

User Guide and Reference for SimUniversity

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An Overview

All Students (and Lecturers) have at one time or another complained/criticized the decisions of a University, a lot of the time without any realisations of the implications of those decisions. With SimUniversity you get the chance to try yourself to run a University and make decisions that you think are right.

SimUniversity is an attempt at simulating a University and allows a Person to try the roles of Dean/President and School/Facility Head. You'll decided where to put the money, weather research is more important then students, how many and how long courses should be, how much research/lecturering/facilites/lecturers there should be etc. etc.

This Simulation splits the University into several parts. The first major part is the **University** itself. It must deal with general expenses such as Insurance for Schools, Lecturers, Students, the odd disaster, image etc. From here additional funds can be pumped into the various School specific resources. A University also has Facilities to accomadate the University as a whole, such as Libraries, Sports Facilites, General Purpose buildings etc.

The other major part is the **School**. A University can not survive without Schools. Schools provide the necessary income (and expenses), the courses, the lecturers, the work output etc. There can only be 4 diffrent Schools, Arts, Science, Business and Language (though the basic engine can support as many as needed). Schools provide Lecturers and provide income in the way of a basic grant and a work output from research in the form of Papers and Projects etc that go towards it's PR image and income. A School has Research specific resources and Lecturering specific resources.

Schools can also contain, but not necessarily need, **Courses**. There can only be a maximum of 2 courses per school (though again the basic engine can support more). Courses provide Students and additional income and expenses. A Course can be 1 to 4 years in length (again the basic engine can support course lengths from 1 upwards) and has a ceiling value on the number of students let in.

Running/Using SimUniversity

Refer to the [Installation/Configuration Guide](#)

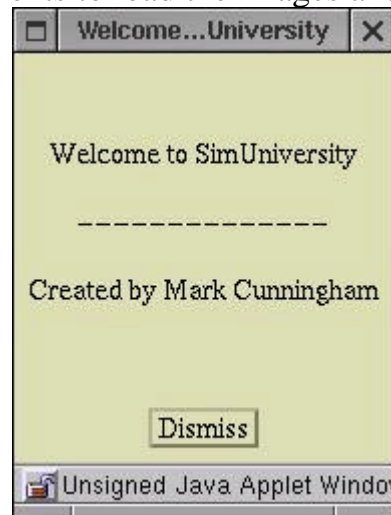
To avoid repeating information, SimUniversity can be run as an application or an applet (which means from a webpage using a browser). The recommended way is as an applet but your browser must be a fairly recent version, Netscape 4+ or Internet Explorer 4+. [Click here to Start SimUniversity](#)

Note, As SimUniversity is written in Java, it is meant to be "interoperatable" (as in run on any platform, Solaris, Linux, NT, Windows). I've devolped and tested it on NT and Linux using Netscape4 Communicator but I can't guarantee that it'll run on everything. Refer to the [Technical Manual](#).

Note, All pictures and descriptions herein refer to SimUniversity run as an Applet under Netscape4 Communicator under Linux/Solaris but running under some diffrent platform may result in a diffrent looking api but the basic functionality should remain the same.

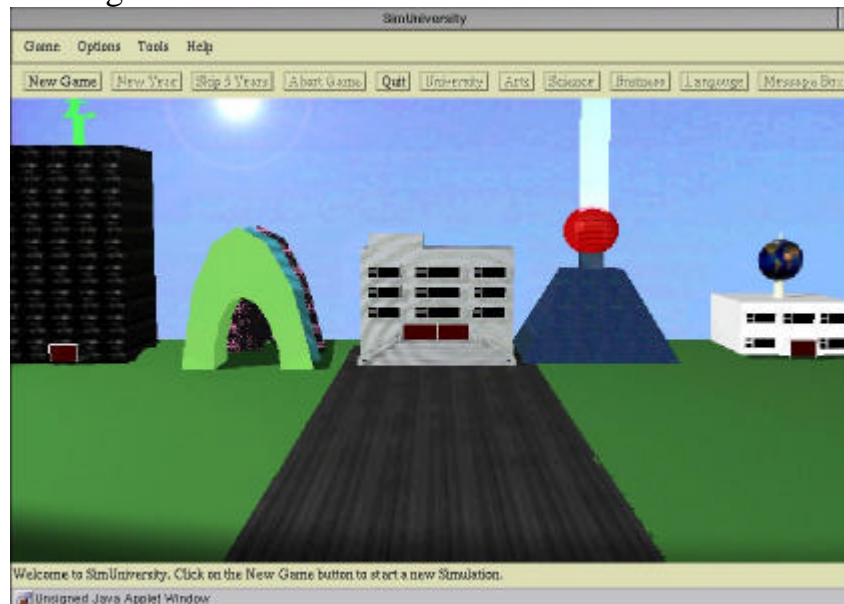
Basic Use of SimUniversity

So, you've started the Applet. It show take a few moments to load the images and then you should be presented with this message:



Just click the "Dismiss" button to get rid of the form. (The "Dismiss" button is common on most of this programs tools. It will get rid of the current widow without changing anything.)

Then you should be presented with something like this:



At the top is a standard Menubar system. Everything is available through the menu system. But we'll come to that later. Below that is a row of buttons, the Toolbar; "New Game", "New Year", "Skip 5 Years", "Abort Game", "Quit", "University", "Arts", "Science", "Langauge" and finally "Message Box". At the bottom of the screen is a simple status bar (in the picture above is says "Welcome to SimUniversity. Click on New Game button to start a new Simulation".) And of course the pictures in the main aera of the screen are the images of the University and it's many Schools (the big marble building in the centre is the University).

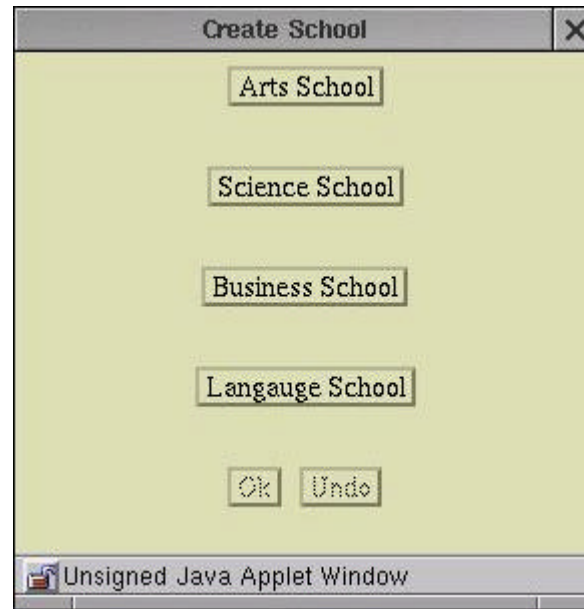
The Status Bar will display simple messages about the status of the program such as what University Year it is, where to start etc.

To start, click the "New Game" button on the Toolbar. This button will start a new simulation and a simple help message will be displayed:



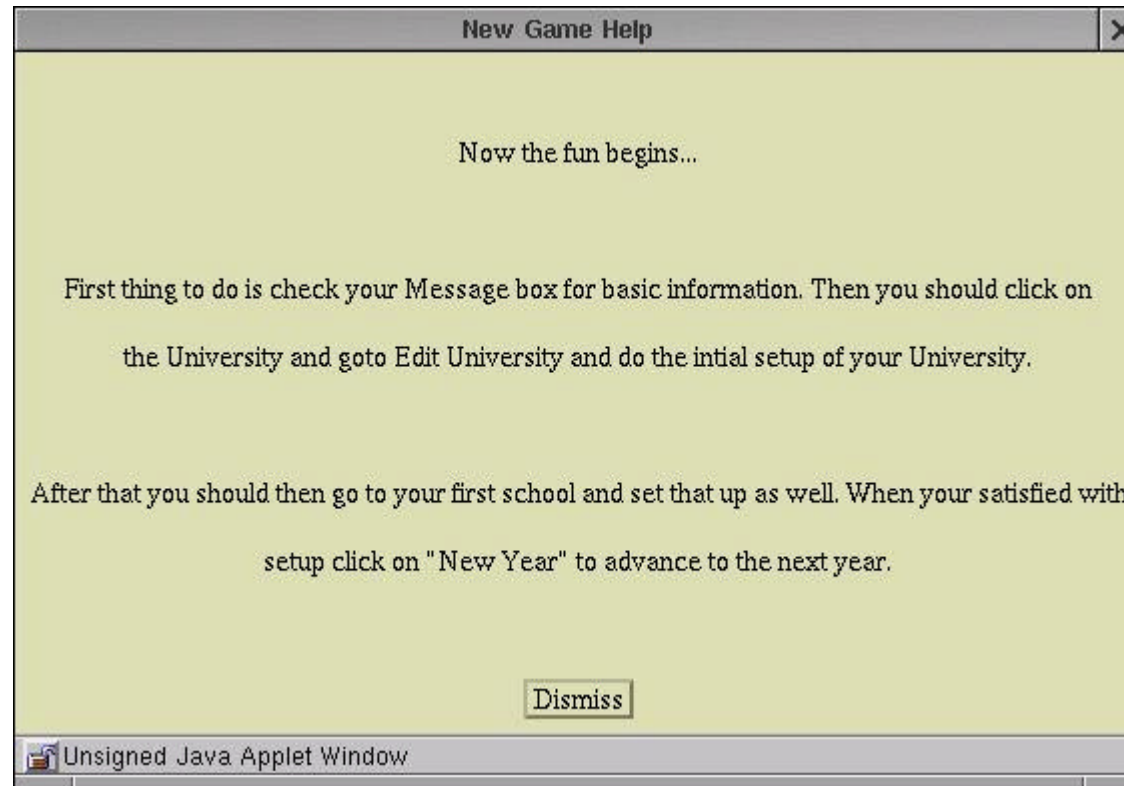
This help screens are designed to help users jump into the program without having to read documentation but it's always advisable to read documentation. Just click the "Dismiss" button to get rid of it and continue on.

In the next step you must chose an intial School. Every University must have at least 1 School:

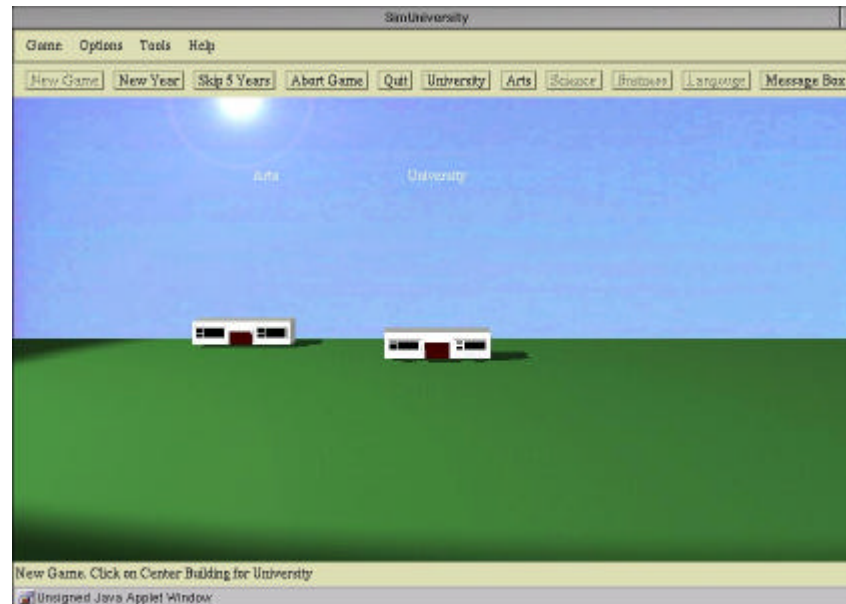


Click on "Arts School" to create a new Arts School. You'll then be presented with this form. If a school is already created, it will not be available.

Again, another useful help message will be displayed. Click on the dismiss button to get rid of it and continue:

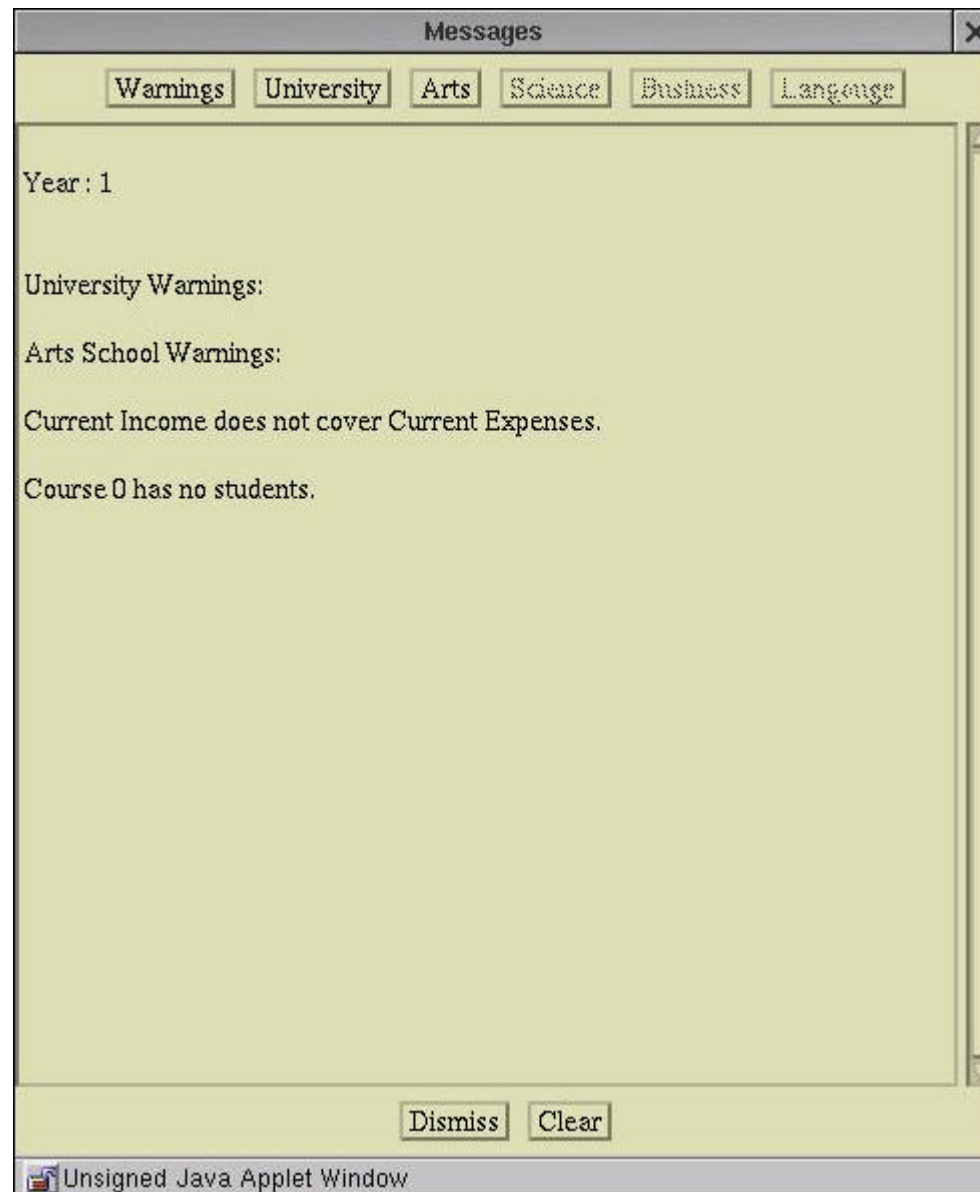


You will now be presented back at the main screen, with a picture to represent your new School and new University:



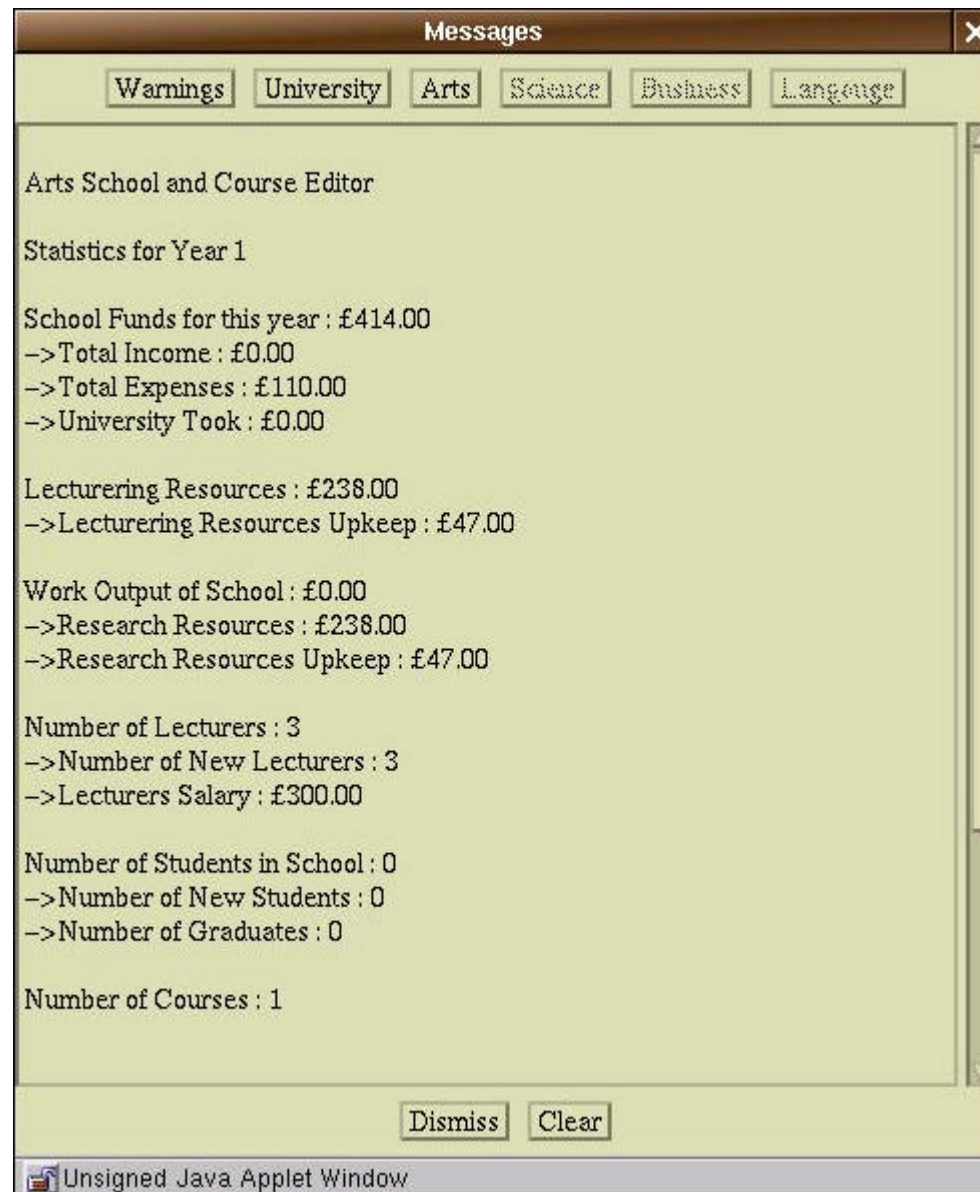
More of the Toolbar buttons are available. The University and each School have their names printed above them so you can tell the difference. As the University and Schools developed, the pictures change to represent the development. These come in 3 phases. All the Schools and University start off as the above bunker type buildings. To see the upgraded buildings, you'll just have to play.

Also a separate Form is produced, the Message Box:

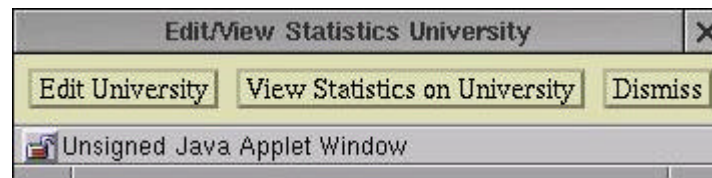


The Message Box is vital to the running of the University. Every new year it will display Warnings from the University and Schools.

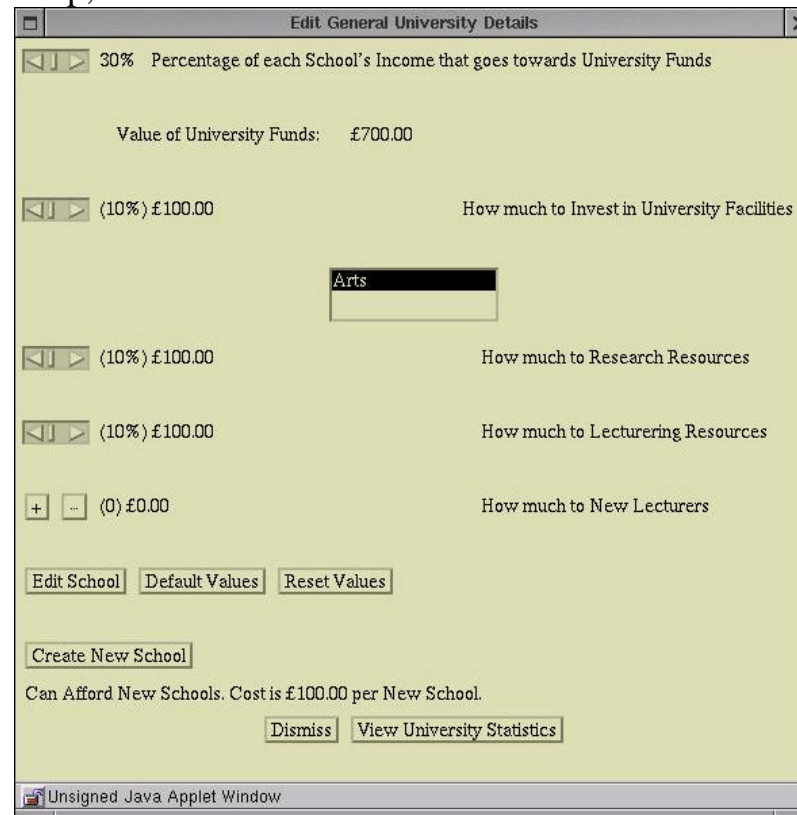
When you edit a University or a School, it will display all the necessary information. You can manually click on the buttons on top, "Warnings", "University", "Arts" etc. to retrieve that information without opening the necessary University/Schools. When making any decisions, check here. For example, click the "Arts" button to display all the current statistics on the Arts School, such as Lecturers, income, expenses, Courses, current funds etc.:



To edit and setup the Schools and University you can either click on their images or click on the equivalent Toolbar buttons. Click on the Unversity image. You are then presented with this dialog:



Click on "Edit University" button (or the "Dismiss" button to get rid of it. Will come to the "View Statistics ..." Button later). The first time you do this you'll be shown a basic help, click on the "Dismiss" button to continue. You then should be shown this Screen:

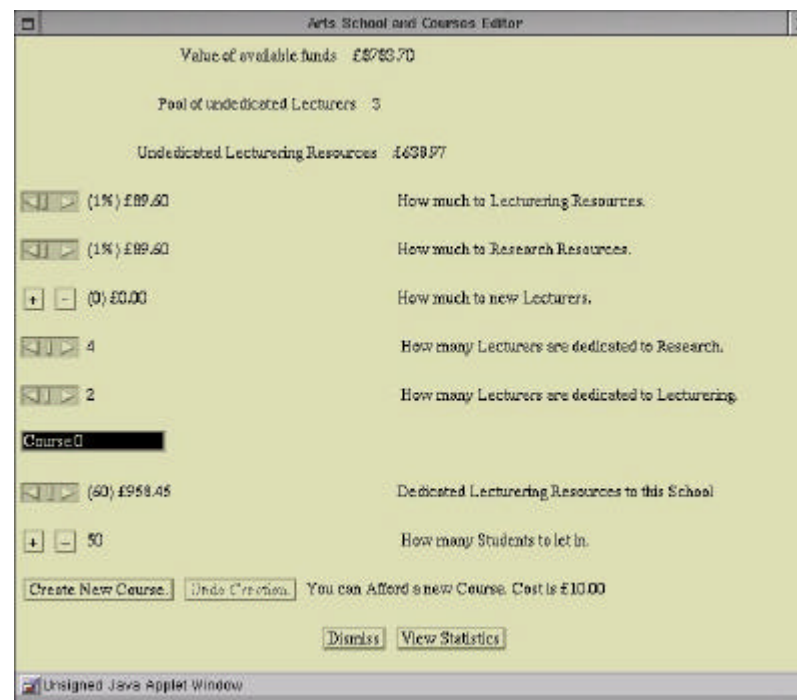


The top Scrollbar allows you to specify how much to take from each Schools income. Remember that the University must pick up a Schools bad debt so a University must have money. A University in debt may also affect student numbers as well. Below that is the amount of available funds you have. Again below that is another scrollbar. This allows you to specify how much to channel into University Facilities.

Underneath that is a list of current Schools and below that is another 2 scrollbars and "+"/"-" buttons. This allows you to channel University Funds into a Schools Research/Lecturing Resources or to get more Lecturers. (*Refer to the School Editor form below*).

Also you can create a New School (if you can afford it and if there is less than the maximum allowed) from here. To do that click on the "Create New School" button and you'll be presented with the *Create School Dialog* as you were at the beginning of the simulation.

To Edit and setup your School, click on the Arts School image. You'll be presented with a small dialog as you were with the University Editor asking to "Edit School" or "View Statistics". Click on the "Edit School" button. The first time you do this, you'll be shown a help screen. Click on the "Dismiss" button to get rid of it and continue. You should see something like this:



At the top you can see your available funds, your pool of undedicated Lecturers and your undedicated Lecturing Resources.

Below that is 2 scrollbars. They allow you to channel funds into either Lecturing Resources or Research Resources. The "+"/"-" buttons allow you to *purchase* new Lecturers for next year. These buttons and scrollbars are reflected in the University Editor, for

channelling University funds into a School.

Under that is another 2 scrollbars that allow you to *dedicated* Lecturers to either Research or Lecturing. If they are undedicated, they do both, but are less efficient.

Below that is List of courses. A School starts with no course. To create a new course, click the "Create New Course" button (the "Undo Creation" will *undo* the "Create New Course"). You'll be presented with this dialog asking for Course Length (which can only be between 1 and 4) and Student Ceiling (at least 10):



Click ok to accept or cancel to ignore the decision.

Under the Course List you can dedicated Lecturing Resources to a specific course and change the Student Ceiling of that Course. The length is unchangeable.

Once your happy with your choices, click the "New Year" button to continue onto a new year. The first time you do this, another help message will be displayed. Now check how the Schools and University is doing by checking the Message Box and edit and change the Schools and University by using the Tools you used previously.

To end the simulation, click the "Abort Game" button on the toolbar. You'll be asked if your really want to, click "Ok" to proceed. Also, if you lose all your Schools due to debts etc You lose and you'll be told that your University is dead.

You'll be returned to the main screen.

Enjoy.

Suggested Stragaties and Tips

For a start, don't try and start Courses straight away. You won't get the students and you'll end up never get high numbers. If you wait awhile and output a good deal of work and make sure the University doesn't fall into debt then create Courses.

You can make a lot just by using one School, expansion is not necessarily the key. More schools, more complications.

Use the "Skip 5 Years" button with caution. It won't stop if you lose a Course or a School.

Remember, a Course is nothing without Students, Lecturers or available Resources. A School is nothing without Lecturers and a University is nothing without Schools.

Students create great income, but without the research the University's PR image can suffer.

Use the University Funds well, don't over spend and always make sure you have some to spare.

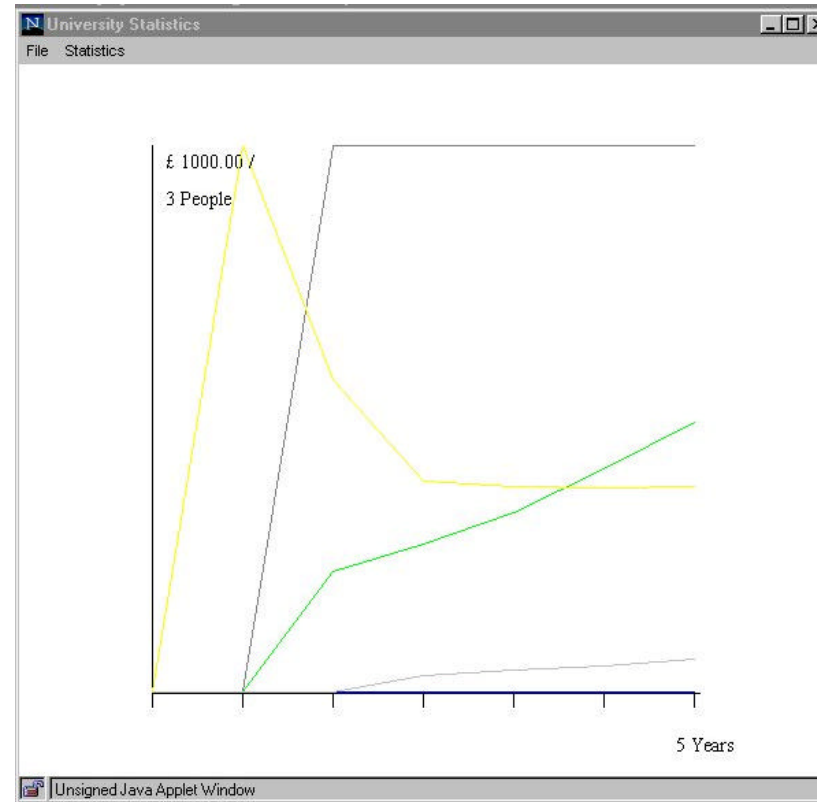
Advanced Use

Everything is available through Menubar functions. In the "Game" Menu, the functions "New Game", "Abort Game", "Quit" etc. are available. The "Tools" Menu, you can call up "Edit School" and "Edit University". The "Help" Menu, allows you access, this document and the Technical Manual and an "About" SimUniversity form. The "Edit" Menu allows you edit the University Engine model. See below.

One nice little feature is that you can disable the Message Box from being displayed everytime you open an Editor or New Year by going to the "Tools" menu and clicking on "Don't Show Message Box". Repeat this to reenable this action.

The Statistics Panel

When your using a simulation and you click on a University, you get the option of "View Statistics". This will open up a separate form that displays a Graph:



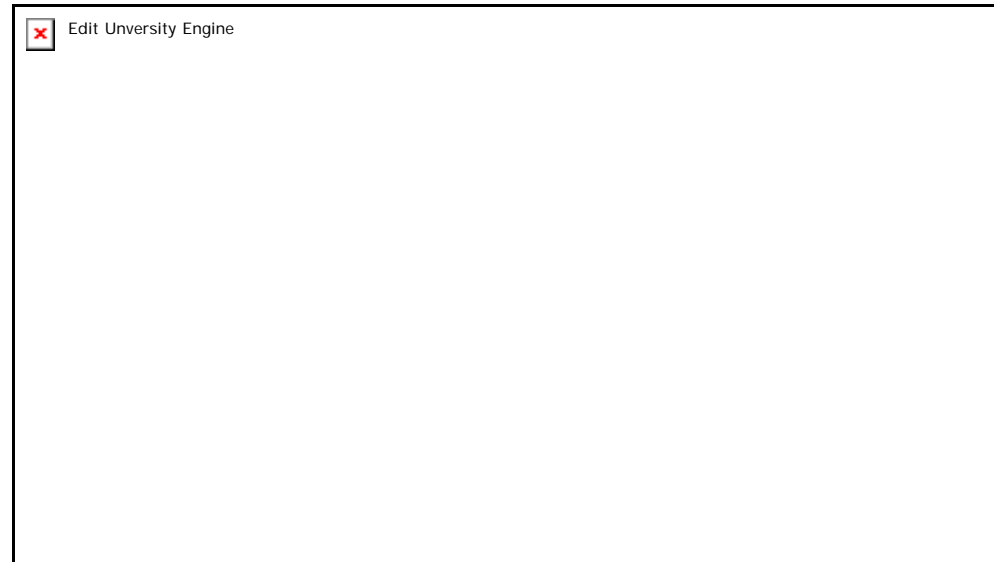
From the Menu you can select a range of values to show so you can see how the University was affected by different Factors. Likewise there is one for each School.

The Statistics Panel can be accessed from the Menu, the Editor form and the popup dialog.

The "Options" Menu

The "Options" Menu allows you, before a simulation to change certain factors about the game. *Please refer to the [Technical Manual](#) for a more detailed Explanation of each factor.*

"Edit World Factors" brings up a form with a selection of fields:



Depreciation controls by how much are Resources decreasing every year. A value of 5 means that it loses 1/5 every year.

Facilities Divisioning is how much to the University Facilites goes towards other resources like Research and Lecturering. A value of 3 means that 1/3 is Research, 1/3 is Lecturering etc.

Work Marketable Factor is how much work of a schools is worth as income. A value of 2 would mean 1/2 times it's value.

Optimal Student to Lecturer Ratio is a misleading name. It deals only with Dedicated Lecturers to Lecturering. A value of 10 means that a Lecturering is best able to deal with 10 students.

Lecturer Costs is the cost of Lecturer equipment/Insurance etc that must be paid for each Lecturer.

Student Fees is the income generated from each student.

Graduate Expected Salary is another misleading name. It generally acts as a multiplier to the number of students attracted to a course by the number of graduates.

New School Cost, New Course Cost are the price of a new School and Course respectively.

School Cover and Course Cover are the upkeep cost of each School and Course.

Starting Funds are obviously the initial amount of Money you start with.

General Expenses are the basic expenses incurred by the University each year.

School General Expenses are the basic expenses incurred by each School every year.

Basic Grant is the value of the income generated as a grant. (You only get a grant if your Lecturers are researching or teaching.)

First/Second University Upgrade and First/Second School Upgrade are the ranges for each of the 3 phases that University and Schools go through. They control what picture is drawn.

Also on the "Options" menu is a selection of check items; "Flucuate Work" and "Flucuate New Students" tries to emulate how you may get a large amount of students one year and the next it dies off a bit or how you may get a burst of Work from your Lecturers one year and a drop the next. Below that there are several "Add Random Factor to...". These add certain random difficulties to each of the list functions. Click on each one you wish to use in the Simulation.
