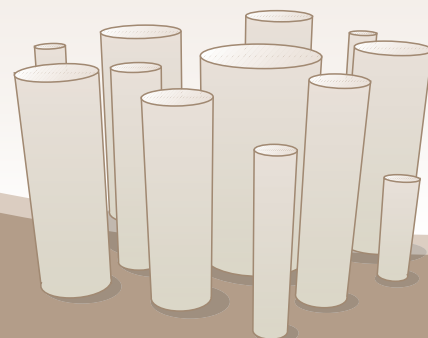


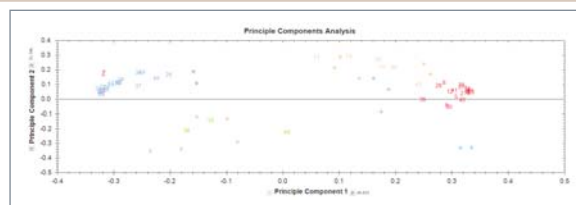
progenesis Stats

Easy-to-use, multivariate statistical analysis tool
Watch the patterns emerge from your proteomics data...



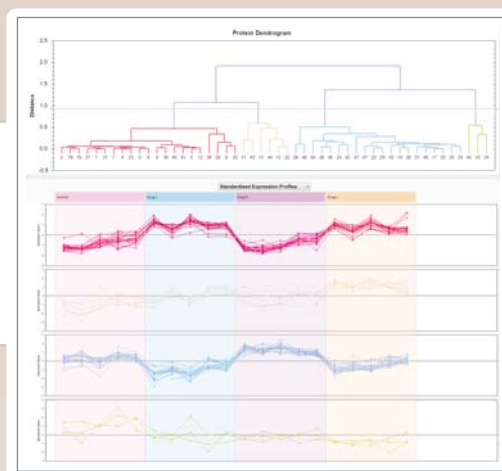
Principal Components Analysis

Check your data clusters according to your experimental groups and identify any outliers which could signify experimental error



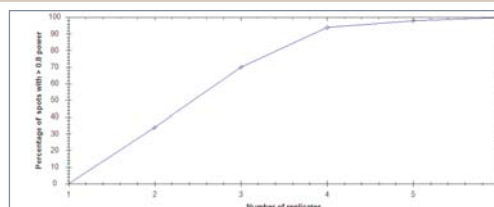
Correlation Analysis

Group proteins by their expression patterns for a true snapshot of protein activity across an experiment



Power Analysis

Calculate how many replicates you need to run and the power of your experiment to find significant expression changes



Ask for an evaluation today!

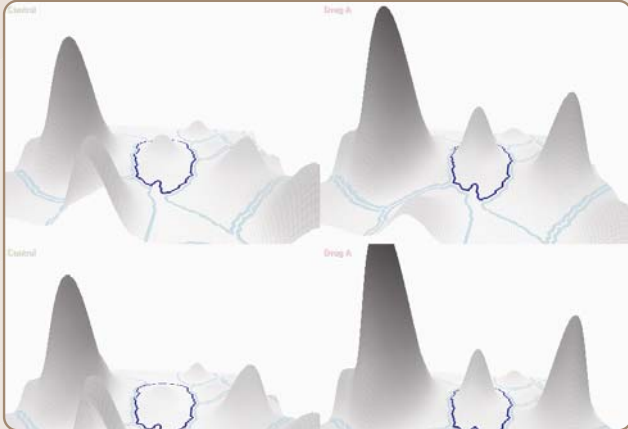
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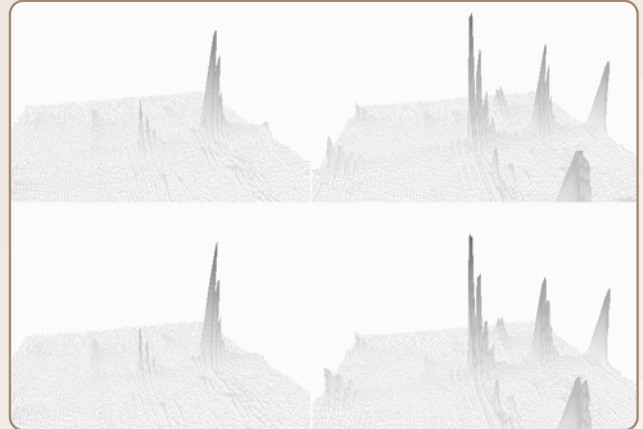
Progenesis Stats

Progenesis Stats is an advanced, easy-to-use statistical analysis tool for further interrogation of proteomics data. The unique approach of Progenesis SameSpots and Progenesis LC-MS produces results with no missing values, so you can confidently apply both univariate and multivariate statistical techniques for a complete exploration of your protein expression data. This powerful tool solves the statistics headache for proteomics researchers.

2D gel data



LC-MS data



What does this mean for my proteomics data analysis?

Principal Components Analysis

This is an unsupervised technique (i.e. it does not use any knowledge of the groupings of the data) which provides a simplified graphical representation of the multidimensional data.

It is useful for determining if samples have the groupings expected or if there are any outliers in the data. Examining the PCA plot is a useful Quality Control check before further analysis.

Correlation Analysis

Proteins are grouped by their expression patterns using correlation analysis and hierarchical clustering. This unsupervised, multivariate analysis provides a true snapshot of protein activity across an experiment and identifies proteins in the same biological processes and pathways that may characterise disease states.

The results are shown in an interactive dendrogram tree where similar expression profiles cluster together. Data can be explored at group level on the dendrogram, and the corresponding expression profiles update on-the-fly.

Power Analysis

The power of a statistical test can be defined as the probability that it will find a significant expression change where it exists. It depends on the sample size and can calculate the effect of running a different number of replicates.

A generally accepted power threshold is 80%. A power analysis can be performed on a pilot study and the number of replicates required to achieve the target power of 80% can be calculated.

Find out more at www.nonlinear.com



Nonlinear Dynamics

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