

## Run Ecosim via Console Application

This tutorial will guide you through how to make an console application that would run Ecosim and Ecospace. You can extend these to make applications such as monte carlos routines, or create/modify multiple databases.

This tutorial will extend the [EweConsoleAppExample](#) tutorial.

- i. Load the [EweConsoleAppExample](#) project and ensure it runs.
- i. Before the line where the model is closed, insert the following code to load and run the first available Ecosim Scenario:

```
core.LoadEcosimScenario(1)
core.RunEcoSim(AddressOf EcosimResultsHandler)
```

- i. You have just told Ecosim to run, calling to a subroutine EcosimResultsHandler for every time step. This subroutine does not exist yet, and you will need to create it for Ecosim to be able to execute. Add the following subroutine to the module EwE7:

```
Private Sub EcosimResultsHandler(ByVal iTime As Long, ByVal EcoSimResults As cEcoSimResults)
    System.Console.WriteLine("Time Step = " & iTime.ToString & _
        "; Biomass of group 1 = " & EcoSimResults.Biomass(1).ToString & vbCrLf)
End Sub
```

- i. Hit F5 or in the menu, Debug>Start Debugging. You should get the following output.

```
Time Step = 320; Biomass of group 1 = 0.993543
Time Step = 321; Biomass of group 1 = 0.9935352
Time Step = 322; Biomass of group 1 = 0.9935276
Time Step = 323; Biomass of group 1 = 0.99352
Time Step = 324; Biomass of group 1 = 0.9935125
Press a key to exit
```

You can run the code by loading the [EweConsoleAppExample](#) tutorial, and overwrite its file EwE7.vb with the code file found at the bottom of this page.