

What's New in MineScape 5.0

Introduction

MineScape 5.0 delivers significant improvements over previous versions of MineScape both in terms of usability and functionality. MineScape 5.0 incorporates enhancements and improvements that allow users of the software to complete tasks quicker and more efficiently.

MineScape Compatibility

MineScape 5.0 is completely compatible with MineScape 4.0. Both versions of MineScape can be installed onto your PC and either version can be used to access existing MineScape projects.

This designed compatibility will allow you to migrate to MineScape 5.0 at your own pace in a timeframe that best suits you.

Note: While it is possible to run both versions at the same time, the same project and project files cannot be accessed by both versions at the same time.

System Requirements

The following system requirements are recommended for MineScape 5.0:

Operating Systems	Microsoft Windows XP (32-bit) with Service Pack 3 installed.
Processor	3 GHz Intel Dual Core or greater.
RAM	4 GB or greater.
Hard Disk	<ul style="list-style-type: none">• Up to 455 MB of free disk space for the full MineScape 5.0 installation.• Up to 16 MB of free disk space for the Flex License Server installation. <p>Additional disk space will be required for project files and databases.</p>
Graphics Card	512 MB or greater DirectX compatible.
Mouse	3-button mouse with a scroll wheel.
Monitor	Large format widescreen monitor. Dual monitors are also supported.

Third-Party Requirements

Microsoft

Microsoft .NET Framework 3.5 with Service Pack 1 installed.

Microsoft DirectX 9.0c minimum.

Microsoft Windows

Operating System	Supported	Q1 2010	Q2 2010	Q3 2010	Q4 2010
Windows XP 32-bit	✓				
Windows XP 64-bit					✓
Windows 7 32-bit				✓	
Windows 7 64-bit					✓

Oracle

Oracle Enterprise, Standard Edition or Personal Edition database is required for the GDB product.

Minimum - Oracle 9i

Recommended - Oracle 10g

Note: Up to 2 GB of free disk space is required for the Oracle installation. Additional disk space will be required for database files.

Note: Oracle 11g will be supported in Q3 2010.

Java

A Java virtual machine needs to be loaded in order to install the Flex License Server. The latest Java Runtime Environment can be downloaded from the official Java web site.

MineScape 5.0 Configuration Manager

Configuration settings for the MineScape 5.0 environment are accessed through the **Settings » Configuration Manager** option. Environment variables and a number of MineScape 5.0 configuration settings can be set and modified through the **Configuration** form.

The **Configuration** form consists of the following key sections:

- Modules
- Explorer
- Plug-ins
- Projects
- MineScape

Modules

The **Modules** section provides access to settings that control the module configuration. The **Modules** section can be used to:

- allow batch purging on startup
- set a default log file
- set the module limit

The **Modules** section replaces the menu options under the **Monitor** menu of the MineScape 4 **Monitor Page**.

Explorer

The **Explorer** section provides access to settings that control the behaviour of the **MineScape Explorer**. The **Explorer** section allows you to control search pattern history and the time needed to refresh search lists after entering a search pattern.

Plug-ins

The **Plug-in** section provides access to settings that control MineScape CAD keyboard mappings. The **Plug-in** section also controls how new elements appear within CAD and what feedback is presented when drawing new elements.

Projects

The **Projects** section provides access to settings that control how many projects are listed under the **File » Recent Project(s)** menu.

MineScape

The **MineScape** section provides access to settings that control the MineScape environment. The **MineScape** section can be used to control environment settings, status bar options, coordinate geometry order, CAD rotation and cursor prompts.

Note: Press the **F1** key while the **Configuration** form is displayed for complete documentation on the configuration manager and settings.

MineScape 5.0 Navigation Bar

A significant new feature to MineScape 5.0, the **Navigation Bar** allows you to easily access MineScape projects, all project files and manage processes and saved sessions. The **Navigation Bar** will allow you to quickly access and manage MineScape projects and data.

The **Navigation Bar** consists of the following key sections:

- Projects
- Explorer
- Modules
- Sessions

Projects

The **Projects** section provides access to existing MineScape projects.

To select a project to work in;

1. Left-click on the **Projects** section.
2. Double-click on a project name.

A different project can be loaded within the same MineScape session. As a result, you will no longer need to exit the current MineScape session to open another project. The project that is currently open will be closed before loading the next project.

New features include:

- Support for single and two-tiered project structures.
- Frequently used projects can be listed separately in a **Favourite Projects** area.

- Project properties, such as units, project origin, quadrant, project path and description can now be through drop-down menus.
- A customisation folder (MIN_SITE) can be set for each project.

Explorer

The **MineScape Explorer** has been significantly improved to streamline user workflows.

New features include:

- A right-click menu replaces the **MineScape Explorer** button bank that was used in MineScape 4. Options relating to file maintenance and processing are now available via the right-click menu. The menu is displayed by right-clicking on a data item or folder within the MineScape Explorer.
- Microsoft Vista-style dynamic search and filtering functions to quickly and easily find data.
- Breadcrumb feedback to instantly determine your location within a project.
- Breadcrumb feedback to instantly determine your location in the project.
- New design file layer controls and icons that indicate the write and/or display status.
- New triangle file set controls and icons that indicate the write and/or display status.
- Enhanced drag and drop capabilities to open project files.
- Data can be dragged and dropped into the CAD window. A new reference will be added and the selected data is displayed through the CAD window.

Modules

The **Modules** section replaces the **Monitor Page** used in MineScape 4. The Modules section allows you to monitor and manage MineScape processes.

New features include:

- Redesigned icons to identify and filter each process type and status.
- A right-click menu allows users to alter the state of selected batches in the module list. The right-click menu can also be used to rerun a selected batch or generate a report. The menu is displayed by right-clicking on a batch name.

Sessions

The **Sessions** section replaces MineScape 4 Page specifications. A session is a saved configuration of MineScape within a project.

A session will save the following information:

- The current write design file and layer.
- The currently displayed layers.
- All reference graphics.
- The view orientation.
- All applied clipping planes.
- All coordinate geometry settings.
- All windows.
- Visual overrides.

Sessions allow you to easily return MineScape 5.0 to a saved configuration without having to repeat specific set up steps.

MineScape 5.0 User Experience

MineScape 5.0 has been designed to follow the Microsoft Windows Vista user experience. The new user interface will provide you with a familiar Microsoft Windows interface. Menus, forms, toolbars and key mappings now follow the standard Windows Vista convention.

Toolbar Customisation

The default MineScape toolbars can be customised and custom toolbars can also be created. Toolbars can be docked onto the product or left floating and positioned around the MineScape 5.0 interface. Toolbar customisations, such as toolbar options and toolbar positions, can be saved and maintained across multiple MineScape sessions.

Menu Functions

Menus within MineScape 5.0 will be familiar to existing MineScape users as well as intuitive to new users. MineScape 5.0 menus can be torn away from their default location and moved around the MineScape 5.0 interface. Menus can also be used to create custom toolbars.

All menu options are now listed in task order.

File and Windows Menus

The **File** menu has been added to MineScape 5.0 and replaces the **Page** menu, which contained project administration functions. The **File** menu in MineScape 5.0 is where users can load other MineScape products, as well as set project configuration settings and preferences.

The **Windows** menu has been added to MineScape 5.0. The **Windows** menu allows you to set preferences and control MineScape window layouts and behaviour. MineScape 5.0 windows can be displayed using a tabbed window style or a MDI window style. Windows can also be tiled horizontally or vertically, as well as pinned or hidden from view.

Keyboard Shortcut Keys

MineScape 5.0 uses the Microsoft Windows standard and methods for customising keyboard shortcut keys. Keyboard shortcuts can be assigned to MineScape menu and toolbar options. Keyboard shortcuts can also be assigned to common CAD functions.

Keyboard shortcuts are also known as *shortcut keys* or *hotkeys*.

Table Editor

The Table Editor within MineScape 5.0 has been redesigned to include functionality that allows you to easily edit and understand your table data. New functions allow you to easily categorise, find, replace and sort data. Interoperability with Microsoft Excel has been improved allowing users to easily and instantly transfer data between data formats.

MineScape 5.0 CAD

The MineScape 5.0 CAD engine has been redesigned to use the latest Microsoft DirectX technology resulting in significantly improved CAD performance and graphics.

The time required to load graphical data into MineScape CAD has been decreased by 60% and adding a new layer has been decreased by 90%. CAD response times have also been significantly improved to provide instant response to panning and rotation of large data sets.

The new improvements in MineScape 5.0 CAD will speed up user workflow.

CAD Menus

MineScape 5.0 CAD menus have been improved to allow you to access CAD commands using a new context-sensitive CAD menu system. MineScape 5.0 CAD contains a context-sensitive menu that presents a function appropriate menu that is based on the mouse cursor's location over an element component.

The menus will be able to distinguish what component (vertex or segment) of the element that the mouse cursor is positioned over and will display the appropriate commands. MineScape 5.0 CAD will also allow you to preview a command before executing it. This will allow modifications to be viewed before running a command; thereby, reducing the chance of user error and rework.

A CAD menu item can be added to any existing MineScape 5.0 toolbar.

CAD Drawing

Coordinate Geometry (COGO) functions are now easier to locate and use when creating precise designs and drawings. COGO function settings are now also saved and can be restored between MineScape 5.0 sessions. COGO functions can be accessed easily and quickly by typing in the coordinates, distance, deltas and angles while drawing.

MineScape 5.0 includes improved drag and drop functionality and provides feedback at the mouse cursor.

Layer Management

MineScape 5.0 provides a more intuitive interface for displaying and managing graphics layers. Layer control can be performed through the **MineScape Explorer** or through the **Layer Manager**.

Multi Monitor Support

MineScape 5.0 has been specifically designed to take advantage of dual monitors. MineScape 5.0 graphics and CAD command toolbars can be easily separated onto to a second monitor providing full screen graphics capability.

MineScape 5.0 Plotting

Plotting within MineScape 5.0 has been redesigned to provide a more intuitive interface for creating plots and plotting templates.

Some of the new features in IMSMS> 5.0 include:

- Textures within plots are now supported.
- Plots are no longer static in nature and do not need to be regenerated once changes have been made.
- Plot files and templates can be previewed before being printed or after making changes.
- Plot files can be sent to a printer or exported to an XPS file (XML Paper Specification).
- Full WYSIWYG (What You See Is What You Get) support.
- Plot settings and properties, such as default paper sizes and margins, can be configured.

- Plot files and templates support standard plot elements, such as North arrows and scale bars.

MineScape 5.0 plot files are accessed through the **Plotting » Plots** folder under the **MineScape Explorer**. New plots and templates can be accessed and created using the new **Plotting** and **Viewport** toolbars.

Note: Additional features are planned for upcoming MineScape 5.# releases.

MineScape 5.0 License Manager

Software licensing within MineScape 5.0 is controlled through the Flextera FlexNet license management system. MineScape license management allows MineScape 5.0 customers to configure their software licensing based on their usage requirements.

MineScape licenses can be managed from a central server and single licenses can be managed from individual workstations. Customers can also implement a combination of single and centrally managed licenses. MineScape licenses can also be borrowed from a central server. A MineScape license can be borrowed for a maximum period of 6 months.

Refer to the **MineScape License Management Guide** for more information on installing and managing a license server.

Geostatistics

MineScape 5.0 delivers a new Geostatistics product. The Geostatistics product is specifically designed for coal quality and uses a step-by-step wizard interface to guide users through a complete geostatistical study.

Features of the new Geostatistics product include:

- Classical statistics
- Variography
- Kriging
- Integration with Stratmodel Quality
- Histograms
- QQ plots
- Variogram contours

Open Cut Planning - Short Term Mine Design

The Open Cut Planning module MineScape 5.0 includes updated functionality that has been designed especially for short to mid-term planning.

The short term planning tool has been designed to consolidate the functionally rich Open Cut planning tools in an effort to improve the short term design process. Design layout, projections, triangle surfaces and cut and fill volumes can now be quickly and easily produced.

Bench to bench ramp design is also included. This allows users to easily design the ramp and balance the cut fill volumes.