|  |  |
| --- | --- |
| How to | Description of the RTC-Tools models |
| Description | Step by step description of how to perform a specific task in ROWS. |
| Comments | The *italic* phrases correspond to the red markings in the screenshots.  Please be aware that the screenshots may deviate slightly from the application |
| version | 2018-02 |

  
Note: A description of how to run the model can be found in a separate HowTo.

The RTC-Tools model for Hume Dam routes the inflow from the upstream URBS model into a release. Two calculation modes are available: a simulation mode and optimization mode.

The simulation model requires a reservoir inflow time series and a reservoir release time series. Given those series, it computes the resulting reservoir volume and water level, and it computes how much will be released through the turbine, the bottom outlets and the spillway.

The optimization model works slightly different as it tries to achieve multiple goals as prioritized and specified by the user. The following options can be selected and given a priority to attain.

* Use Surcharge Target Water level (fixed at: 192.25m+MSL)
* Use Release scenario target (the release timeseries specified)
* Use Downstream flow target (at Doctor’s Point)
* Minimize Spill
* Minimize Release

When selecting a release target, the timeseries needs to be specified. Whether this release target is met, depends amongst others on the priority of the release target versus other targets.