

## **FAQs about Biologics and Eye Tissue**

### **What are biologics?**

Biologics are the work product of the biotech industry. Unlike drugs, which are synthesized chemically, biologics are derived from living sources – such as the eye – to be used therapeutically to treat human disease.

Biological products often represent the cutting-edge of biomedical research and, in time, may offer the most effective means to treat a variety of medical illnesses and conditions that presently have no other treatments available.

### **Why is the eye important to biologics development?**

Scientists and researchers are very interested in the retinal pigment epithelial (RPE) cells in the eye. RPE cells directly enhance brain levels of dopamine, a neurotransmitter. Dopamine affects brain processes that control movement, emotional response, and ability to experience pleasure and pain.

### **How are RPE cells used?**

Eye tissue is currently used to develop treatments for Parkinson's and other central nervous system diseases. In patients afflicted with Parkinson's disease, certain areas of the brain have low levels of dopamine, leading to movement disorders. RPE cells are also used for research in macular degeneration

### **How are biologics regulated?**

Biologics have been predominantly regulated under the Public Health Service Act although they are also defined as drugs under the Food Drug and Cosmetic Act.