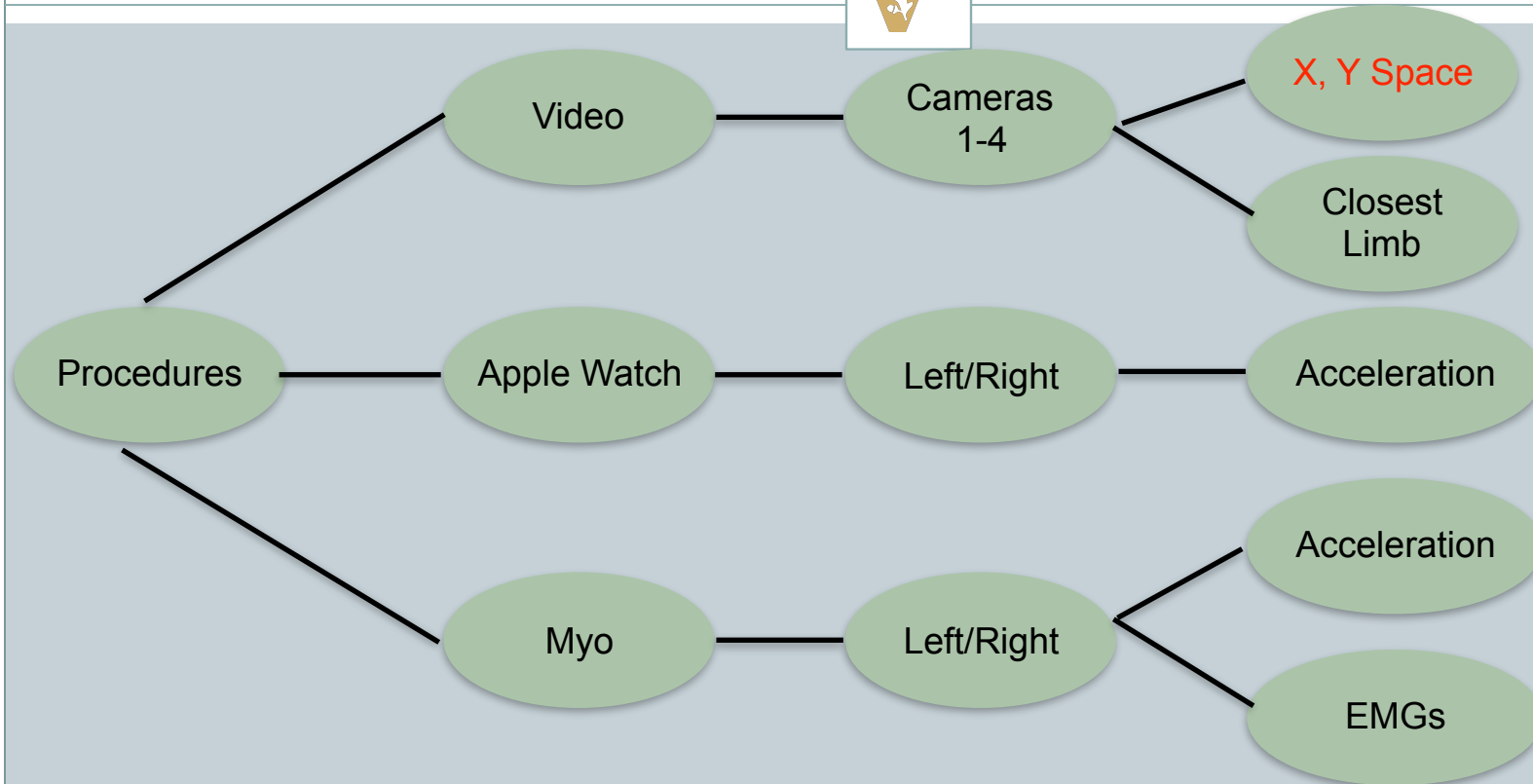


Project Baseline

VANDERBILT  UNIVERSITY

Deirdre Scully

Data



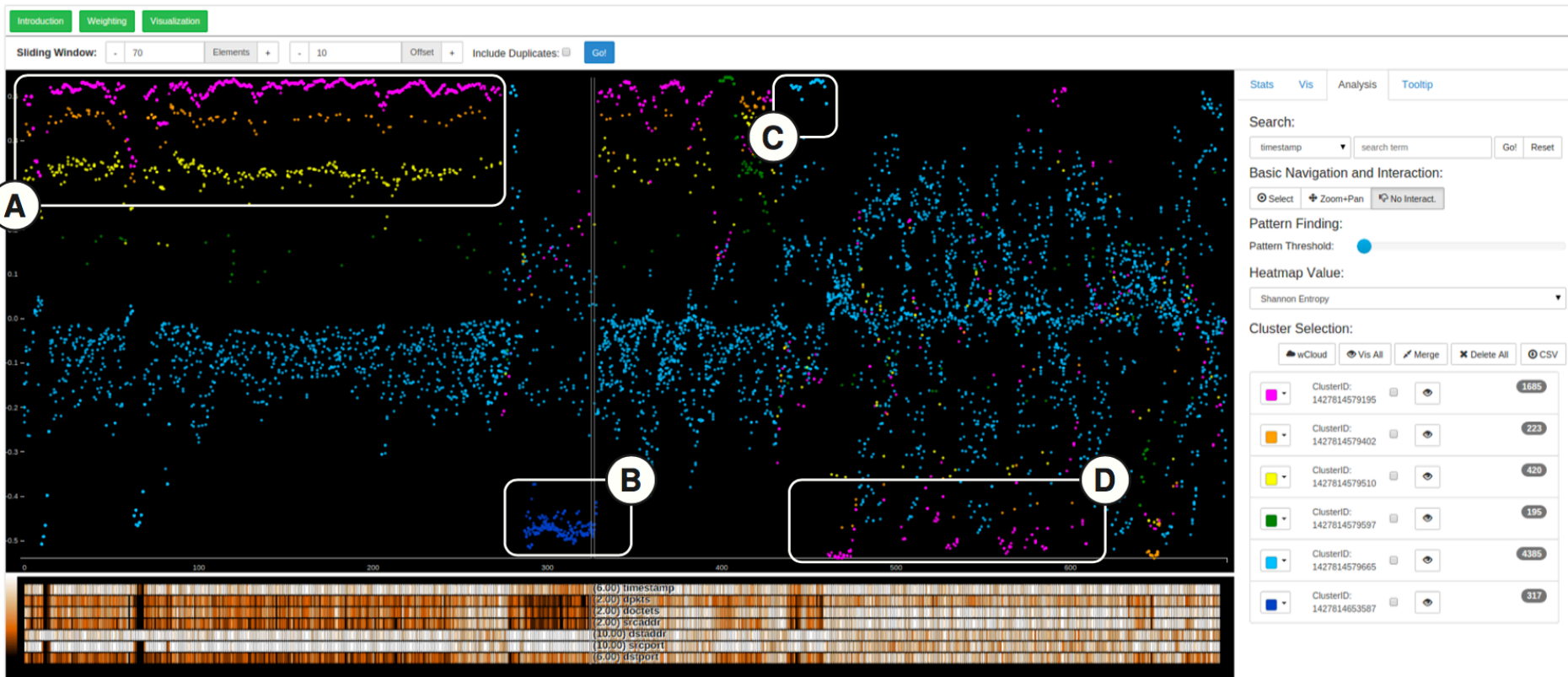
Data



- Timeseries Data
 - 72 Data Features (just for video X, Y Space)
 - PCA to 1 Feature over Time
- Classification Model Results
 - 20 Different Procedures
 - Correctly Predicted
 - Incorrectly Predicted Procedures

Baseline

Jackle et al, 2016

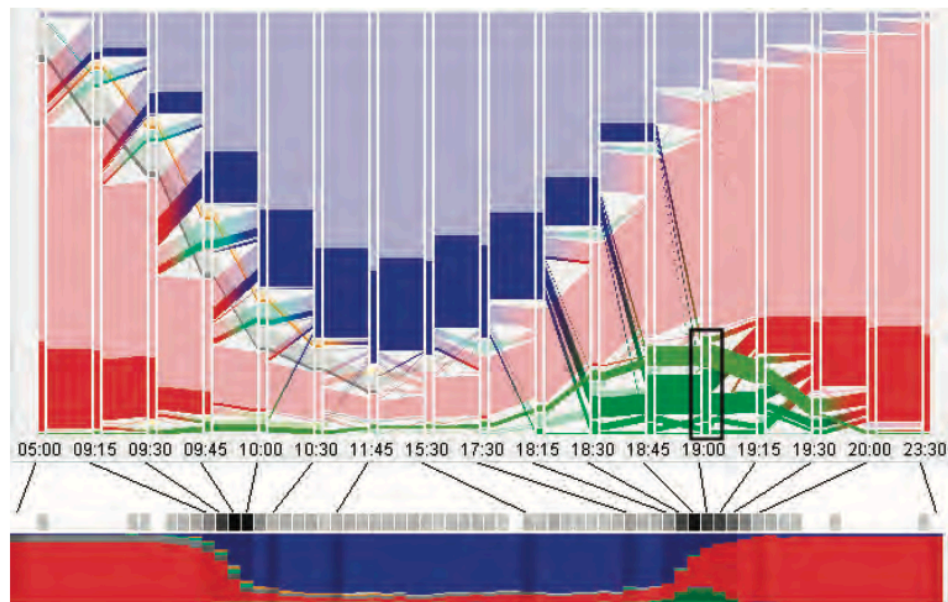


Baseline

Landesberger et al, 2012



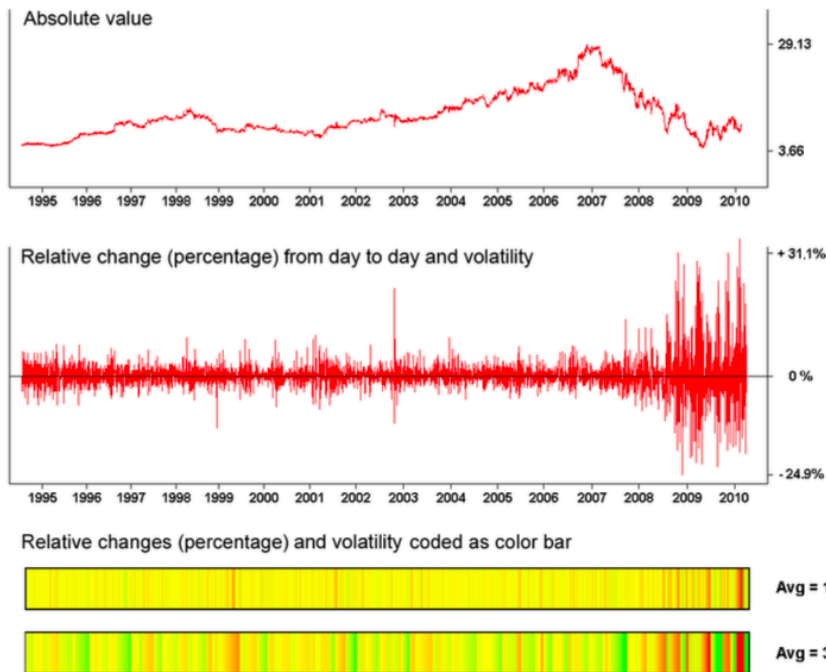
Ziegler et al, 2010



(a) Dynamic categorical data view with highlighting (DCDV)

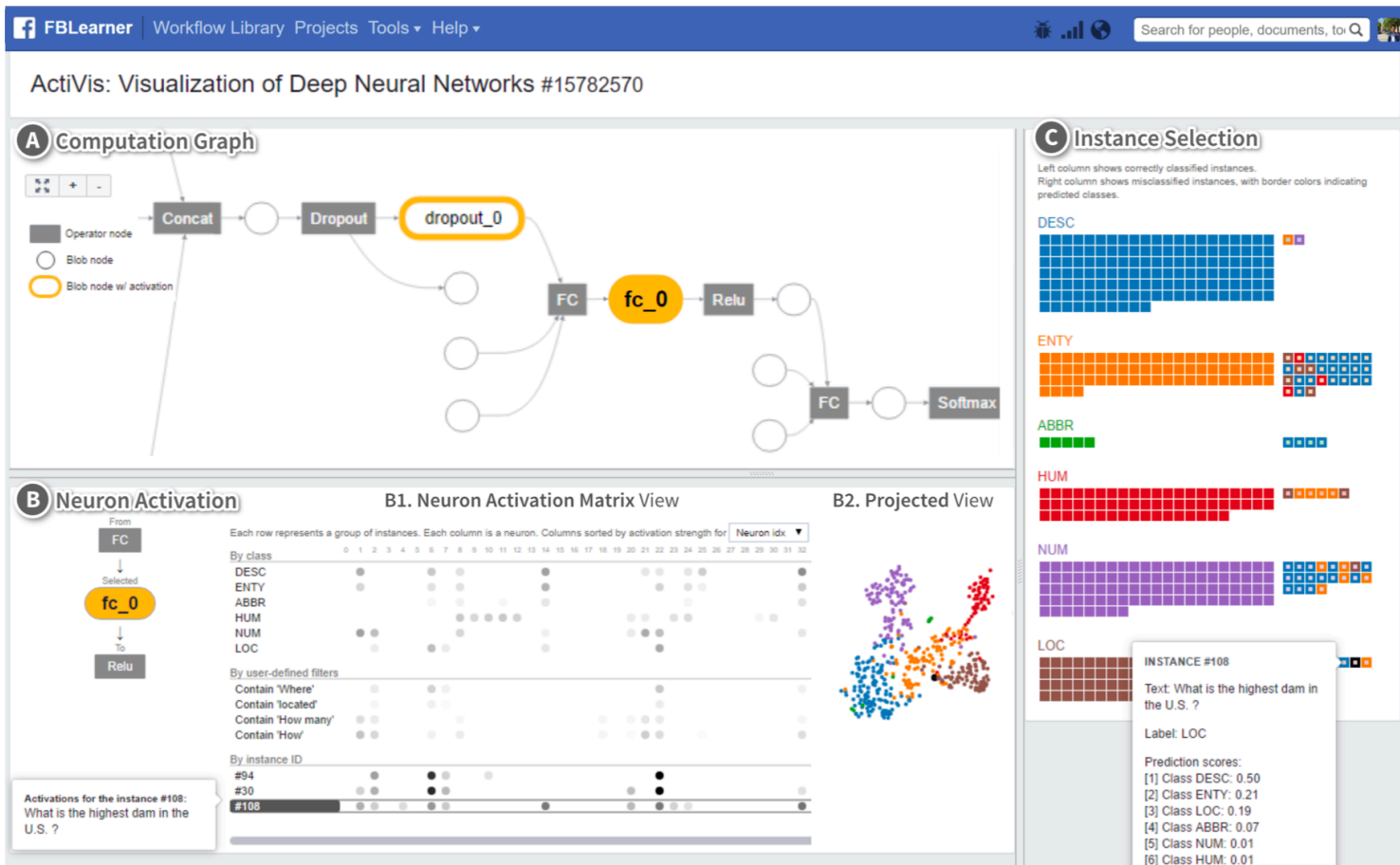
Ameris Bancorp

ISIN US03076K1088



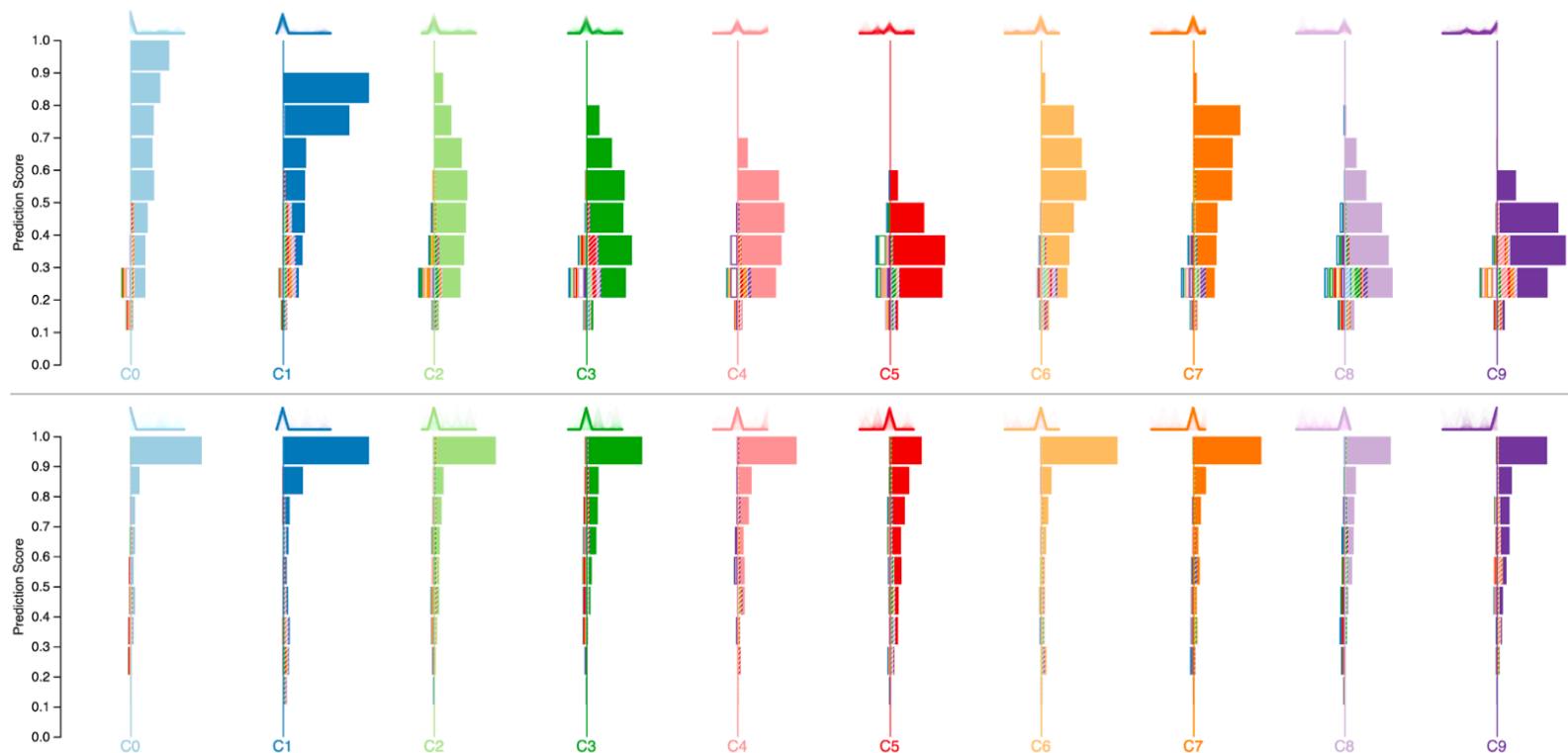
Baseline

Kahng et al, 2018



Baseline

Ren et al, 2017



Visual Encodings



- Timeseries
 - Procedures encoded with hue
 - Timeseries encoded x-axis
 - Features/PCA encoded y-axis
- Classification
 - Correct/Incorrect encoded hue
 - # Correct/Incorrect encoded x-axis
 - Procedures encoded y-axis

Related Works



Timeseries

T. von Landesberger, S. Bremm, N. Andrienko, G. Andrienko and M. Tekuov. 2012. Visual analytics methods for categoric spatio-temporal data. *IEEE Conference on Visual Analytics Science and Technology (VAST), Seattle, WA, 2012*. pp. 183-192.

D. Jackle, F. Fischer, T. Schreck and D. A. Keim. 2016. Temporal MDS Plots for Analysis of Multivariate Data. *IEEE Transactions on Visualization and Computer Graphics*. vol. 22, no. 1. pp. 141-150.

Hartmut Ziegler, Marco Jenny, Tino Gruse, and Daniel A. Keim. 2010. Visual Market Sector Analysis for Financial Time Series Data. *IEEE Symposium on Visual Analytics Science and Technology*.

Classification

Minsuk Kahng, Pierre Y. Andrews, Aditya Kalro, and Duen Horng (Polo) Chau. 2018. ACTIVIS: Visual Exploration of Industry-Scale Deep Neural Network Models. *IEEE TRANSACTIONS ON VISUALIZATION AND COMPUTER GRAPHICS*. vol. 24, no. 1.

Donghao Ren, Saleema Amershi, Bongshin Lee, Jina Suh, and Jason D. Williams. 2017. Squares: Supporting Interactive Performance Analysis for Multiclass Classifiers. *IEEE TRANSACTIONS ON VISUALIZATION AND COMPUTER GRAPHICS*. vol. 23, no. 1.