

16. Vehicles, powertrain shares (input)

Overview

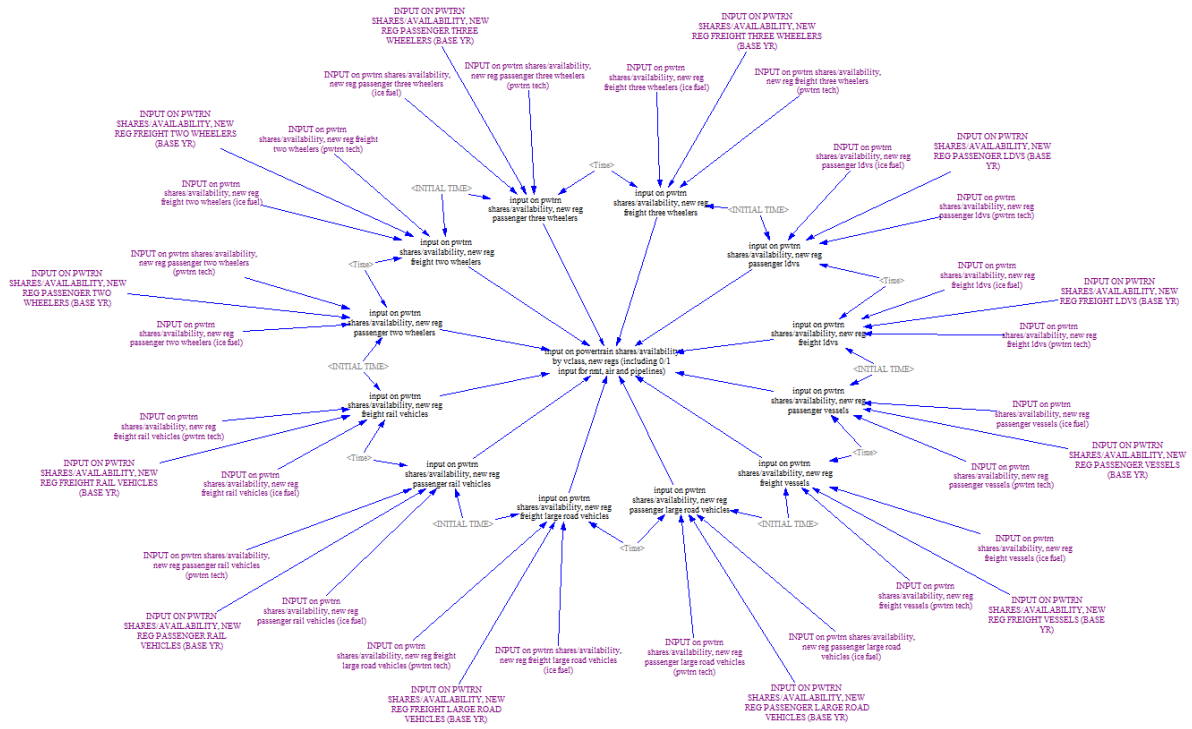
Target

This view gathers the data, introduced by the user in the ForFITS Excel file, on the powertrain shares or on the technology availability (depending on the approach the user wants to follow on the technology choice) over time.

Structure

Figure 16.1 illustrates the appearance of the view. Inputs from the ForFITS Excel file are entered in the purple variables and processed in black variables. The key output is located at the centre of the view.

Figure 16.1 Vehicles, powertrain shares (input): general appearance of the Vensim sketch



Detailed description of the view

Inputs

The variables in purple gathers information introduced by the user in the ForFITS Excel file. In case the user runs the model having selected to use direct inputs on vehicle powertrain technologies (exogenous choice in the "Powertrain technology choice switch", located in the "Modelling switches" sheet of the ForFITS Excel file), then the purple variables are loaded with the user inputs located in the "Pwtrn shares" sheet of the ForFITS Excel file. Alternatively, the purple variables contain

information on powertrain technology availability (located in the "Pwtrn availability" sheet fo the ForFITS Excel file).

The internal circle of variables in black is equivalent to the purple circle but distributes the inputs over time, with linear interpolations between the actual input years.

Outputs

The variable in the centre of the view, "INPUT ON POWERTRAIN SHARES/AVAILABILITY BY VCLASS, NEW REGS (INCLUDING 0/1 INPUT FOR NMT, AIR AND PIPELINES)", gathers all the information in order to have the user inputs by service, mode, vehicle class and powertrain.

When the variable contains the powertrain shares it is used in the view "vehicles by age" to allocate the new vehicle registrations by vehicle class along the different powertrains. When the variable gathers information on technology availability, then it is used – amongst other parameters – in the view "vehicles, powertrain choice (logit)" to estimate endogenously the powertrain selection in ForFITS.