons. This letter is a followup.

The 3M technical representative we contacted said there should be no difference in bond adhesion or strength of the 3M #2216 Structural Epoxy whether cotton flox or microballoons are used as "thickening" agent, or whether any other inert agent is used, or no stiffening agent at all. He did say that the epoxy with microballoons may be less elastic when fully cured.

We conducted tests here at the factory which basically substantiated his conclusions. The peel strength and tensile strength of the two substances proved almost identical. The shear strength of the epoxy with microballoons was a bit less than that with cotton flox. The tests were conducted on samples that had cured for about one week. We did mix the microballoons at a very high ratio, and it was slow to cure, appearing more rubbery than the cotton flox mix for the first few days. It may take a little longer to fully cure than straight epoxy or the cotton flox mix.

CONCLUSION: The structural epoxy with microballoons is acceptable for use in the construction of the Kitfox.

If you need assistance in any way, please call customer service. Before returning any items to Denney Aircraft Co., please obtain a Return Goods Authorization (RMA) number from customer service.