


Loading a CVLGrid Grid into EFDC_Explorer to Create a New EFDC Model

CVLGrid is 2D grid generation software developed by DSI for use with curvilinear orthogonal models, and in particular for use with EFDCPlus/EFDC_DSI, EFDC_SGZ, EFDC_EPA, and EFDC_Hydro models. As all EFDC models require 2D curvilinear orthogonal grids this tool has been developed to meet this need for DSI and our clients and customers. It has been further optimized for use with the EFDCPlus/EFDC_Explorer Modeling System. CVLGrid can be used to refine and modify existing grids and if the I, J map is not changed then model can be loaded back into EE without needing to update the boundary conditions settings.

Importing the CVLGrid

In EE main form, the user should click *New Model* button (), and the *Cartesian Grid Generator* form will appear as shown in Figure 1. Select *Import Grid from File* option then click *Import Grids* button. The *Import Grid* form will appear, in this form, select *CVLGrid* from drop-down list for the *Grid Type*, then click *Browse* button as shown in Figure 1 to browse to the CVLGrid grid file. If the user wants to import multiple grids at the same time, the *Multiple Grid Files* box needs checked before clicking *Browse* button.

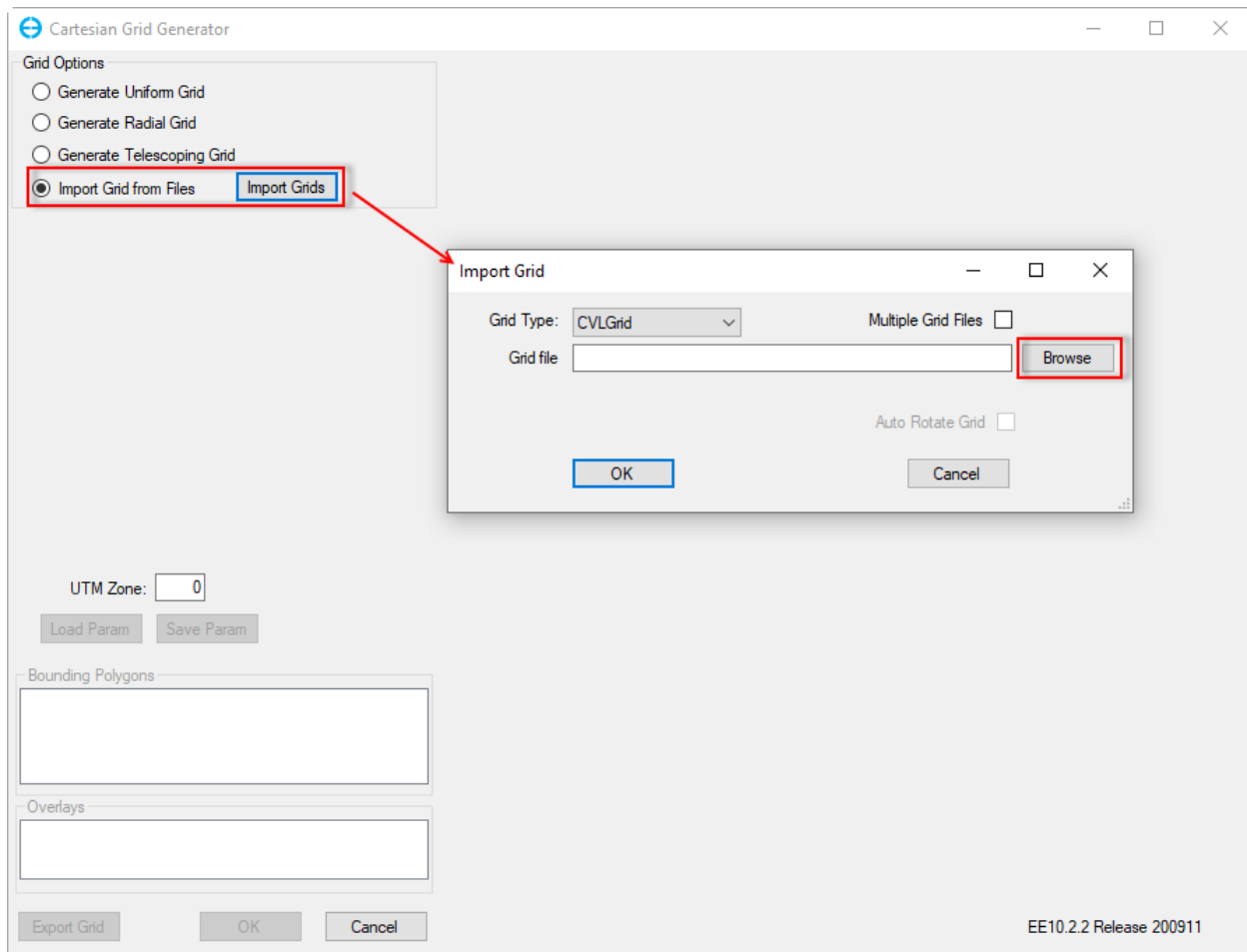


Figure 1 Cartesian Grid Generator form.

After clicking the *Browse* button, the *Open* form will appear to allow the user to select CVLGrid grid file. A CVLGrid grid file has extension .CVL. CVLGrid project files, which CVLGrid uses to save the splines, overlays and background maps, has the extension .CVP. EE only opens .CVL extension files. Click the *Open* button as shown in Figure 2.

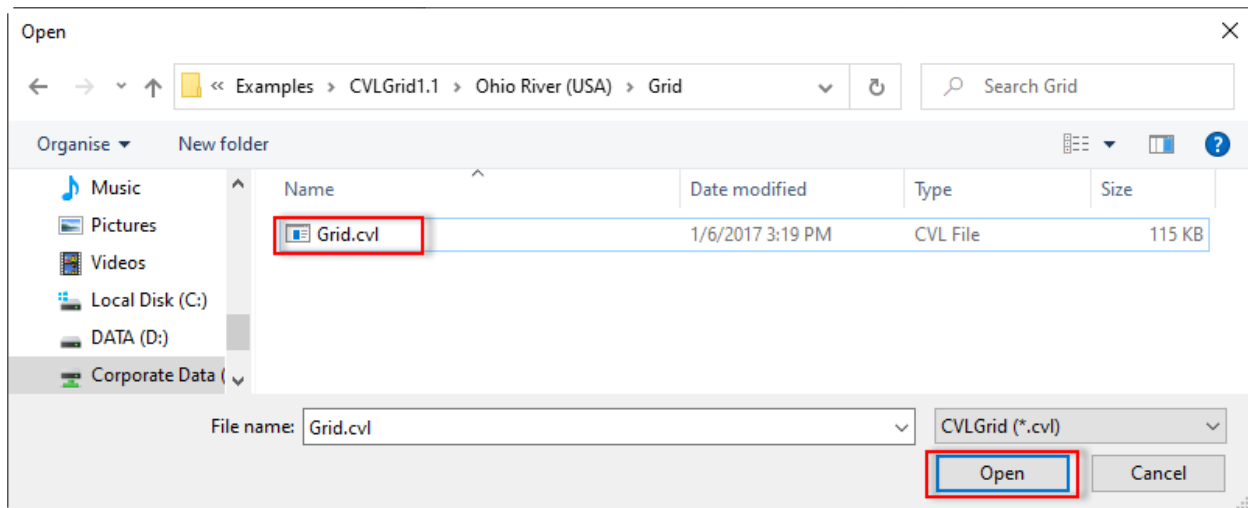


Figure 2 Open CVLGrid file browser.

The user should then click the *OK* button to generate an EFDC model as shown in Figure 3. The image of imported grid will be shown in the left frame as shown in Figure 4. The user can enter the UTM zone for the grid domain into the *UTM Zone* box or skip this then click *OK* button, a message will be pop-up as shown in Figure 5, click *Yes* button the new EFDC model will be generated as show in Figure 6. The user is now ready set the initial and boundary conditions for the model as outlined in the [Model Generation Process](#) page.

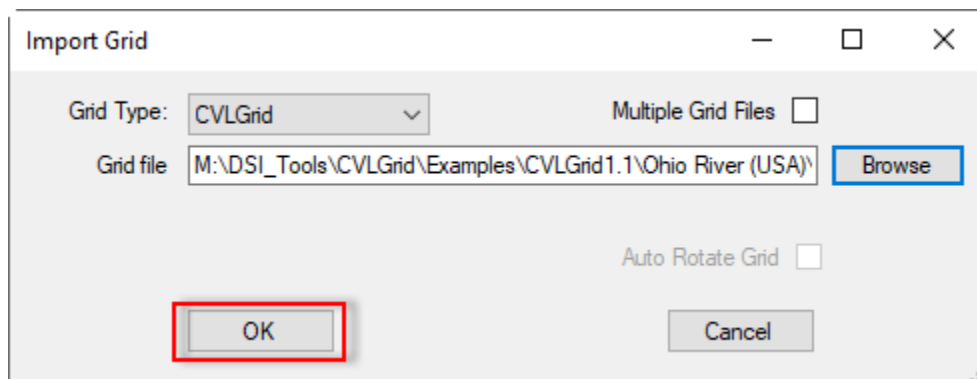


Figure 3 Selecting the CVLGrid file (1).

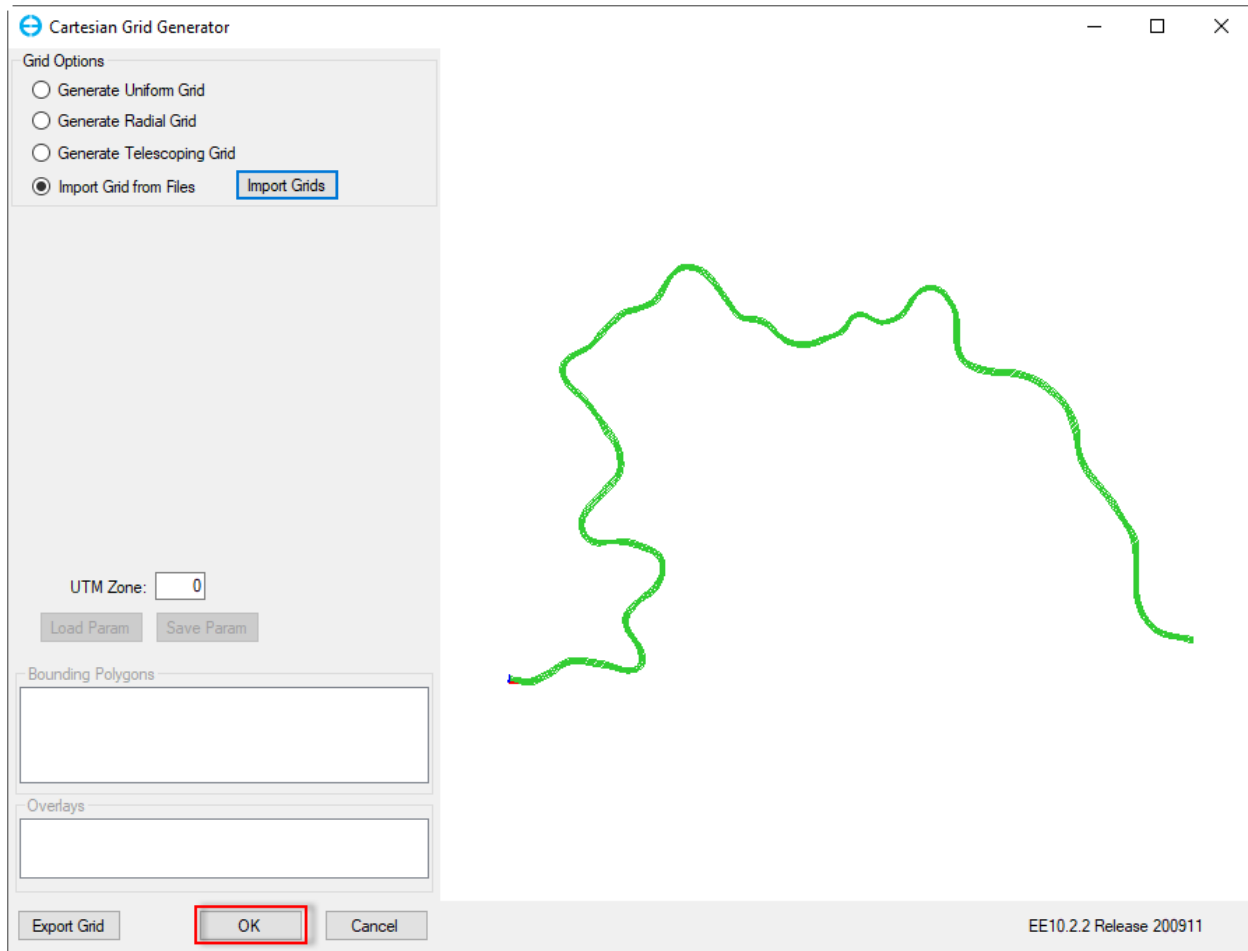


Figure 4 Showing the Grid domain.

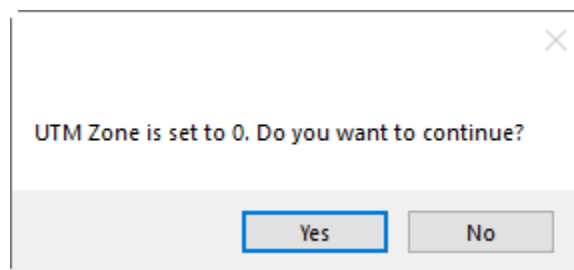


Figure 5 UTM zone confirmation.

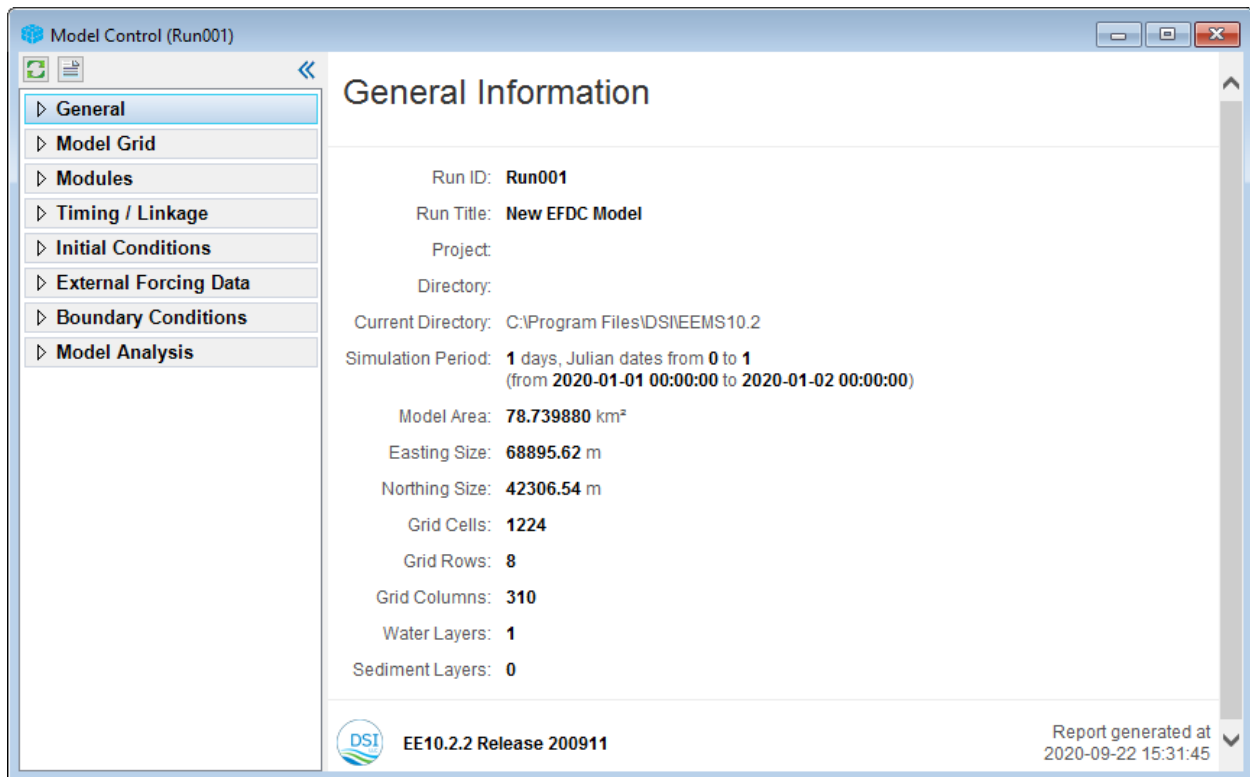


Figure 6 New EFDC model created.