Version notes

1.51a01

Corechopper function has been added.

1.50a05

OC checks have been revised.

When loading data from XL there is a new facility to search the spreadsheet and create a loader.

A number of revisions in experiment calculations for rel. perms.

1.50

General:

You can now batch!oad XL spreadsheets. Go to "Load data from XL" and click the ico_2cols tool bar icon, or from the main menu choose "File | Import/export | From multiple XL with templates".

Where experiments use composite plugs (relative permeability, for example) the composite plug details can be retrieved from the spreadsheet and stored in the database. Details can be viewed in "<a href="Data ID". A new button on the same dialog lets you recalculate void ratio, RQI and FZI. Click here to discover why you want to do this.

Use the ico_copy icon (at the top of the toolbar on the right of the main dialog) to copy the current plot to the windows clipboard. In any conforming application (XL, Powerpoint etc) use ctrl-v or paste to insert the plot.

To insert a table (for example, a group properties list) highlight the table by clicking the top left cell (all the cells are go dark), press ctrl-c and, in the application, press ctrl-v. Where it is present, the "Send to XL" toolbar icon ico_toxl in a dialog will open a blank Excel workbook and populate it with the table contents.

A new section QC checks allows you to make basic QC checks on loaded data, or on one or more spreadsheet templates.

In capillary pressure:

Winland R35 calculations: you can now specify a percentile that is not 35.

In relative permeability

'Hagoort calculations are revised - feedback very welcome.

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In NMR -

A number of changes, many cosmetic.

You can phase rotate quadrature signals if you have the data.

You can derive <u>capillary pressure</u> from the T2 distribution.

Decay spectrum deconvolution is introduced, analogous to pore systems for MICP.

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1.42b

General tidying up and bug fixing.

1.42a

Geomechanical tests are now enabled.

There is a new experiment type "Conventional". This is for manipulation (currently just plotting, but is to expanded for the next version). If you want to go back to a particular experiment type, click "Back" from the "Conventional" tasks menu and choose the required experiment. In a similar way go from a particular experiment to the conventional.

Several major improvements in group properties plots - plots from the ico_xplot icon.

Statistical analysis is enabled.

1.41b

General

Writing back ("Export") to templates has been improved. You can export a group to a workbook, each sample/experiment comes out on its own tab. (Note: not all results are written, and we will implement group properties export next).

NMR

Now handles x/y (or real/imaginary) input data pairs, and these can be phase rotated. (This should not be necessary, but phase rotation plots are a good QC).

There is now a permeability estimator.

Cap. pressure

You can make type samples based on classification sets (and soon sub-groups).

Relative permeability

You can make type samples based on classification sets (and soon sub-groups).

You can make JBN calculations on centrifuge data.

1.41

General

You can show sample depths in the sample tree list. Go to Environment | Preferences and check the appropriate box in the "General" category.

Right clicking plot axes allows access to scale changes, and a quick change of unit (in most experiments). Right clicking in the plot allows samples to be set used/not used, and to show an image (if any).

A bug which caused the wrong sample to be highlighted when ordering the tree by experiment type has been fixed.

A bug when annotating a project (new project or project properties) caused the software extreme grief. It has been fixed.

We have added a version number to the templates/loaders. This will allow for future changes without prejudicing the loading process.

Some misprints in the dialogs have been repaired.

The "Full" button on the experiment ID tab now always works.

Any number of minor bug fixes/improvements.

Cap. pressure

Closure correction: you can draw both derivative lines - $\delta \log P/\delta Snw$ and $\delta Snw/\delta \log P$. You can also estimate closure by the intersection of two lines, one drawn or regressed in the closure portion, and the other drawn or regressed in the pore system area.

Centrifuge calculations have been revised and improved (possibly room for further improvement). On this dialog you can now make bond number calculations, and plot bond number vs. rotational speed and Sw vs. bond number.

Stress correction: it now plots properly.

Extrapolation: you can now choose the "valid" points graphically (i.e. by drawing a box).

Imbibition data now plots with negative pressures.

HFU plots: the FZI histogram now plots on a log scale properly.

The probability scale when showing pore size distribution is now enabled properly

Relative permeability

Corey refinement refined further. The dialog now shows the original values.

Corey curves plot correctly post normalisation.

For centrifuge tests you can make JBN estimates (provisional).

NMR

SNR is recorded from the template, but can be recalculated (along with root mean square noise and standard error) on the ID experiment tab.

Porosity calibration has been added as a separate task.

(Phase rotation of quadrature signals will be added in the next version, along with a separate permeability estimator).

Wettability

The USBM calculation now uses (and the default plot shows) average Sw rather than face Sw.

1.38c8

Corey fits and normalisation display added to rel perms.

Several bug fixes in cap pressure. Drainage/imbibition shown correctly (or at least shown).

To see porous plate time based experiment data, choose "Porous plate data" from the "Data to plot" entry in the plot options dialog (single experiment display).

NMR basic functions enabled.

Loading samples (from the database) now has experiment fitters.

RI functions enabled and instantaneous n shown on single experiment plots.

"Preferences" dialog allows you to specify where your project files are kept.

1.38c6

A bug when loading samples from multiple wells has been fixed.

Brooks-Corey group fitting enabled.

Changes to group creation and deletion.

1.38c5

RI is re-enabled

Brooks-Corey fitting for single PC samples enabled.

PC group functions all enabled, and Brooks-Corey implemented.

KR normalisation implementation (first pass); Corey exponents in next version.

Creating/deleting/editing groups enabled (advanced queries excepted).

Experiment type filter in place when loading/choosing samples from the database.

XL loading of multiple experiments (e.g. PC and RI) from one worksheet is now possible

Any number of other bug fixes.

1.38c3

The hard link to an XL import spreadsheet has been removed.

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Rel. perm data column naming now agrees with the data dictionary.

Crash in Lambda fit slider control has been fixed.

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