

January 11, 2021

Representative Tarwater  
Chair, Commerce, Labor, and Economic Development Committee  
Kansas State House

Re: Support for House Bill 2045

Dear Chairman Tarwater, Vice Chairman Long, Ranking Minority Clayton, and Members of the Committee

Thank you. I appreciate the opportunity to give this talk about our company and what the Angel Investment Tax Credit can do for it. To make this slide clearer for everyone, please follow along by starting at the top left. Our company addresses a problem that affects millions of Americans. Over 133 million Americans are diagnosed with a chronic disease such as heart disease, lung disease or cancer, many of which require longterm drug treatment. Drugs are constantly being developed to better treat these diseases. But what not everyone may know is that the vast majority of drugs tend to fail in clinical trials, due in large part to toxic side effects on the patient's immune system. This is because pre-clinical drug testing in animal and cell models cannot adequately detect drug side effects on the human immune system. And so, there is a big disconnect in pre-clinical drug testing and clinical trial testing.

To address this serious problem, Dr. Wei Fang and I co-founded Fennik Life Sciences, whose mission is to provide 3D cell culture products and services to biomedical researchers to improve human health. 3D cell cultures are a way for researchers to grow cells in protein matrix so they form structures that better mimic tissues in the human body. Our first product on the market is the TheraKan system which allows researchers to establish 3D cell cultures to mimic tissues of any kind and measure immune responses from cells taken from blood samples.

To demonstrate how this is used, I'm showing some data taken from a study on breast cancer, in honor of October being breast cancer awareness month. This data is shown on the top right. It's been shown that breast cancer patients tend to mount immune responses to tumors, and this can be observed by increasing movement of immune cells to tumor tissues. In this sample image taken of the TheraKan system in action, we can see how immune cells (labeled in red) have moved in response to breast cancer 3D cultures established in the device, mimicking what is observed in patients. By testing drug compounds in the TheraKan system, biomedical researchers may get a better picture of how drugs actually affect the human immune system. Toxic drugs may then be excluded them from further testing, and safer and more effective drugs may be advanced to clinical trials.

Fennik Life Sciences is a Kansas based company spun off from the University of Kansas Medical Center, and we have formed several partnerships in this state, including those in plastics manufacturing, and academic institutions to develop our product. We are seeking to grow our company by developing new products, assays and contract research services. So far, we have obtained funding through grants and private investment. But our goal in the next 5 years is to find Angel Investment, which would provide

the capital needed for expansion. By growing our company, we can form additional partnerships in the KS regions including pharmaceutical companies, shipping industry and veterinary medicine and help to provide jobs in various sectors. One of the major challenges for Fennik Life Sciences, is that as a biotech company in the midwest, we tend to be overlooked as a potential company to invest in, in comparison to East or West Coast, although there are advantages for biotech to being in KS including a robust plastics manufacturing industry. As Patty Markley stated so well, Angel Investment is a critical source of funding for biotech startup companies like Fennik Life Sciences. The Angel Investment tax credit would encourage Angel Investors to look at a Kansas based company like Fennik Life Sciences and consider investment, providing an opportunity for us to grow our business, provide jobs in the biotech sector and provide 3D cell culture products and services to help biomedical researchers develop better and safer drugs to treat the millions of people with chronic diseases.

Thank you.

A handwritten signature in black ink that reads "Nikki Cheng". The signature is written in a cursive, flowing style.

Nikki Cheng, Ph.D  
Co-Founder, Chief Scientific Officer  
Fennik Life Sciences