The Version 4 release of the model includes the following:

The model files are found in 1 zipped file: **v4.zip**. There are the following subdirectories and files:

1. **Examples** – Model application examples include DeGray Reservoir, Spokane River, Spokane River (input files in csv format), Columbia Slough estuary, and a sediment diagenesis example.
2. **Executables** – The executables for the preprocessor and the model in this directory were compiled using Intel Fortran XE 13.1 compiler and have both 32- and 64-bit versions.
3. **W2ControlGUI** - The W2Control GUI was compiled using Visual Basic 6. The GUI directory also has an installation routine for W2Control. There is a "setup.exe" routine that installs the Visual Basic W2 V3.7 Model Preprocessor called W2CONTROL which is also compatible with the V4 model. Once installed, the GUI preprocessor is able to aid the model user in setting up the Control File and in evaluating and changing the bathymetry of the system. This preprocessor does not automatically set-up the bathymetry of the system, nor does it provide post-processing support. A lot of effort is required to properly set-up the model bathymetry prior to using the Bathymetry editor within W2Control. A user manual in pdf format is included in this directory. Also, a separate executable, W2Control, is provided in case an earlier version has already been installed. Note that this GUI is a part of the install routine for W2Tools now.
4. **W2Tools** – This is the new W2 post-processor by Dynamic Solutions-International, LLC (www.ds-international.biz). They have provided an installation routine that includes both the post-processor and the W2ControlGUI. When the user selects W2L output (the old VPL output), the resulting post-processing file is used by W2Tool for all post-processing tasks that include contour plots, animations, profile plots and time series plots. A brief user manual is included showing many of the features of this post-processor as well as a directory that shows how to take field data and plot field data and model results in the post-processor. There is a zip file with an example from DeGray reservoir on how to include model predictions versus field data for reservoir profiles.
5. **Source** – This directory contains the source code for the preprocessor and model written in Fortran. The compiler settings and files necessary to compile using the Intel compiler are also included using the Intel Fortran compiler. Generally, we use the following compiler settings: /O2 [maximum speed in Intel] and default real is double precision. Also, for the following subroutines we had to use /O1 optimization: init-cond.f90 and init-u-elws.f90. For the preprocessor, the windows source code is compiled using a QuickWin application rather than a console application. We use the debug version for the released executable. The generic preprocessor code should work compiled as a console application.
6. **Waterbalance** – This is the windows waterbalance utility that is described in the user manual. The purpose of this code is to approximate the waterbalance for a reservoir or lake by computing flows (positive and negative) that will allow the model predicted water level to agree to water level data for a reservoir.
7. **Excel macro utility for writing files in W2 format from Excel -** This directory contains an Excel macro that aids in writing our CE-QUAL-W2 compatible files from within Excel. There is a short user manual describing how to use the macro. This macro was developed by Jeffrey Gregory, Civil Engineer, USACE, Nashville District.
8. **W2V3 manual4_rev7.pdf** - User Manual in searchable pdf format.
9. **W2_Version_4_Release_Notes.pdf** – Release notes in pdf with sections on how to run the model for the first time, lists of bug fixes and enhancements and differences between model versions format.
10. **USGS Documentation for the Auto Port Selection Algorithm** – Technical report for the new USGS algorithm for auto port selection.
11. **USGS Model examples for the Auto Port Selection** – 4 example problems using the USGS algorithm for auto port selection
12. **Sediment diagenesis documentation** – reports and documents explaining the sediment diagenesis model in Version 4.

#	File	Comments	Last Updated
1			

	Version 3.72 Download	Registration Page and Download (Model, Preprocessor, Example files, User's Manual, Release Notes, Graphical User Interface, Water Balance Utility, W2tools post-processor), USGS Auto Port Documentation and Examples	May 21, 2015
2	Version 3.71 Download	Registration Page and Download (Model, Preprocessor, Example files, User's Manual, Release Notes, Graphical User Interface, Water Balance Utility, W2tools post-processor)	April 9, 2015
3	Version 4.0 download	Registration page and download of source code, model release notes, executable, User Manual, documentation, example problems and reports. Note this is a stable and well-tested release.	November 18, 2016
4	Version 3.6 Download	Registration Page and Download (Model, Preprocessor, Example files, User's Manual, Release Notes, Graphical User Interface, Water Balance Utility)	February 10, 2012
5	Release notes for Version 3.6	PDF file	February 10, 2012
6	Legacy Model Version 3.5	No Longer Supported	December 16, 2007
7	Legacy Model (Version 3.1 and 3.2)	No Longer Supported	August 27, 2007
8	Model Information	Information on the W2 Model	
9	Version 2.0 Manual	No Longer Supported	January 11, 2006