

**Bachelor of Biosystems Technology  
Faculty of Technology  
South Eastern University of Sri Lanka**



**BSE 11042 Principles of Irrigation**

Assignment 1a

Professor M.M.M. Najim

---

**CROPWAT – A Computer Program for Irrigation Planning and Management**

CROPWAT is a decision support system developed by the Land and Water Development Division of FAO. Its main functions are:

**To calculate:**

Reference evapotranspiration  
Crop water requirements  
Crop irrigation requirements

**To develop:**

Irrigation schedules under various management conditions  
Scheme water supply

**To evaluate:**

Rainfed production and drought effects  
Efficiency of irrigation practices

1) Check the following website and get the basic information on the program and its features.  
<http://www.fao.org/land-water/databases-and-software/cropwat/en/>

2) Then download the CROPWAT 8 for WINDOWS  
([http://www.fao.org/fileadmin/user\\_upload/faowater/Applications/CRW8.ZIP](http://www.fao.org/fileadmin/user_upload/faowater/Applications/CRW8.ZIP) ) from the link given in the above website

Unzip the file and Install CROPWAT to the computer.

When the software is installed, you can use the help also to learn about the software use and application.

3) Read the manual and operate the CROPWAT software by your own. If you need any assistance, please feel free to contact the relevant academic staff members.

When you are familiar with the software, then you can move to the following.

4) You are asked to apply the CROPWAT for the following: As given in Assignments 2 b, c and d.