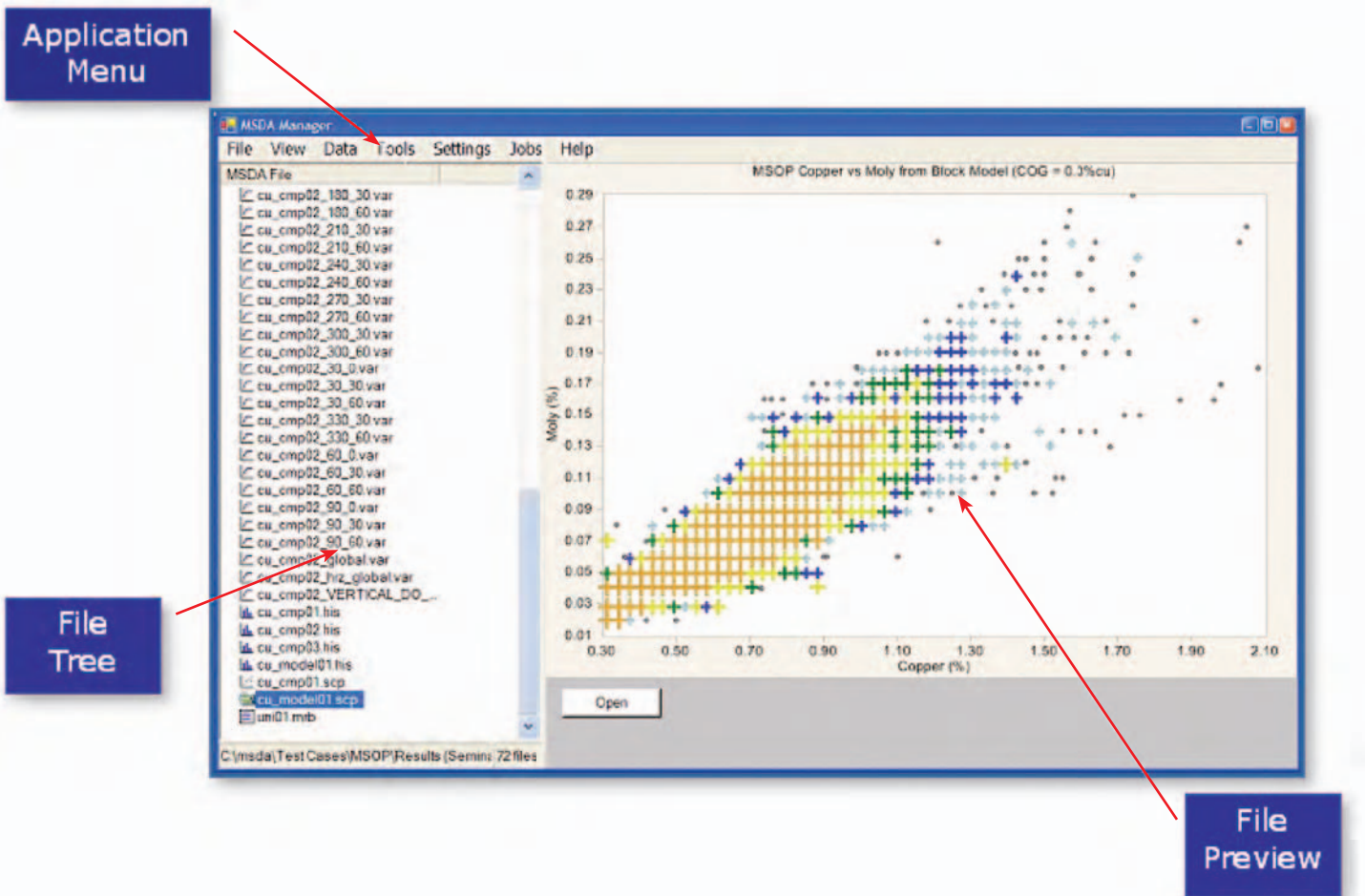


MineSight® Data Analyst (MSDA) Ready for General Release

MineSight® Data Analyst (MSDA), which has been in beta release for a number of months, is being released on the upcoming update CD. MSDA is a package of statistical and geostatistical analysis programs that replaces the older MineSight® m300 and m400 series programs, and adds significant new functionality. It includes histograms, scatterplots, cumulative probability plots, variograms, variogram 3-D modeling, and custom reports. MSDA reads all MineSight® drillhole, blasthole, and block model files, as well as ODBC compliant databases, spreadsheets, and text files. A **Data Source** dialog lets you connect to the desired file, choose specific fields, apply basic or SQL filtering conditions, and so on. These parameters remain active until you change them, regardless of the MSDA application on which you are working.

All MSDA applications are started from the main MSDA window, which is known as **MSDA Manager**. This window shows the current project tree and project files on one side, and a preview chart of the currently selected project file (e.g. a histogram) in the main panel. The **MSDA Manager** window contains a menu system from which every MSDA application may be launched, e.g. build variograms, build custom reports, launch the **Variogram 3-D Modeler**, and so on. Once the files are built, they may be opened in a customer viewer for viewing, editing, printing, etc.



Data and tabular results are generated in various types and formats by all MSDA applications. Generally, options are provided to export the data or table to an HTML file, which may then easily be viewed, printed, or imported into Microsoft® Word, etc. In certain special cases, such as custom reports, and the histogram cutoff grade report, more sophisticated options are available for controlling text fonts, size, colors, printing, and exporting the file.

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MSDA uses an integrated third party charting tool, which offers users a great deal of power and flexibility. The product is known as ChartFX, and it is integrated into histograms, scatterplots, cumulative probability plots, custom report charts, variograms, and the **Variogram 3-D Modeler**. When you run any of these MSDA applications, a very smart looking chart is generated. Subsequently, users have access to powerful tools that let them edit the chart color, text size, font, grid details, annotations, and much more. MSDA also adds the concept of chart style, which means that users may name and save a combination of chart settings, then apply them to other charts. Finally, ChartFX also lets users print a chart or export it to a bitmap file; the latter may be inserted into other applications such as Microsoft® Word.



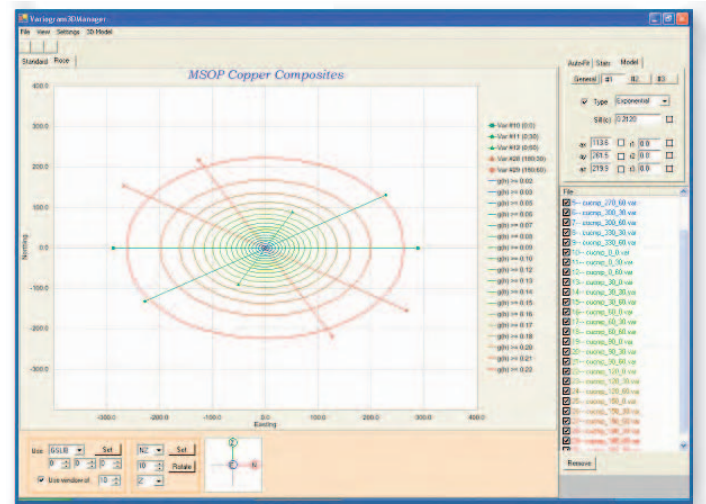
The **MSDA Custom Report** is a significant new addition. It allows one to design and build almost any imaginable statistical report from any of the data sources supported by MSDA. For performance and flexibility reasons, custom reports are generated in two steps: **Report Builder** and **Report/Chart Viewer**.

The **Variogram 3-D Modeling** package (VAR3D) is a very significant application in its own right and we can only describe it very superficially here. In basic terms, VAR3D is a tool, which does two things:

- Helps users organize and view a large collection of variograms and variogram models, by direction and plane, with specified windows.
- Builds and displays a 3-D model, which fits the collection of individual variograms. The 3-D model may be defined manually (by entering the parameters), or by using an included Auto-Fit function. Up to three structures are allowed. Each structure may use any of the supported model types (spherical, exponential, etc.), and the major axes may be aligned along any coordinate system. If you use the **Auto-Fit** method, it will determine the rotation angles, using any of the supported rotation conventions (Meds, GSLIB, and Sage).

The major components of VAR3D are as follows:

- a) **Variogram Collection:** Users simply drag and drop one or more MSDA variograms files from Microsoft® Windows Explorer into VAR3D.
- b) **Standard Variogram Display:** This is a chart, which shows all of the variograms in the **Variogram Collection**, which fall along the **Active Direction**, give or take a specified window.
- c) **Active Direction:** This is a control on the **Standard Variogram Display**, which lets users define the active direction (azimuth and dip) and a window angle.
- d) **Rose Diagram:** This is a chart, which shows the variograms and the 3-D model on a specified plane, give or take a specified window.



- e) **Active Plane:** This is a control at the bottom of the **Rose Diagram**, which lets you specify the orientation of the plane and a window angle.
- f) **Structural View:** The intersection of each individual structure (an ellipsoid) on each principal plane (EN, NZ, EZ) is shown.
- g) **The 3-D Model:** A multi-tabbed dialog at the upper right corner of VAR3D contains all of the parameters for a one to three structure 3-D variogram model
- h) **Auto-Fit:** The **Auto-Fit** program computes the nugget, sills, ranges and rotation angles for a 3-D model such that it fits the collection of individual variograms with minimum error. A number of options are available such as maximum iterations, tolerance criteria, weighting by number of pairs, max. lag distance, and so on.
- i) **Support:** There are many different tools in VAR3D for controlling all aspects of the display and modeling, exporting results for the MineSight® kriging program, and so on.