

Update FAQ for 740_08/740_09

1. Where is the Visual Editor executable?

With this release the Visual Editor, the help files and libraries are in the MCNPX_2.7.0\Vised directory. It is no longer installed with the default installation of the MCNP5 executables. You need to copy this directory to your MCNP installation directory. The default location is C:\MCNP, so you should copy the vised directory into the c:\MCNP directory.

If you do not know where your MCNP directory is, go to a command prompt window, and type “set” and look for the DATAPATH environment variable. This will show the path to the cross sections (default is c:\MCNP\mcnp_data), place the vised directory at the same level as the mcnp_data directory (c:\MCNP\vised).

2. What are the different Visual Editor executables?

The RSICC release comes with 2 different executables:

VisedX_24E.exe is an executable that has all of the previous Visual Editor capabilities and is a significant upgrade from the previous version of the Visual Editor released from RSICC.

VisPLOTX_24E.exe is a plotting only executable. It only has the plotting capabilities of the Visual Editor including, 2D plots, 3D dynamic, 3D ray tracing, source plotting, particle track plotting and tally plotting. It has no creation or modification capabilities. If you only use the Visual Editor for visualizing your geometry, you are strongly encouraged to use this version of the Visual Editor.

Note on executables: Visual Editor executables are created by compiling the source Fortran code with the Visual Editor graphical user interface. All of MCNPX is contained within the Visual Editor executable, it will not run the MCNPX on your system.

This release does not have an MCNP5 executable or a LINUX executable. Work will instead focus on the creation of an MCNP6 Visual Editor executable.

3. Can the Visual Editor read runtpe files generated by MCNPX?

The Visual editor is compiled with the latest source code that was available from the beta site prior to sending the MCNPX package to RSICC. There are some minor modifications between this source code and the source code used to create the RSICC MCNPX executables.

Because of this the binary files generated by MCNPX 2.7.0 are not compatible with the Visual Editor and as such, runtpe files generated in MCNPX cannot be read by the Visual Editor. If you wish to make tally plots in the Visual Editor, it is recommended that you have MCNPX create a mctal (prdmp 2j 1) file which

can be read by the Visual Editor. You cannot make mesh tally plots superimposed on the geometry for runtpe files generated by MCNPX, since this can only be done with the runtpe file.

Note: Since the RSICC release, a Visual Editor has been created using the RSICC source code that can read MCNPX runtpe files (and do mesh tally plots), this executable is distributed in the Visual Editor workshops.

4. What is bertin file?

The bertin file is an auxiliary binary file that is used by MCNPX. Since it is binary it needs to be read by an executable that is compatible with its binary format. The default bertin file found on the CD in MCNP_DATA\Windows_installer is compatible with the I8 MCNXP executable, this is not compatible with the Visual Editor. If this bertin file is placed in the mcnp_data directory, the Visual Editor will die.

The best solution is to replace the default MCNPX executable and bertin files with the Win32_Seq executable and replace both the bertin and phtlib files in the mcnp_data directory with the files for this executable. This bertin file is also compatible with the Visual Editor, this eliminates the need to 2 bertin files.

In the RSICC release, the MCNPX executable and associated bertin and phtlib files can be found in the MCNPX_2.7.0\Executables\Win32_Seq.zip file.

If you are using MCNP, use the files in the MCNPX_2.7.0\Executables\Win32_MPI.zip file.

Note: I have not tried this solution on all platforms, please let me know if you have a configuration that is still causing the Visual Editor to die.

5. What are the material library files?

The material library files contain common materials. The neutron library is stndrd.n, the photon library is stndrd.p. The neutron library has been upgraded to include many of the materials specified in PNNL-15870 (compendium of Material Composition Data for Radiation Transport Modeling). The visual Editor is expecting to find these files in the vided directory specified in FAQ 1.

To verify that the Visual editor can find these files., go to data->materials and click on library.

The Visual Editor allows you to create your own libraries called usr.n for neutrons and usr.p for photons. These files are not in the distribution, but will be created the first time you save a material (using the store menu option).

Note: Although care has been taken in creating these material libraries, you need to verify their accuracy to make sure they are accurate and appropriate for you application. Email me if you find any problems with the database.

6. Where is the Visual Editor help file?

The Visual Editor can only access help if it is available in the current working directory. When initially starting the Visual Editor, this directory will typically be the directory the executable is in. When reading an input file, this directory is the directory the input file is in. You need to place the vised.chm and vised.chi files in the directory you are working in to access help.

If you double click on the vised.chm file, it will load the help in your internet browser. If you are having problems with accessing help in the Visual Editor, you should consider making a shortcut to this file and placing it on your desktop to allow you to directly access the Visual Editor help.

7. How does the Visual Editor access xsdir?

The Visual Editor finds xsdir in the same way that MCNPX finds xsdir.

By default the Visual Editor will use the DATAPATH variable just like MCNPX. If the Visual Editor cannot access xsdir, you may have a problem with your installation of the RSICC cross sections.

If you are having problems accessing xsdir in the Visual Editor, verify that you can access it outside the Visual Editor in MCNPX.

8. What is the vised.defaults file?

The vised.defaults is no longer used. All the files required by the Visual Editor can be accessed as described above.