Samuel Sklar
Seminar summaries

Seminar 1:
Encoding and Decoding Specificity in Antibody Repositories by Deep Learning :Sai Reddy, 9/13/19

Antibodies can develop convergent specific binding sequences. The convergent sequences can be found and clustered using a neural network. Therefore they can optimize mAB binding by using a computational model to identify conserved regions in effective antibodies.

Seminar 2: *Improved Bone Adaptation and Osteovascular Function Following Ischemic Stroke* : Jacqueline Cole 9/20/19

Stroke increases mean distance from osteoblasts to capillaries in bone and thereby causes bone density loss. Use a neural network based classification of data establish positions of different tissues given a cell stain. This complex data processing allowed them to validate the idea of increased osteoblast distance from blood vesicles, and try to correlate the average distance to functional properties of the bone.