শিদ্দ PETROSYS

SOFTWARE RELEASE NOTES

Version 2021.1.1

PETROSYS PRO







Connectivity

Mapping & Visualisation

Surface Modeling

Petrosys PRO 2021.1.1 takes connectivity to the next level with the addition of the new ArcGIS Pro add-in.

Building on the strong collection of innovative and improved features in the PRO 2020 series across Connectivity, Mapping and Surface Modeling, Petrosys PRO 2021.1.1 delivers the latest functionality whilst the enhanced development of existing features continues to add value to provide our clients software investment.

Next Level Connectivity

• The key highlight of Petrosys PRO 2021.1.1 is the ArcGIS Pro Add-In with advanced connectivity enabling the direct display of subsurface data directly from E&P software.

Licensing updates:

• PRO 2021.1 requires a new license file to be installed.

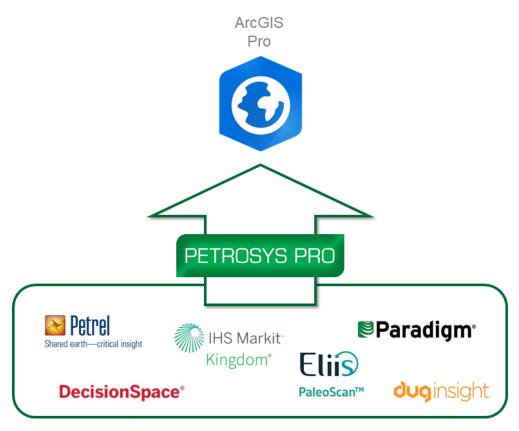
Supported Environment updates of note:

• Linux platforms RHEL7 and RHEL8 are supported, RHEL6 is no longer supported.

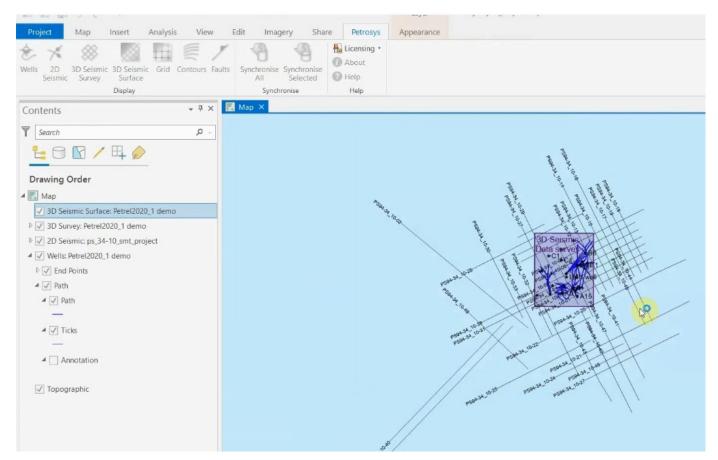
Read on for more details on these options with more to follow in the 2021 stream. For more information on how to put these features into practice please contact support at support@petrosys.com.au and learn more from our webinars, video and portal resources.

ArcGIS Pro Add-In

The new Petrosys add-in allows users to directly display subsurface data inside ArcGIS Pro from their chosen E&P source.



- Display wells, well paths, seismic navigation and surfaces, grids, contours, fault polygons directly within in ArcGIS Pro.
- Connect to subsurface and interpretation data from multiple sources.
- All data source vendors supported in Petrosys PRO are supported in ArcGIS Pro; Petrel, DecisionSpace, Paradigm, IHS Kingdom, SeisWare, etc.



- Control the display style and publish to Portal as part of ArcGIS Pro workflow.
- Use data in different or customised Coordinate Reference Systems.
- Query object names and other attributes.
- Contours are dynamically computed from the selected surfaces and grids. The Faults and contours are displayed along with the grid to generate a geologically accurate relationship.
- Synchronise, update, and finalise your map. Use the synchronisation buttons to update the display when changes have been made within your interpretation system.
- ArcGIS Pro versions 2.5 to 2.8 are supported.

Notes for Upgraders and Installers of Applications

Upgraders from Petrosys PRO 2020 should be aware of the following changes:

- Support for Red Hat Enterprise Linux 6 (RHEL6) has been ceased.
- Petrosys PRO supports Red Hat Enterprise Linux 7 and 8 (RHEL7 and RHEL8) and equivalents (CentOS, Oracle Linux).
- Petrosys PRO 2021 requires a new license file. Please obtain your license file by logging on to the Petrosys Client Portal or contacting Petrosys Support.

For a full list of supported environments, please see the Petrosys PRO Supported Environments webpage.

Detailed Release Notes Summary PRO 2021.1.1

Enhancements

Connections, Import and Export - Esri
Petrosys Arc GIS Pro Add-In supports ArcGIS Pro 2.8
Mapping - GIS, Spatial and Culture
Performance of the Display/GIS dialog has been improved for sources with a large number of feature classes

6 entries

Detailed Release Notes Summary PRO 2021.1.1

Bug Fixes

Application - ArcGIS Pro Add-In <u>79044</u> Better support multiple versions of Petrosys PRO installed Configuration - Licensing <u>79397</u> RepriseLM - Fixed crash when timezone not valid for license Connections, Import and Export - Paradigm-Epos <u>79343</u> A Paradigm connection failure on certain Windows systems has been fixed Mapping - GIS, Spatial and Culture <u>79275</u> Display/GIS no longer issues incorrect error message for CRSs with custom authority names Surface Modeling - Contouring <u>79056</u> Contouring application stability improved Surface Modeling - Exchange <u>79284</u> No duplicated log curve mnemonics appear in log curve list

Petrosys Release PRO 2021.1.1

Application - ArcGIS Pro Add-In

Detailed Release Notes

Better support multiple versions of Petrosys PRO installed

The Petrosys ArcGIS Pro Add-In has been refactored so more of the components that are supplied by the Petrosys PRO install are loaded from the PRO install location. This better supports situations where more than one Petrosys PRO version is installed, especially in uninstall scenarios.

Configuration - Licensing

RepriseLM - Fixed crash when timezone not valid for license 79397

A crash has been fixed when a timezone error occured with RepriseLM licensing set.

Connections, Import and Export - Esri Enhancements

Petrosys Arc GIS Pro Add-In supports ArcGIS Pro 2.878948

Petrosys PRO 2021.1.1 adds support for ArcGIS PRO 2.8.

Connections, Import and Export - Paradigm-EposBug Fixes

A Paradigm connection failure on certain Windows systems has been fixed

79343

On some Windows systems the Paradigm connection would fail to start with a DLL error. This has now been fixed.

Mapping - GIS, Spatial and Culture Enhancements

Performance of the Display/GIS dialog has been improved for sources with a large number of feature classes 79333

The performance of the /Display/GIS.. dialog has been improved for data sources that have a large number (thousands) of feature classes.

Mapping - GIS, Spatial and Culture

Display/GIS no longer issues incorrect error message for CRSs with custom 79275 authority names

Petrosys PRO 2020.1 introduced a problem where an incorrect error message was shown from Display/GIS when attempting to use a CRS with an authority code specified that was other than "EPSG".

Bua Fixes

Bug Fixes

79044

Bug Fixes

Surface Modeling - Contouring

Contouring application stability improved

A rare crash during contouring of grids has been fixed.

Surface Modeling - Exchange

No duplicated log curve mnemonics appear in log curve list 79284

In previous versions in Well Log exchange there could be duplicated well log curve mnemonics appearing in the step of selecting log curves. This has now been fixed.

Bug Fixes

Bug Fixes

79056

12 entries

Detailed Release Notes Summary PRO 2021.1

Enhancements

Application - ArcGIS Pro Add-In <u>69870</u> Display Petrosys and 3rd party Geoscience data in ArcGIS Pro Application - General <u>76650</u> Red Hat Enterprise Linux 6 no longer supported Application - Printing and Publication Export/PDF option in Mapping now has append mode <u>42040</u> Configuration - Licensing <u>78964</u> New license file required to run Petrosys PRO 2021.1 Connections, Import and Export - Interactive Correlations (IC) <u>79204</u> Renamed 'ODM' to 'IC' throughout application Connections, Import and Export - Petrel 78993 Petrel 2015 no longer supported <u>78248</u> Petrel 2021.1 supported Mapping - GIS, Spatial and Culture <u>79130</u> Import of Generic Mapping Tool's CPT colour gradients supported Project Management - Project Selector 78265 Project selector usernames now use case-insensitive matching Surface Modeling - Gridding 79115 Option 'model sticks surfaces' was added for fault sticks gridding 78376 Sample density gridding method performance has been improved significantly

Surface Modeling - Workflows/Scripting

78604 Improvements to workflow scripting

Detailed Release Notes Summary PRO 2021.1

Bug Fixes

Application - Printing and Publication 79100 Export to PDF - International characters supported in filename and path Application - User Interface 78547 Embedded browser will always display on screen 78622 Crash when closing dialog immediately after display resolved <u>78347</u> Embedded browser on Remote Desktop to displays with 16 bit colour depth now supported Connections, Import and Export - Esri <u>79058</u> SDE: Fixed connection issue when running Mapping for a second time, without stored username and password Connections, Import and Export - GeoFrame <u>79126</u> Added support for GeoFrame wells with depth units of inches and 0.1 inches Connections, Import and Export - OpenWorks 78934 Added support for OpenWorks R5000.10.7 Connections, Import and Export - Petrel <u>78153</u> Well header information is now displayed correctly for Petrel wells when using data cache Coordinate Reference Systems <u>79004</u> CRS selectors fixed in CRS/Point conversion and Excel/Text display dbMap - Client <u>78977</u> Performance improvements for dbMap PPDM3.8 2D Seismic line coordinates Mapping - General 78976 Cancel button on progress note in status bar now works Mapping - GIS, Spatial and Culture <u>78686</u> Display/GIS - Filter now allows attribute names with embedded spaces Mapping - Grids, Surfaces and Sampled Data Files <u>77973</u> Sampling for histogram generation is now faster when few grid nodes Mapping - Wells <u>78846</u> Well log signature from Petrel now shows correct units when unit overridden in Petrel template Surface Modeling - Gridding

79021 Reading of Petrel fault sticks surfaces with no data improved

77271 New option to detect more fault sticks in fault sticks gridding

Petrosys Release PRO 2021.1

Detailed Release Notes

Application - ArcGIS Pro Add-In Enhancements

Display Petrosys and 3rd party Geoscience data in ArcGIS Pro 69870

The new Petrosys Add-In allows users to directly display subsurface data inside ArcGIS Pro from their chosen E&P source.

Features:

- > Display wells, well paths, seismic navigation and surfaces, grids, contours, fault polygons directly within in ArcGIS Pro.
- > Connect to subsurface and interpretation data from multiple sources.
- All data source vendors supported in Petrosys PRO are supported in ArcGIS Pro; Petrel, DecisionSpace, Paradigm, IHS Kingdom, SeisWare, etc
- > Control the display style and publish to Portal as part of ArcGIS Pro workflow.
- > Use data in different or customised Coordinate Reference Systems.
- > Query object names and other attributes.
- Contours are dynamically computed from the selected surfaces and grids. The Faults and contours are displayed along with the grid to generate a geologically accurate relationship.
- Synchronise, update, and finalise your map. Use the synchronisation buttons to update the display when changes have been made within your interpretation system.

The Add-In will automatically be installed if a compatible version of Esri ArcGIS Pro is installed on the same system when Petrosys PRO 2021.1 is installed.

Application - General

Enhancements

Red Hat Enterprise Linux 6 no longer supported 76650

PRO 2021.1 no longer support RedHat Enterprise Linux 6. The supported platforms are RedHat Enterprise Linux 7 and RedHat Enterprise Linux 8.

Application - Printing and Publication Enhancements

Export/PDF option in Mapping now has append mode⁴²⁰⁴⁰

The /Export/PDF option in Mapping now allows appending to an existing PDF file.

Application - Printing and Publication Bug Fixes

Export to PDF - International characters supported in filename and path

79100

On Windows, PDF export from Mapping now supports international characters in the folder path and the filename itself. Previously you would see error xp:312.

Application - User Interface

Bug Fixes

Bug Fixes

Embedded browser will always display on screen 78547

In some cases, the embedded browser could be displayed either partially or completely off screen. This has now been fixed.

Crash when closing dialog immediately after display resolved 78622

A crash that could occur when closing a dialog immediately after it was displayed has been fixed.

Embedded browser on Remote Desktop to displays with 16 bit colour depth now supported 78347

Previously, if the embedded browser was used when connected via Remote Desktop to a host with 16 bit colour depth, the embedded browser would display a black window rather than expected content. This has now been resolved.

Configuration - Licensing Enhancements

New license file required to run Petrosys PRO 2021.178964

Petrosys PRO 2021 requires a new license file. Please obtain your license file by logging on to the Petrosys Client Portal or contacting Petrosys Support.

Connections, Import and Export - Esri

SDE: Fixed connection issue when running Mapping for a second time, without stored username and password 79058

An issue with connecting to SDE when running Mapping a second time and using the new "PsSde" connection method with username/password saving disabled has been fixed.

Connections, Import and Export - GeoFrame Bug Fixes

Added support for GeoFrame wells with depth units of inches and 0.1 inches 79126

Wells with depth units of inches or 0.1 inches are now supported and values are converted to feet for display.

<u>Connections, Import and Export - Interactive Correlations (IC)</u> <u>Enhancements</u>

Renamed 'ODM' to 'IC' throughout application 79204

Due to the Oilfield Data Manager being renamed Interactive Correlations, references to ODM have been changed to IC in Petrosys PRO.

Connections, Import and Export - OpenWorksBug Fixes

Added support for OpenWorks R5000.10.7

Connections to OpenWorks R5000.10.7 are now supported.

Connections, Import and Export - Petrel Enhancements

Petrel 2015 no longer supported

Petrel 2015 is no longer supported in Petrosys PRO 2021.1+. Support for Petrel 2016 through Petrel 2021 remains.

Petrel 2021.1 supported

Petrosys connectivity to Schlumberger's Petrel now supports direct interaction with Petrel 2021.1.

Support for Petrel 2021.1 includes the ability to:

- Drag and drop data from Petrel into Petrosys PRO
- Import Model grid horizons and 3D seismic interpretation horizons to a Petrosys grid file
- Import faults from Model grids to a Petrosys fault file
- Import 2D and 3D seismic navigation and horizon interpretation data to a Petrosys SDF
- Directly display Structural framework horizons, Model grid horizons, Input surface grids and 3D seismic interpretation horizons in Mapping
- > Directly contour Structural framework horizons, Model grid horizon data and Input surface grids in Surface Modeling
- Directly grid 2D and 3D seismic horizon interpretation data in Surface Modeling
- > Directly display, grid and import well data.
- Directly display 2D seismic navigation and horizon interpretation in Mapping
- Directly display 3D seismic bin grids in Mapping
- > Directly display Structural Model fault surfaces in 3DViewer
- Directly display fault sticks in 3DViewer
- Export Petrosys and other third party grids to Petrel

Petrosys PRO continues to maintain support for connections to Petrel 2016.1 through 2020.x.

Connections, Import and Export - Petrel

Well header information is now displayed correctly for Petrel wells when using data cache 78153

When data caching was turned on, Petrel well header data would not be displayed in the Mapping Well header dialog. This has now been fixed.

Coordinate Reference Systems

CRS selectors fixed in CRS/Point conversion and Excel/Text display

The CRS selectors in the "CRS/Point Conversion.." tool and in /Display/GIS for certain sources was broken on 2020.2.3. The CRS selection list had only the 'Unknown' and 'Local Lon-Lat' datums. This has now been fixed.

Bug Fixes

Bug Fixes

78248

78993

78934

dbMap - Client

Performance improvements for dbMap PPDM3.8 2D Seismic line coordinates

The performance of reading 2D seismic line coordinates from dbMap databases for PPDM3.8 clients has been significantly improved. For example, Display/2D seismic lines is now up to 6 times faster, depending on how many lines are displayed.

Mapping - General

Cancel button on progress note in status bar now works 78976

There was a bug in previous version where some redraws in Mapping could not be cancelled by clicking on the stop icon in the status bar. This has now been fixed.

Mapping - GIS, Spatial and Culture Enhancements

Import of Generic Mapping Tool's CPT colour gradients supported 79130

Color palette files (*.cpt) from Generic Mapping Tools are now supported for import from the Gradient Editor in Mapping via the /File/Import/Generic Mapping Tools (GMT) Color Palette Table (*.cpt)... menu option.

A selection of cpt files are available from <u>http://soliton.vm.bytemark.co.uk/pub/cpt-city/views/totp-cpt.html</u>

Mapping - GIS, Spatial and Culture

Display/GIS - Filter now allows attribute names with embedded spaces

78686

The /Display/GIS option now allows filtering of attribute names that have embedded spaces. Previously you would get a "SQL Expression Parsing Error"

Mapping - Grids, Surfaces and Sampled Data FilesBug Fixes

Sampling for histogram generation is now faster when few grid nodes

77973

Bug Fixes

Display Grid with sparse data now is fast in generating histogram data for colour equalization.

Mapping - Wells

Well log signature from Petrel now shows correct units when unit overridden in Petrel template 78846

When displaying well log signature maps from Petrel and the Petrel log curve template has a user-overridden display unit, that unit is now used to display log curves in Mapping.

Bug Fixes



Bug Fixes

Project selector usernames now use case-insensitive matching

Usernames entered in the Project Selector administration users list are now matched against system usernames using caseinsensitive matching. This simplifies systems where usernames have been created using inconsistent casing rules.

78265

Note: on systems where usernames are case sensitive (e.g. Linux) it is possible for two distinct users to match a single entry, however, in practice, such situations are considered unlikely.

Surface Modeling - Gridding Enhancements

Option 'model sticks surfaces' was added for fault sticks gridding 79115

A new option 'Model sticks surfaces' has been added to re-generate vertically aligned fault sticks which are then used in fault sticks gridding.

Sample density gridding method performance has been improved significantly 78376

Bug Fixes

78604

Sample density gridding method performance has been significantly improved.

Surface Modeling - Gridding

Reading of Petrel fault sticks surfaces with no data improved 79021

Petrel fault stick surfaces with no data are handled correctly without any extreme delays to running workflows.

New option to detect more fault sticks in fault sticks gridding 77271

A new option 'Search fault contacts in every gridding pass' has been added to capture more fault stick contacts with the grid surface during fault sticks gridding.

Surface Modeling - Workflows/Scripting Enhancements

Improvements to workflow scripting

Some improvement in scripting:

- > Allow at most three contour increments to be scripted for layer Display/Grid (Contours) in Tools/DrawMap.
- > Allow scripting of the 'Equalize' checkbox' in colour gradient in Tools/DrawMap.
- > Added ability to use search/replace across multiple scripted parameters in a task on scripting parameters panel.
- > Added Tools/Clear-History to clear current text log area to allow easier identification of start of next run.