“The Benefit and Value of Canine and Feline Models of Neuropathic Lysosomal Storage Diseases.”

Spontaneous canine and feline models of lysosomal storage diseases have a long history in veterinary and comparative medicine. The first clinical cases identified of canine metachromatic leukodystrophy pre-date the development of a theoretical understanding of lysosomal storage diseases. Since then multiple models have continued to be identified and developed with over 20 different forms of lysosomal storage diseases represented. They have contributed importantly to areas of basic and therapeutic research in the field of human LSDs, and have improved animal health by eliminating these diseases in the pedigree animal population. We will discuss the history and practice of developing these models, and will highlight the accomplishments and contributions of the field that has improved our understanding of these diseases and have outcomes for human patients.