California State University San Bernardino School of Computer Science and Engineering

CSE 595 Independent Study Presentation <u>Date</u>

June 13, 2014

Time

9:00am

Place

JB 359

Title

Profiling Gene Expression Through Microarray Analysis

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Abstract

An exploration will be done explaining the significance of Microarray Analysis and its use to profile gene expression. Microarray technology is a very powerful technique used for biological discovery and capable of measuring the level of activity of hundreds to thousands of genes in a single attempt. Although Microarray is especially thought upon, it also comes with disadvantages. In an effort to help resolve some of these disadvantages, a technique known as Data Clustering will be implemented. Data Clustering plays a vital role in Microarray Analysis and its ability to he

Ip guide a gene expression profile study. Data clustering applies different algorithms specifically used to arrange data sets brought upon by Microarray Analysis. This presentation will also introduce: Hierarchy, Kmeans, and DBSCAN (Density Based Spatial Clustering of Application with noise) in effort to better understand Data Clustering.