The Volk laboratory invites applications for postdoctoral positions at the School of Veterinary Medicine, University of Pennsylvania. The goals of our laboratory are to understand regulatory mechanisms governing dynamic interactions between cells and their surrounding extracellular matrix in the wound healing-fibrosis-cancer progression triad and to apply this knowledge to develop innovative regenerative and oncologic therapies for veterinary and human patients. One-year positions are available immediately with the option to extend an additional 1-3 years. Using a combination of in vitro and mouse models, we have initiated multiple lines of investigation that will provide insight into how regulation of the collagen fibrillar matrix and its components, specifically type III collagen, inhibits formation of a tumor-permissive microenvironment. This work also capitalizes on our studies using spontaneous naturally occurring large animal models of mammary tumors. Future work will characterize drivers of tumor-permissive and suppressive collagen signatures and investigate the use of a novel tissue engineering strategy to control tumor growth and metastasis following tumor resection to improve clinical outcome in veterinary and human breast cancer patients.

Highly motivated applicants with a recent PhD in a biomedical field or a MD, DDS/DMD, DVM/VMD with MS or PhD and a strong track record of research as evidenced by publications; excellent written and verbal communication; strong attention to detail; ability to multi-task; and a willingness to learn new technologies are encouraged to apply. Experience in mouse models, tissue culture, cell biology and molecular techniques preferred. The Volk laboratory is highly collaborative and applicants will have the opportunity to engage in collaborative efforts at local, national and international levels in the field of extracellular matrix biology. Candidates are expected to establish independent research projects, and to generate high impact publications, providing outstanding opportunity for further career development in academia. University of Pennsylvania is an AA/EOE; women and minority candidates are strongly encouraged to apply. Applicants should submit a CV and a cover letter describing research experience, interests and goals by email to: swvolk@vet.upenn.edu. Contact information for three references should be included.