Micro Planner X-Pert 'Quick Start'

How to build a simple network diagram, run analysis and see some results…

Before planning a project in detail, it is generally advisable to create an outline of the work involved. This would apply whether your project is 'Goal Driven', or is based on Organisational Project Management, or conforms to the methodology formerly known as PRINCE. The Work Breakdown Structure is often a suitable means of doing this, however, this exercise is a simple and fairly mechanical one to introduce you to some of the basic techniques involved in creating a plan using the Network diagram in *Micro Planner,* so we will begin with the Network rather than the Work Breakdown Structure. Therefore this exercise is by no means an exhaustive examination of the facilities, but being quite short, neither should it be exhausting!

*Micro Planner*is based on the techniques of Critical Path Networking. This involves initially creating a Network Diagram which represents a project plan, comprising the individual operations (Tasks or Activities) to be carried out, linked together in the required order. It may be drawn in the Precedence (Activity on Node) method or the Activity on Arrow style.

From this, dates are calculated for the start and finish of each operation (Task or Activity). These are usually displayed on a Gantt Chart or Report, where each item is represented by a separate bar whose length is proportional to its duration.

Start and Finish dates may be modified by taking into account the effect of resources, the availability (or lack) of which can cause delays. Alternatively, the operations can be used to calculate the resource requirements over the life of the plan, on a daily basis.

When you create a plan for a real project, you will probably want to give it no little thought beforehand, but in order to illustrate the principles involved, the following instructions use neutral examples. You may decide to amend the descriptions, durations and other details to make the plan more realistic, so the results you achieve may be different, but it should still be a worthwhile exercise.

The exercise does not assume great experience of the Windows environment, but it does assume a basic knowledge of the use of the mouse and the 'windowing' controls together with a modicum of common sense and a little patience.

The first thing to do is to run the application…

• Start *Micro Planner* X-Pert: (double click on the icon representing the application or use Run, depending on which version of Windows you are using and/or which method you prefer)

Once X-Pert has started up

• From the File menu, choose New

The Project desktop appears

'Subproject 1' is an 'icon' representing a subproject or network diagram (also sometimes referred to as a Logic or PERT chart). Files may contain one or more subprojects, which are separate drawing areas representing, for example, different phases of a plan or even completely independent pieces of work. For the moment, use the existing 'Subproject 1'. It can be opened by choosing Network Diagram from the View menu or as follows:

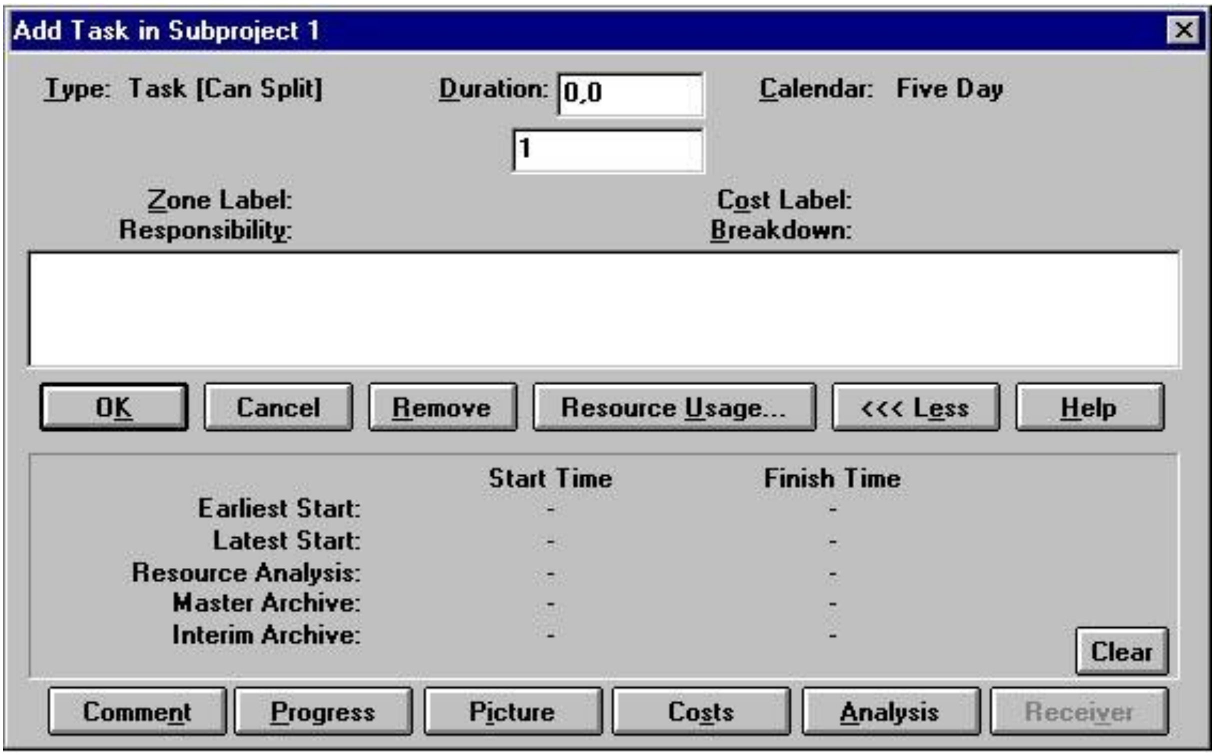
• Double click the icon 'Subproject 1'.

The Subproject (Network Diagram) opens up as a window which is empty, apart from the Levels (the dotted lines) on which the network drawing will be arranged.

Although it can be used to create Networks by the Activity on Arrow method, *Micro Planner*is preset to use the Precedence method, comprising tasks and links. Tasks, which are shown as boxes, involve work, take time and use resources. Links are the lines which connect them and hence show the order in which they are to be carried out. A network needs Descriptions and Durations (on the Tasks) and Dependencies (the Links) to create the relationships between the tasks.

• To create a new task, choose New Task from the Special menu.

If it says New Event, it means that you have the Arrow technique selected, if so, choose Control Panel from the Special menu and select Precedence then click OK. If it says New Level, it means you have one of the Levels or guidelines selected. To deselect it click in empty space somewhere on the subproject window.



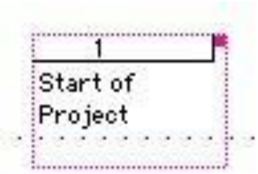
The white rectangular area is where you enter the Description, point at this area then click. The flashing cursor is an input point where you can start typing. Type ‘Start of Project’. As this item marks the start of something rather than actual work, it can be changed to be a Milestone which has no duration.

• Choose Type: at the top left corner of the dialog — click to the right, where the pointer changes from an arrowhead to a crosshair.

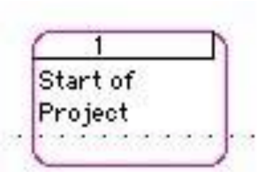
• From the list of Types choose Milestone and on the right hand side choose Start Flag.

• Click OK, then click OK again to accept this item.

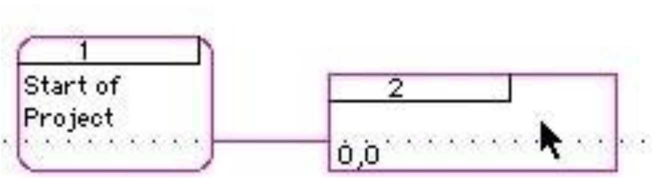
The box representing the milestone is now drawn on screen.



• It is still selected (as shown by its dotted outline) so it can be moved by pointing at it and holding down the mouse button then dragging it to a different position. If it is not selected, you must click on it first so that it has a dotted outline. To deselect it, click in empty space.



• To create a link and a task in one go, first deselect the box, then point at it and hold down the mouse button then drag out of the box to the right (or left) then let go of the button, to create a link and a successor (or predecessor).



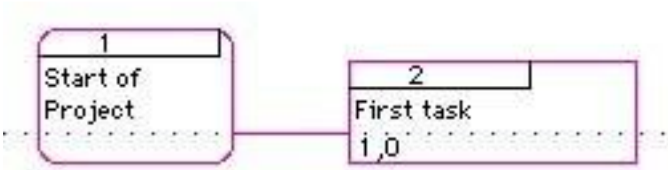
• To change the new task, point at it and double click. The dialog which opens is headed 'Change Task in Subproject 1'.

• Type a description, eg. 'First task'.

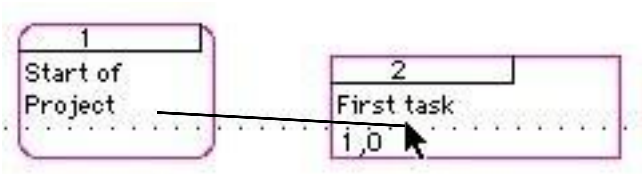
• Move to the Duration. It is preset to 0,0 (weeks and days). Edit this to 1 to mean a duration of 1 week (based on the preset five day calendar).

• Choose OK to accept the modified task then click in empty space to deselect the modified task.

You should now have a Milestone connected in series to a task by a (Finish to Start) link.



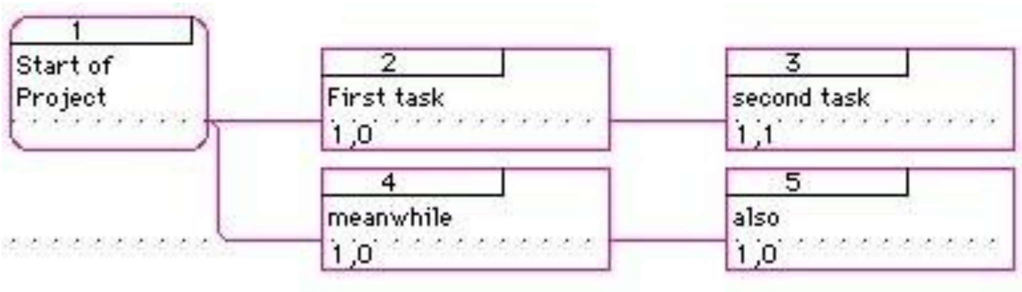
To delete the link, click once on it (the line connecting the two boxes) then choose Clear from the Edit menu. To restore the link redraw the line from one box to the other.



Further tasks and links may be added by clicking and dragging out of task boxes, or by choosing New Task from the Special menu (or clicking the New Task button on the toolbar, which is shown as a plus sign), completing the details, then drawing the link between two related tasks.

Tasks and/or links may be selected by clicking on each in turn whilst holding down the Shift key on the keyboard, or by lassoing the required items by drawing a box round them (or for all, choose Select All from the Edit menu). The selected items may then be moved by dragging one of them to a different position or they may be cloned by choosing Copy then Paste from the Edit menu.

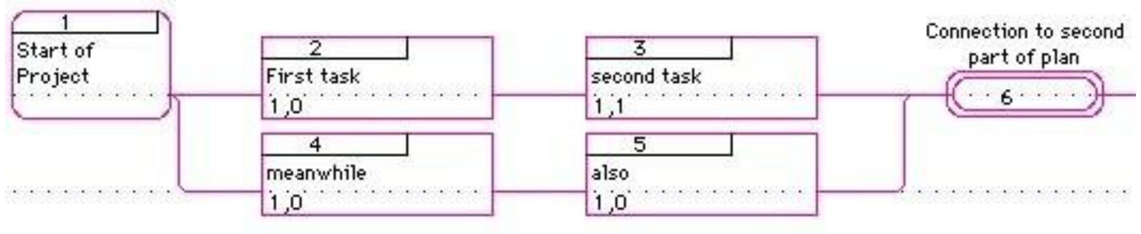
• Add further tasks and links to create a network which looks like this:



It comprises a milestone and four tasks connected by 'Finish to Start' links. Task 3 has a duration of one week and one day which is entered as 1,1. You might find it useful to use descriptions which are relevant to your work in place of those shown here!

Whilst adding to, or editing your network, if you choose to get rid of two or more items, select them then choose Clear from the Edit menu. You will get a warning which will tell you that you 'Cannot Undo Multiple Clear' (by implication you Can Undo a single Clear, by choosing Undo from the Edit menu). To proceed anyway and remove the items, choose OK, or if you have second thoughts choose Cancel.

• Add a further task. Change its type to Interface (Finish Flag) and give it the description, "Connection to second part of plan". Link it to the other tasks like this:



The interface will allow you to connect to other subproject(s)

• Whilst holding down the Control key on the keyboard, drag from 1 to 6 then release the mouse button (then the Control key).

The Add Link dialog appears. This means you can change the type of the Link before it is drawn.

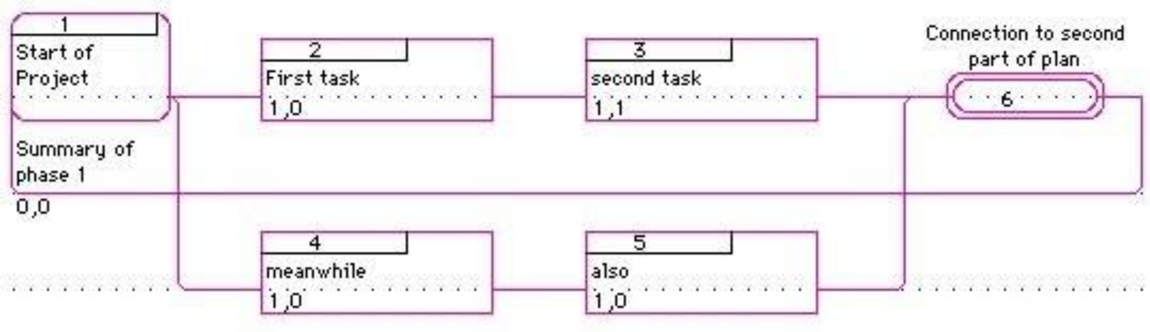
• Click to the right of 'Type:'

• Choose Hammock from the list of Types, then choose OK

• Type a description for the Hammock: "Summary of phase 1"

— this object will act as a summary of the tasks which it spans.

• Choose OK

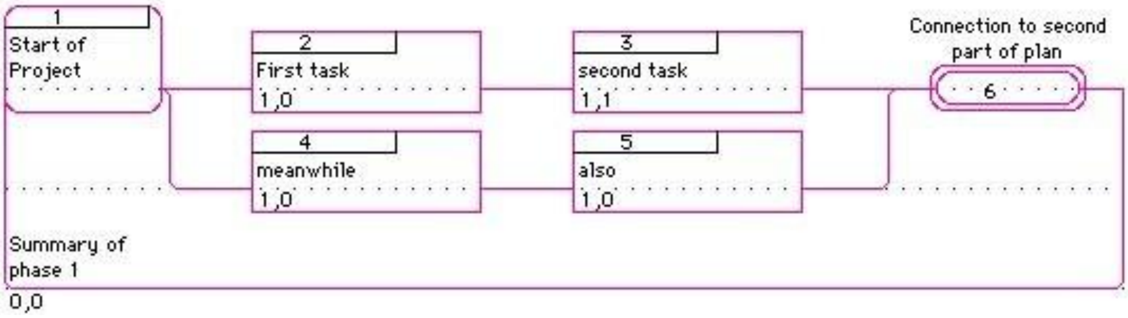


• Click on the line representing the new Hammock then drag it down below tasks 4 and 5.

• Choose Clean Up Network from the Special menu

• Choose Clean Up Levels then choose the OK button

The network should now look something like this:



1
Start of
Project
2
First task
1,0
3
second task
1,1
Connection to second
part of plan
6
4
meanwhile
1,0
5
also
1,0
Summary of
phase 1
0,0

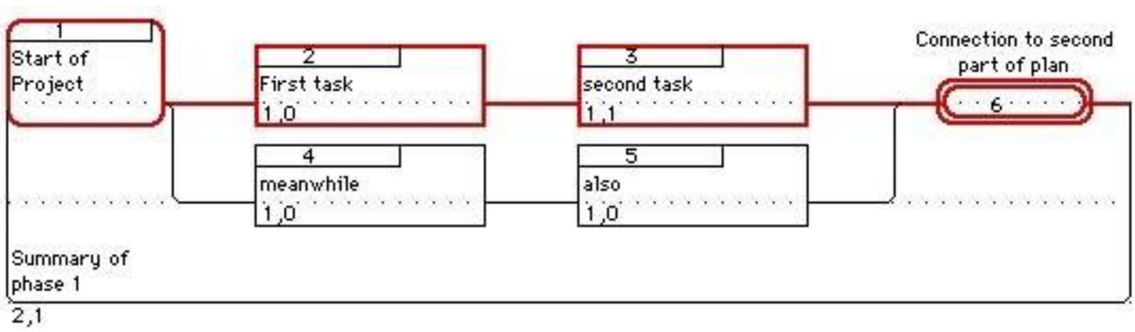
Time Analysis

Time Analysis calculates start and finish dates based on the task durations and their relationships as defined by the links

• Choose Time Analysis from the Analysis menu

This carries out the calculations when *you* decide. By contrast, Automatic Time Analysis — which can be enabled on the Analysis menu — means that Time Analysis will be carried out whenever a change is made to the items in the Network or when the Time Now date is changed, so if Automatic Time Analysis is on, Time Analyse Now may have no effect.

Time Analysis starts at Time Now (which is set in Progress Details on the Analysis menu) which defaults to today's date when you first create a New file. However, Time Now does not move forward until you choose to change it.
The durations of each task are used to calculate the Earliest Start and Finish dates of each task and also to calculate the duration of the hammock, which summarises the tasks it spans. The critical path — the longest path through the network is also generated. It shows up in red.



To show on the network the dates which have been calculated:

• Choose Network Options from the View menu (or by clicking on the options button which is shown as a pointing finger)

• Click the Add button to add Early Dates

• Click on the Drop down menu and drag down to Late Dates then click Add again

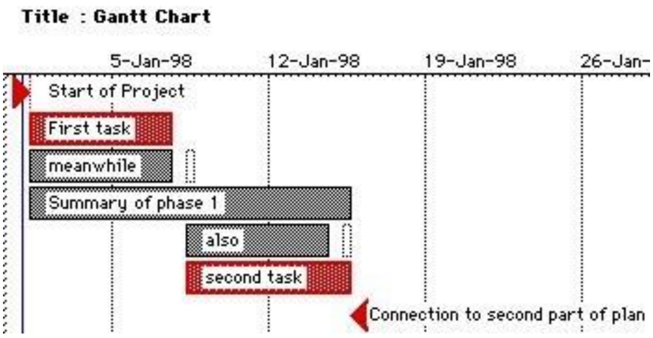
• Choose OK

The dates are now shown on the Network diagram (Subproject 1)

To see the results in an alternative format:

• Choose Gantt… from the View menu then choose OK.

The Gantt Chart should look something like this with dates starting from whichever Time Now is set in your file.



The triangular symbols are the standard way of representing Milestones or other 'Flagged Nodes' and the length of each bar is proportional to the duration of the task or hammock. The Chart is sorted in Date order: Start Date first then Finish date. The critical items are shown in red and the two non critical tasks are shown with float represented as a 'ghosted' bar to the right of the solid grey bar. Float is the amount of time by which a task could be delayed without delaying the end of the network. Tasks 4 and 5 together are shorter than tasks 2 and 3, hence they have Shared or Total float.

Tasks can be modified directly from the Gantt Chart, either by using the pointer to drag the right hand end of the solid portion of a bar to change its duration, or by pointing at the relevant item and double clicking to open it.

The appearance of the Gantt Chart can be modified by choosing Gantt Chart options from the View menu (or clicking on the button which is shown as a pointing finger).

• Close the Gantt Chart window.

• Choose No to avoid Keeping the chart on the desktop

This means that the chart is thrown away instead of being retained as an icon on the Project Desktop.

The prompt whether to keep or not appears if Preferences — on the File menu — are set to Prompt rather than Always Keep or Don't Keep

For an alternative view of the same information:

• Choose the Report submenu of the View menu then choose Gantt Report

• Choose OK

This gives a more formal presentation with the description, duration and dates shown on the left hand side and the bars to the right. The duration of a task cannot be changed by dragging the end of a bar but, as with the Gantt Chart, the underlying records may be opened and changed by pointing at then double clicking the required item.

• When you have examined the Gantt Report, close it and choose No to avoid keeping it on the desktop.

Saving your work

Now would be a good time to save the file you have created: the Project Desktop is still ‘Untitled’ — it has no file name, as it has yet to be saved to disk, so do the following:

• Choose Save As from the File menu

• Type a file name and choose where to save the file, then choose OK

Multiple Subprojects

Turning back to the network diagram/subproject, to link the first subproject to a second one, do the following:

• Click once on the Interface (number 6) to select it

•Choose Copy from the Edit menu

A copy of the item is now temporarily stored in the Clipboard area of memory

• Choose Network Diagram from the View menu

• Choose New

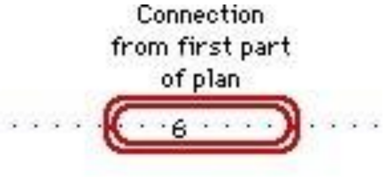
• Click OK to accept the preset name Subproject 2

• Choose Paste from the Edit menu

• Change the description to be ‘Connection from first part of plan’

• Choose Type then choose Interface with the attribute [Start Flag] then choose OK

• Choose OK to accept the new item (retaining the same number as in the other subproject)

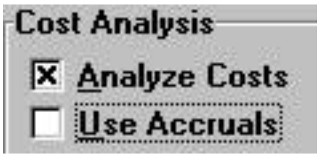


You may now start adding tasks and links to this second subproject. Any items to the right of the Interface will be dependent on the preceding tasks in Subproject 1. When you reanalyse, the dates will be calculated with this effect. To show dates on Subproject 2, do the same as you did for Subproject 1 (Network Options then Add Early Dates etc.) The Gantt Chart will be redrawn to reflect any items added, but it may be easier with the Gantt Report to recreate one from scratch.

Adding Resources

• Close Subproject 1 using the normal windowing controls.

• Choose Analysis Controls from the Analysis menu and switch on 'Analyze Costs' (using the 'Checkbox'). Switch off 'Use Accruals'.



• Choose OK

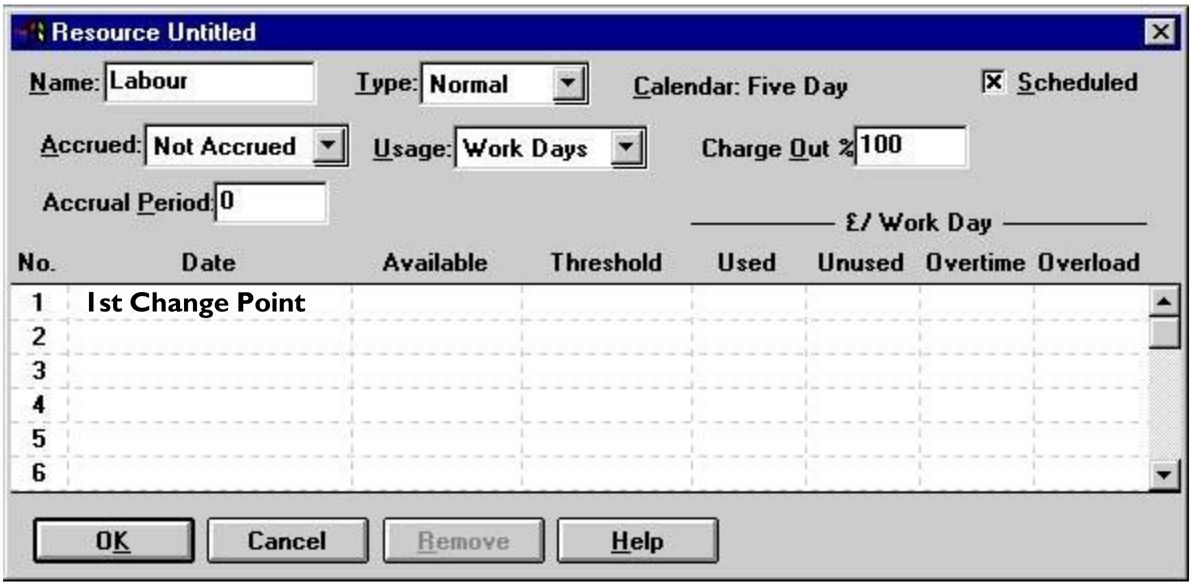
This means that whenever you run resource analysis, costs will also be calculated (quantity x rate).

• With the Project Desktop as the active window, choose Special menu — New Item — New Resource

• Change the Name to Labour

• Leave the Type as Normal (which means non-consumable resource)

• Click in the first 'Change Point' cell — this automatically enters Time Now as the first date when the resource becomes available.



• Fill in the availability and cost rates as shown below

Click here to enter the Time Now Date

No.	Date	Available	Threshold	Used	Unused	Overtime	Overload
1	1-Jan-99	1.00	-	100.00	0.00	100.00	150.00
2							

The Used rate means the (daily) cost rate of the resource if it is not overloaded. Unused means the cost of the resource if it is idle. Overtime means its cost outside the normal working hours of its calendar. Overload means for example the cost of a second or subsequent resource if there is only one available. Threshold is a limit to overloading which will cause analysis to pause while you decide what to do. Leaving the threshold blank means the analysis will not be limited.

- **Click OK to accept the new resource**

- **Drag the icon onto the Resources folder**

To get back to the resource, you may open the folder by double clicking it.

An alternative way of adding or changing resources is to choose Resources from the List menu, from where you can browse the various folders on the project desktop

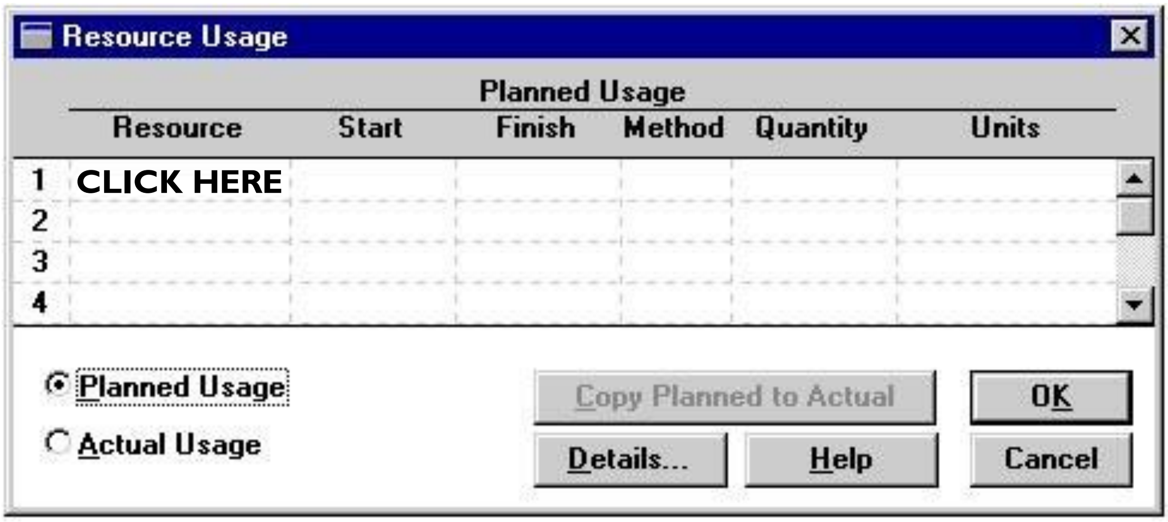
- **Open Subproject 1 (or if the window is already open, choose it from the Window menu)**

- **Double click on task 2 to open it**

- **Click on the Resource Usage window to bring it to the foreground**

There is also a Resource Usage button on the task dialog to do the same thing. The Resource Usage window is separate, but is permanently associated with the Task dialog.

- **Click in the first empty slot**



- **Choose the Labour resource from the list of resources then click OK**

You may need to open the Resources Folder to find the Labour resource

Micro Planner fills in the remaining details…

	Planned Usage					
	Resource	Start	Finish	Method	Quantity	Units
1	Labour	0,0	1,0	Rate	1.00	-

Micro Planner assumes you want to use the resource from the beginning of the task (0,0) at a Rate of 1 per day until the end of the task (1,0). The alternatives include using a different quantity, or using the resource for different periods within the duration, or the quantity may be expressed as a Total (number of days) rather than a Rate.

• Choose OK to accept the changes to the task

• Repeat this procedure with task 4 to add the same resource to it

Now both tasks will be trying to use the same resource, potentially causing a conflict between the requirements of not overloading the resource and finishing as early as possible.

• Choose Resource Analysis — Deadline Critical from the Analysis menu

You will notice that *Micro Planner* does a Time Analysis first, to establish the minimum dates for the plan, then proceeds with Resource Analysis. When it is complete, it will beep to let you know.

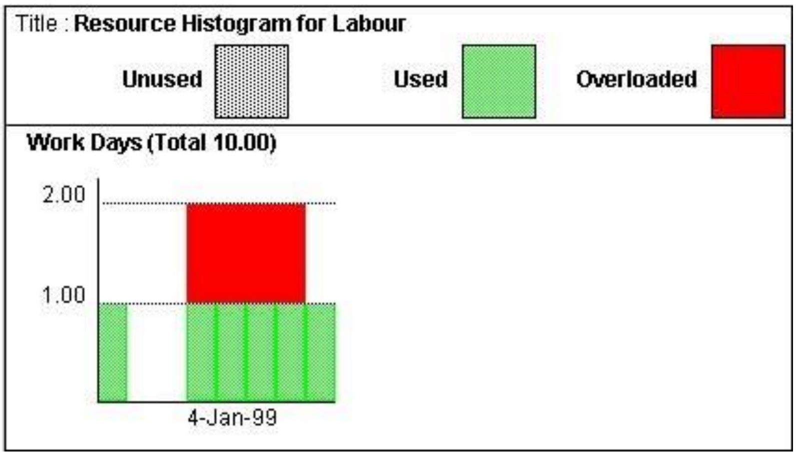
• Choose Resource Histogram from the View menu

• Click in the Resource Shown box

• Select the Labour resource and click OK

• Click OK again to accept the Summary Histogram of Labour

• The Histogram opens to show how many resources are required and whether they would be overloaded.



Notice that the Resource is overloaded.
This is because in order to finish by the latest finish date calculated in Time Analysis (the end of the float), task 4 must start before task 2 has finished using the Labour Resource.

To see the overlap:

• Choose the Report submenu of the View menu then choose Gantt Report (leaving Current Schedule set this time to Resource Analysis rather than Time Analysis)

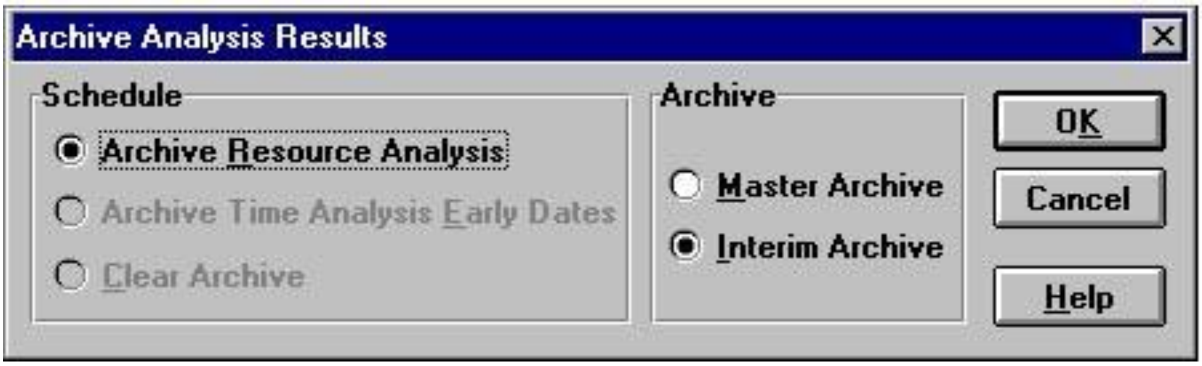
• Choose OK

The period when the resource is required on two tasks at once is that where the overload is shown on the histogram. Use the Window menu to move between the open windows: Resource Histogram and Gantt Report.

The Interim Archive is intended to be overwritten from time to time (eg. each week or each month as the plan is updated), but once you choose to archive to the Master Archive, it is meant to be a permanent Baseline and Budget for the plan, allowing you to compare between the latest estimates and the original planned costs and dates as you update the plan and enter progress.

To store the results of Deadline Critical Resource Analysis, do the following:

• Choose Archive… from the Analysis menu



• Archive Resource Analysis [to] Interim Archive is already preselected, so choose OK

Each task now has Time Analysis (Early and Late Dates), Resource Analysis and Interim Archive dates stored internally. Any two sets of these dates may now be compared on Reports, the Gantt Chart and the Cost Profile.

To remove the overload, do the following:

• Choose Resource Analysis — Resource Critical from the Analysis menu

This will *level* the resource(s) further, removing the overload, but also finishing later than the latest finish date calculated by Time Analysis, thus making the overall timespan longer.

Look at the Histogram: there is no longer any overload, but the Gantt Report shows that the finish of the plan is later in Resource Critical analysis, where availability of resource is the main factor.

To show the dates on the network:

Either
• Choose Subproject 1 from the window menu (if its window is open)
or
• Choose Network diagram from the View menu and choose Subproject 1

• Choose Network Options from the View menu

• Choose the 'Determine Using' drop down menu and choose Resource Analysis instead of Time Analysis

This means the Network (and in particular its colours) will be based on Resource Analysis rather than on Time Analysis.

• Choose the 'Field' drop down menu, choose Resource Analysis then choose Add

This means Resource Analysis Dates will be included on the Network Diagram

• Choose OK

Notice that the Hammock now shows a Duration of 3,0 (three weeks) based on the Resource Analysis results, instead of 2,1 (Time Analysis) which is the shortest overall timespan, based on the durations of the tasks.

To compare the archived results (Deadline Critical) with the latest analysis (Resource Critical), do the following:

• Choose the Report submenu of the View menu then choose Gantt Report

• Leave Current Schedule set to Resource Analysis, but set Old Schedule to Interim

• Choose OK

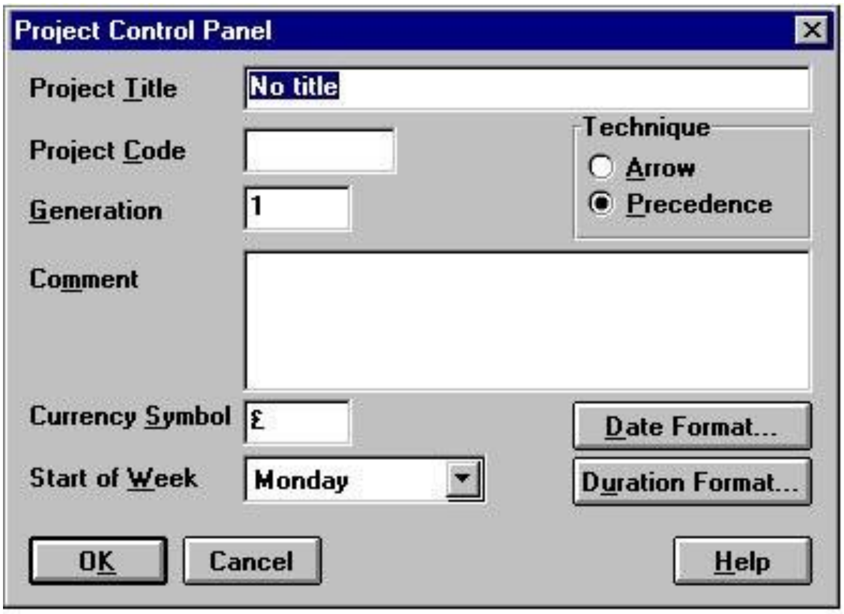
Now you will see two bars or symbols for each task, hammock or milestone,.
The upper one is the Current Schedule (Resource Analysis — Resource Critical) and the lower one is the Old Schedule (Interim, based on Resource Analysis — Deadline Critical). This style of report is intended to show slippage between original planned dates (often the Master Archive rather than the Interim Archive) and the latest forecast (Resource Analysis).

Note: If you compare Resource Analysis and Interim on the Cost Profile in this particular plan, you will see a difference in the forecast costs because the cost of an overloaded resource is higher than that of one which is not overloaded, leading to higher costs in Deadline Critical analysis. However, if you use the hammock to show the costs of overheads (as well as acting as a time summary), Resource Critical Analysis might show higher costs, depending on the daily or weekly cost rate of the overheads, which can be created as a Resource in the same way as a ‘real’ resource.

Project Control Panel

When you Save a file (or Save As), it creates a copy on the hard disk which has the name shown on the title bar of the Project Desktop. This is not used anywhere else, so to ensure that a proper title appears on reports, you need to do the following:

- **Choose Control Panel from the Special menu**



- **Type in a title for the project**

- **Choose the Date Format button**

The preset format (probably the simplest and least ambiguous) is DD/MMM/YY, so to retain this

- **Choose Cancel**

- **Choose the Duration Format button**

The preset format is Weeks and Days, so to retain this

- **Choose Cancel**

To accept the overall changes to the Project Control Panel

- **Choose OK**

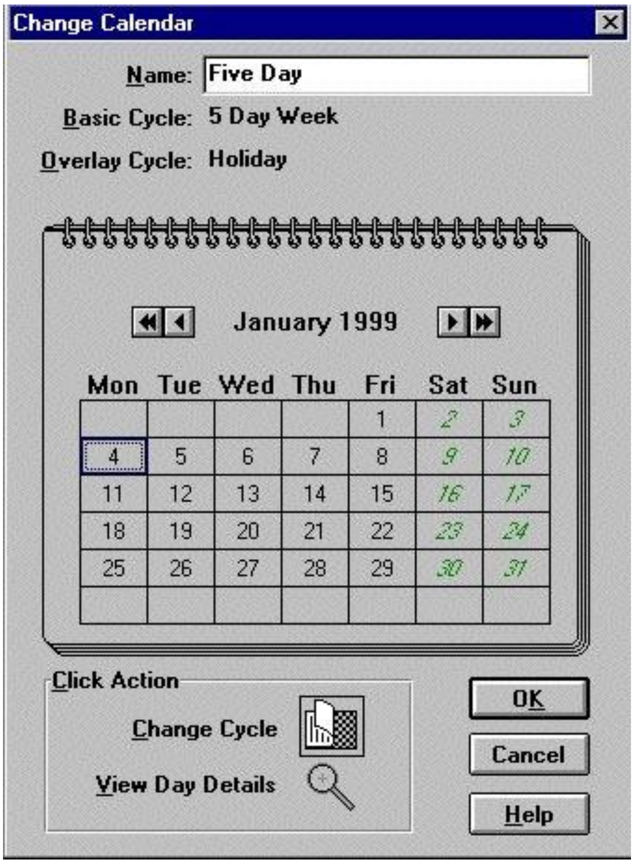
Calendars and Weekly Cycles

Each task (and link) in *Micro Planner* has a calendar. It is preset to be the Five Day calendar which is based on a weekly cycle which works a 40 hour week, Monday to Friday. In addition to the Basic Cycle that each calendar has, ‘Overlay’ cycles may be applied to particular days (or blocks of days) to modify them, for example to make them into Holidays.
Both Calendars and Weekly Cycles exist as icons, either on the desktop or in folders, with the exception of the ‘hidden’ Holiday cycle. This can be seen with all the other cycles when you choose Weekly Cycles from the List menu.
To enter holiday dates on the Five Day calendar, do the following:

• Choose Calendars from the List menu

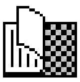
• If necessary, open the Calendars folder

• Select the Five Day calendar and choose Change



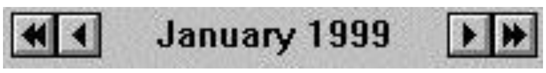
• Choose Change Cycle at the bottom of the dialog

When you move the pointer over dates on the calendar, it will show up as the overlay icon…



…ready for you to click to convert the date to a holiday (assuming Overlay Cycle has been set to this cycle at the top of the calendar dialog). This method may also be used to change any date or dates to a different pattern of work by setting 'Overlay Cycle' to something else, eg. 7 Day Week.

• Choose the next statutory holiday date(s) using the single arrowhead to move forward (back) a month or the double arrowhead to move forward (back) a year



• Click on the relevant date(s)

Clicking again causes the date to revert to the normal working of the Basic Cycle.
Other Overlay cycles may be chosen (for example to enable weekend working) by selecting Overlay Cycle at the top of the dialog and choosing something other than Holiday.

Labels

These are used to make reports more readable and to allow both Sorting and Selection according to categories such as Department name or person in charge.
In addition to the Sort Code which does not have a list but is a free-typed ASCII sort code, there are three labels: Zone, Responsibility and Cost Code. Each may be created and amended via the List menu and is also accessible from within the Add/Change Task dialog.
Zones do not have to be used to define location, nor do Responsibility labels have to be used to define the 'owner' of a task, but these are typical uses for these Labels. They form the headings of sections on Reports such as the Gantt Report. They are used to Sort reports into a particular order (they do not need to be in date order only) and also for the Selection of groups of tasks instead of everything.

To create a simple list of Zones, do the following

• Choose Zones from the List menu

• Type Zebra then choose the New button to add it to the list

• Type Aardvark then choose New

• Type Mongoose then choose New

The order of the list is the order in which the labels will be used in Sorting, in other words it need not be in alphabetical order if you want Zebra first and Aardvark last…
If you are not a zoologist (or even if you are) you may use Department names, or geographical locations, or terms like Design, Test, Implement as Zone labels — anything you want (although it might make sense to be consistent with your colleagues).

The order of the list may be changed by selecting one label at a time then using the Cut and Paste buttons.

• Choose OK to close the Zone list

To apply the Zone labels, do the following

• Open the Network Diagram (either from the Desktop or by choosing Network Diagram from the View menu)

• Open a task then click to the right of 'Zone:'

The Zone List appears — you may edit it from here too

• Choose the required Zone label for this task then choose OK

• Choose OK again to accept the change to the task
• Repeat with the remaining tasks (and milestones and hammocks)

An alternative method of editing tasks, in particular adding or changing labels and so on is by means of the Table(s) which may be created via the View menu.

Reports

Why not explore the reports which are accessible from the Report submenu of the View menu? The Milestone Report is preselected to show only Milestones and other Flagged Nodes (eg. Interfaces with Start or Finish Flags). All the Reports allow you to modify the order (using Sorting) and the content of (using Selection).

Selection and Sorting

Report Title, Start Date, Time Span, Current and Old Schedule may all be modified, but the Selection and Sorting Options allow even greater flexibility. The following example shows only a few of the features.

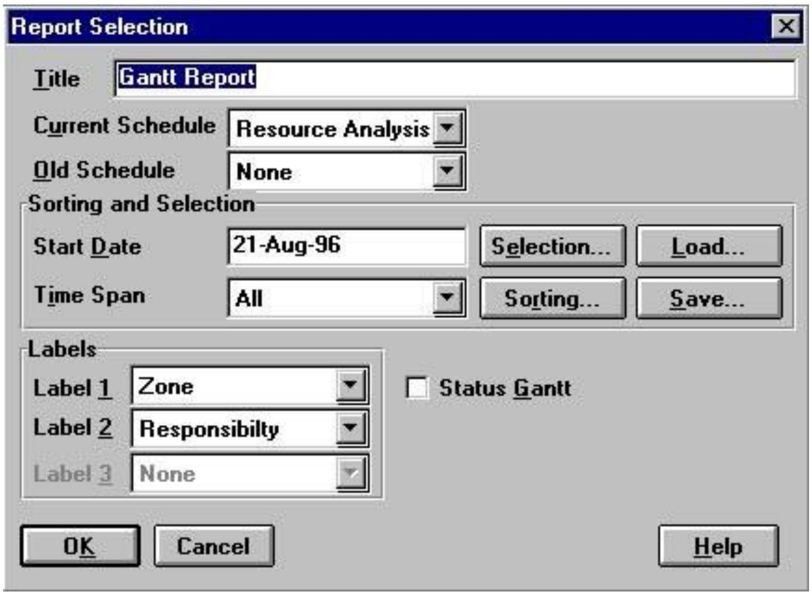
To sort a Gantt Report into date order, do the following

Either

• **Double click the Gantt Stationery icon in the Report Stationery folder**

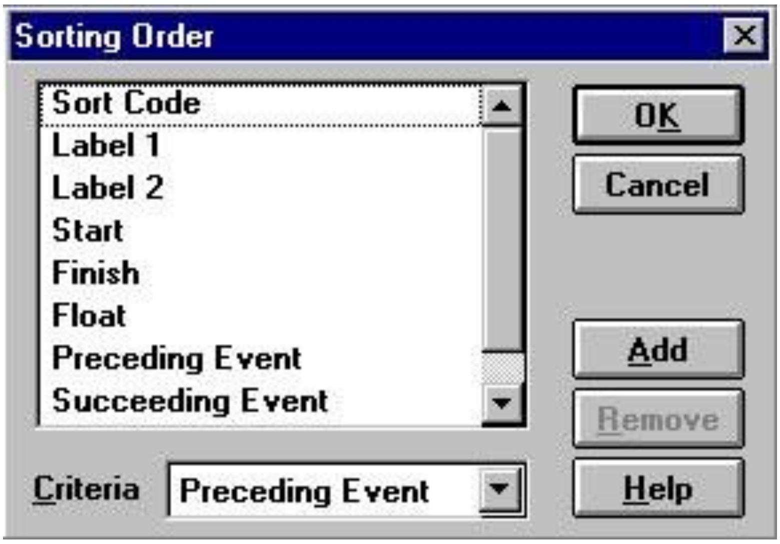
Or

• **Choose Gantt Report from the Report submenu of the View menu**



• Choose the Sorting button

The preset Sorting order list is shown…



• Click on Sort Code then choose Remove

• Click on Label 1 then choose Remove

• Click on Label 2 then choose Remove

The Sorting criteria list should now look like this

…in other words it will sort first by Start Date then by Finish Date.

There is a drop down menu (Criteria) which lists all the available sorting criteria, any of which may be inserted into the list of those used or appended at the end (provided none is duplicated) to change the order in which the report is sorted.

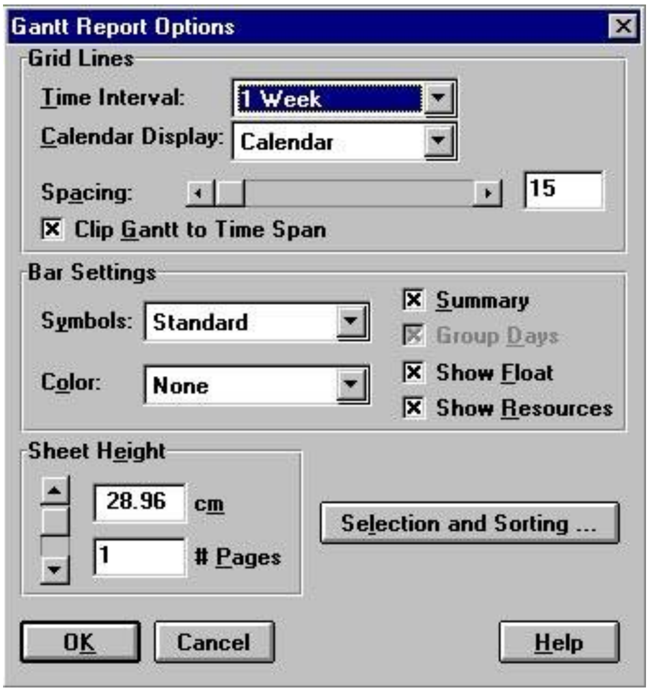
• Choose OK to accept the new sorting order

• Choose OK to accept the amended Report Selection dialog

The Gantt Report is drawn on screen

To change its appearance,

• Choose Report Options from the bottom of the View menu (or click the Options button: the pointing finger)



• Explore the various options…

To amend the original Selection and Sorting,

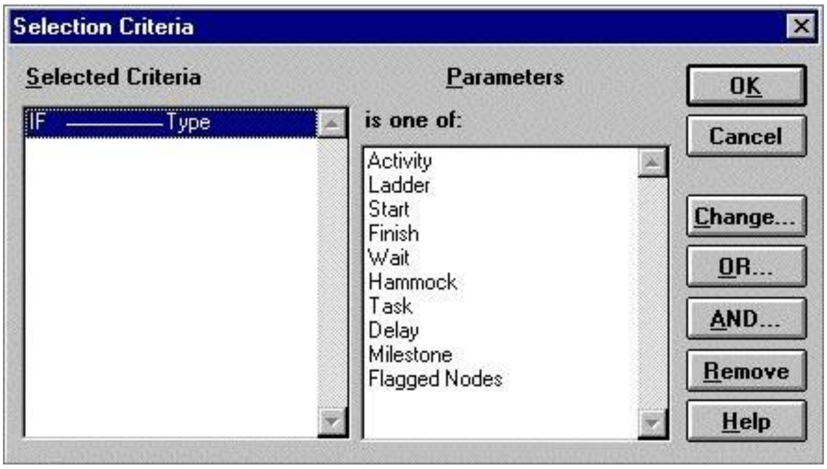
• Choose the Selection and Sorting… button

This brings back the original dialog

This time let us choose to show only the items which have one particular Zone label (eg. Aardvark):

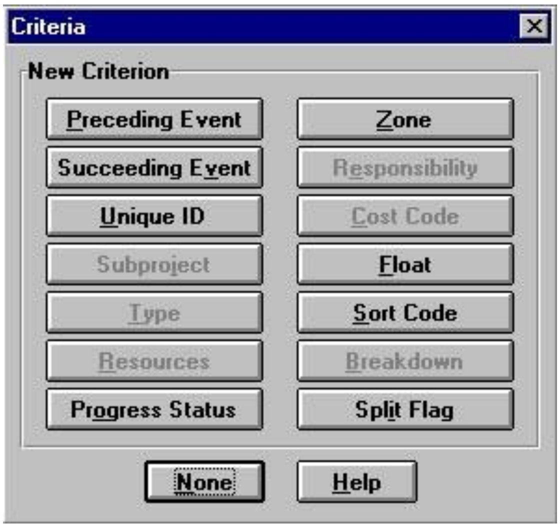
• Choose the Selection button

The preset selection is by Type only:



To modify this and to allow the use of a further criterion

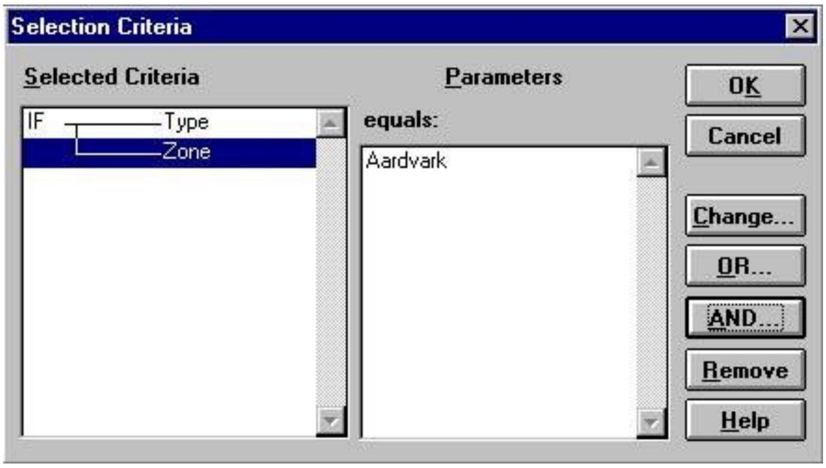
- **Choose the And button**



- **Choose the Zone button**

- **Select the required Zone then choose OK**

The revised Selection should look something like this…



…meaning that in order to be included in the report, items must be one of the listed types (task, activity etc) **and** in the chosen Zone.

• Choose OK to accept the new Selection then OK again to accept the Selection and Sorting then OK again!

Alternatively you could have thrown away the report and started again from scratch

[To find out more about Selection and Sorting, read chapter 19 in book 3 of the manual.]

To print the report, you could just choose Print from the File menu, but it may be better to see if it will fit the paper first…

• Choose Print Setup from the File menu

• Ensure that the correct device is selected and that the orientation (landscape or portrait) is as you want it then choose OK

• Choose Preview from the File menu

This allows you to see up to 16 pages at a time (albeit in outline only)

If the report needs to be scaled to fit the paper,

• Choose Page Setup from the File menu

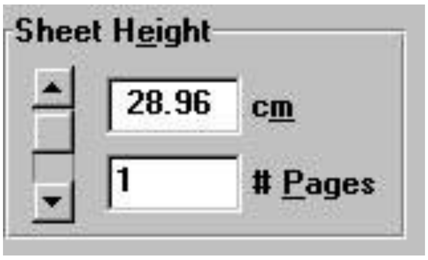
This allows you to amend the number of pages across (and down).

• Choose OK to accept any changes

You may also need to adjust the Sheet Height (the number of vertical pages which comprise a sheet — ie how many pages down before a new header is created) especially if you have changed the orientation of the paper after creating the report. To do this, with the report as the active window (ie in the foreground).

• Choose Report Options (View menu or button showing pointing finger)

• Adjust the number of Pages alongside Sheet Height at the bottom left of the dialog



• Choose OK

In addition to Preview, you may also get an overview of the report (and of any other chart or report) by using the Scale submenu of the Special menu: Reduce (Shift + F2) shrinks the view down one step at a time.

[What to do next? Why not investigate the Work Breakdown Structure and examine Archiving and Progress?]

release

SECTION TWO

notes

This section contains important information that is not included in the *Micro Planner* Reference Manuals.

Please read it carefully so that you can take advantage of all the new facilities that have been incorporated into the software.

As existing *Micro Planner* users will have noticed, the software has a new installation program — this is to allow us to distribute via the Internet and CD-ROM.

The Installation program gives you the option to install a number of sample files — these are projects illustrating the variety and scope of features provided by *Micro Planner*. Accompanying these projects are a number of other example files which include sorting and selection criteria, report stationery and an image table containing some clip art — you are free to adapt these for your own use.

In addition, a 'QuickStart Tutorial' is provided to give you a brief introduction to some of the major facilities offered by *Micro Planner*. The tutorial is supplied in HTML format and therefore requires a Web Browser to view; it is intended to be 'platform agnostic' or neutral, so it includes screen dumps taken from both Mac OS and Windows systems.

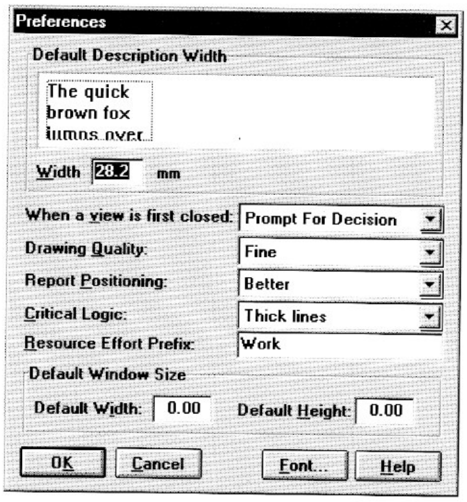
As well as these changes, a number of new features have been implemented and are described in the following pages...

new preferences

While the Project Control Panel allows you to specify options relating to the current project, the Preferences dialog allows you to control various operational aspects and set options for *all* projects opened or created by *Micro Planner*.

■ **Choose Preferences from the File menu.**

This dialog appears...



The Preferences dialog has been changed slightly from the one covered by the *Micro Planner* Reference manual. A number of extra facilities are now available:

drawing quality

The drawing quality controls the drawing of *Micro Planner*'s diagrams and reports — you have the choice of Coarse, Medium and Fine (the default).

Some display and printer drivers are unable to cope with the default quality - for example, the network diagram has level lines, represented as dotted blue lines, which may not be visible; in this instance you should try the other drawing quality alternatives until you achieve an acceptable effect. To modify the drawing quality and view the effect:

- **Change the selection in the drop down list.**

- **Click OK to save the changes.**
- **Minimise *Micro Planner* and then restore it.**
- **The new drawing quality will now be in effect.**

note:
You may find that your diagrams and reports draw more quickly and screen output matches plotted output more closely if the Coarse option is selected.

report positioning

Report Positioning refers to the measurement of variable comments and descriptions on reports (both Standard and Custom reports).

There are two options available:

• **Faster** is the method used by other, previous versions of *Micro Planner* — a heuristic is used to calculate the height of a given piece of text.; reports are drawn more quickly but some description or comment information may be cropped as *Micro Planner* estimates their size and position.

• **Better** measures the text accurately but is considerably slower as *Micro Planner* calculates precisely how many lines are required by each task's description and comment to guarantee an accurate layout.

To select your required option:

- **Choose Better or Faster from the drop down list.**

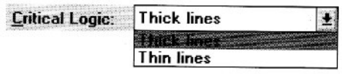
note:

Faster will normally produce perfectly good results, but you may find that the variable comment and description are incorrectly sized (this can happen particularly with languages other than English); in this case you should switch to Better positioning.

critical logic

You now have a choice as to whether critical (red) nodes and lines should be drawn on the Network diagram with the same thickness as non-critical or progressed items (black and blue respectively); this applies to networks produced both on screen and on a printer/plotter. To change this:

- **Click on the Critical Logic drop down menu.**
- **Choose the required line thickness.**



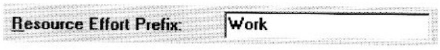
note:

If you have a black and white screen or printer/plotter, it would be advisable to select the 'Thick lines' option so that the critical path may be distinguished from normal activities.

resource effort prefix

You now have the option to change the prefix used to describe 'resource effort'; whereas previous versions of *Micro Planner* always described resource effort in terms of Man Weeks or Man Hours and so on. The default setting has been changed to 'Work' but you may change the text used to anything you like – 'Machine', 'Person' or anything else, including leaving it blank. To do this:

- **Move to the Resource Effort Prefix box and type the new text as required.**

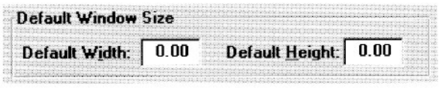


The new prefix will now appear in the resource usage and availability dialogs and be used on relevant reports, such as summary histograms.

default window size

The initial size of a window in *Micro Planner* has a default setting of zero to allow Windows to control the default window size. If you have a larger screen available and wish to change the default to take advantage of the additional space...

• Click inside the Width (or Height) box, highlight as required and type the new width (or height).



accepting changes

When you have made all the necessary changes in the Preferences dialog...

■ Choose the OK button to accept.

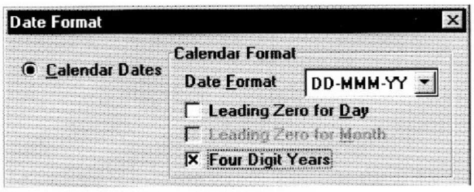
[More information on Preferences can be found in Book 1, Chapter 8, pp194-7]

changes to date format

An option to show the century has been added to the Date Format dialog. This is intended primarily for the export of data to applications that could otherwise confuse 2000 with 1900. Date fields in the standard reports have been extended to accommodate the century if it is used, but you may need to amend any custom report stationery that you have created. To specify a four digit year format:

■ Choose Control Panel from the Special menu.

■ Choose the Date Format button to display the following dialog...



■ Click the Four Digit Years check box so that a cross appears.

note:

Year 2000 Compliance — the *Micro Planner* range of project management software (both Windows and MacOS) is not only capable of coping with the year 2000 itself but also of handling correctly the fact that it is a Leap Year. In fact, we already have clients planning projects whose deadlines extend past 2000. The software encounters no problems because it uses its own internal date calculation routines. Four digit year codes have been implemented to compensate for the shortcomings of other packages when data is exchanged with *Micro Planner*.

[More information on Date Formats can be found in Book 1, Chapter 8, pp186-94]

changes to the network diagram

network drawing size

The maximum size of a network diagram has been increased to approximately 10.5 metres square (over 34 feet!).

scaling the network diagram

When you scale (Enlarge or Reduce) the Network Diagram (Subproject) if there is a single node selected it will remain in the visible area of the window.

deleting network items

In addition to using Cut and/or Clear from the Edit menu, you can use the Backspace key to Clear items from network diagrams.

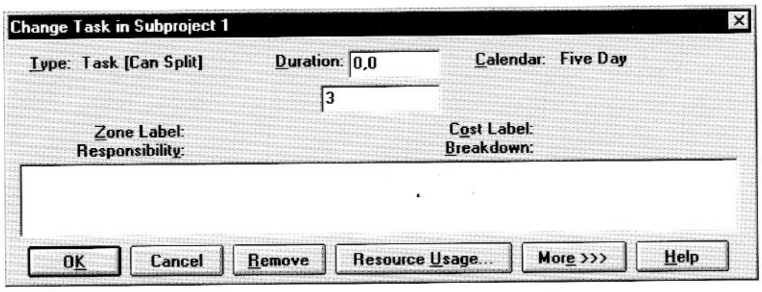
note:

When using this facility take care to remember that using the Backspace key on a report only *prunes* an item from the report temporarily, whereas using the Backspace key on the network diagram *removes* it permanently.

adding precedence logic

Adding tasks (in Precedence mode) by using the mouse to drag out from an existing node used to mean opening the new task by double clicking on it in order to enter its description, duration etc; there is now an option to edit the new task before you accept it. To do this:

- **Hold down the *Alt* key while dragging out from a node (in precedence mode).**
- **The 'Change Task' dialog appears allowing you to enter details.**



■ **Click OK to accept the new task.**

In addition you can now modify both the link and the task while dragging out from an existing node. To do this:

■ **Hold down both the Alt and Control keys while dragging out.**

■ **The 'Add Link' dialog appears for you to enter details.**

■ **Click OK to accept the new link.**

■ **Now, the 'Change Task' dialog appears.**

■ **Enter the task details and click OK to see the new logic in the network.**

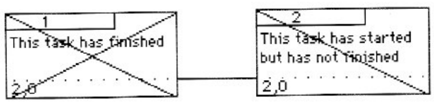
cross out progressed tasks

In response to client requests, a 'Cross Out Progressed Tasks' feature has been added to the network diagram options. This draws a single diagonal line through a task if it has started and crossed lines if it is finished. To use this facility, do the following:

■ **Choose Network Options from the View menu.**

■ **Click the Cross Out Progressed Tasks check box so that the cross appears.**

■ **Choose OK.**



note:

The 'Cross Out Progressed Tasks' facility is only available on Precedence networks — there is no equivalent in Arrow

moving around the network

As an alternative to the scroll bars, you can now navigate or move around the network diagram by using the arrow (cursor) keys once you have selected one item. This is particularly useful on large projects when you are tracing multiple predecessors and successors of a particular node.

[More information on Presenting and Editing the Network can be found in Book 1, Chapters 6 & 7]

new clean up facilities

In addition to the option to clean up levels by deleting all empty guidelines within your network model and reducing those remaining to their minimum height, *Micro Planner* can now also clean up the layout of the logic itself.

cleaning up your logic

The most obvious objective when organising a network is to improve its visual clarity. The new 'Clean Up Network' facility lets *Micro Planner* rearrange the network layout, clean up overlapping lines and alter the size of the description field. To use these new facilities:

- **Choose Clean Up Network from the Special menu.**
- **Select your required Clean Up options.**

Complex networks can take a long time to lay out, particularly with the removal of 'Overlapping Lines', so, if you just want to view the network without waiting for it to be tidied up, you can deselect the option to 'Clean Up Overlapping Lines'.

When you use 'Clean Up Logic', the 'Description Widths' option is preset to 'Leave Unchanged' so they will be left alone while the network is being reorganised. If you wish to change this:

- **Decide whether you want description widths unchanged, set to the Default size (as specified in the Preferences dialog) or fitted to the description size while the network is being reorganised.**

Once everything is the way you want it:

- **Choose OK to accept the selection and your network is altered accordingly.**

Your network will now be altered accordingly. If you do not like the way *Micro Planner* has laid out your network you can choose to Undo via the Edit menu.

hints!

- 'Fit to Description Width' can be used on its own to simply ensure that the full description for all your network items is visible; simply select it from the pop-up menu and, having deselected the other options, click Clean Up.

- These Clean Up options are particularly useful for organising project information brought in from other project management systems.

[More information on Clean Up can be found in Book 1, Chapter 6, p136]

new copy and paste features

Copy and paste has always been a powerful way to duplicate portions of your network and transfer them to other projects or elsewhere within an existing project. Copy and paste has now been enhanced to give you greater flexibility in the type of information that can be transferred and its format when it reaches its destination.

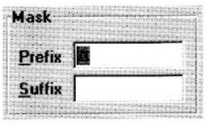
copying and pasting logic

An additional option is now available for the renaming of nodes when logic is copied and pasted.

The default behaviour is that if a node name or number being pasted is identical to one already present in the subproject, a completely new name will be invented. So, for example, the four tasks numbered 1-2-3-4 when copied will be pasted as 5-6-7-8, if 1-2-3-4 already exist in the destination subproject.

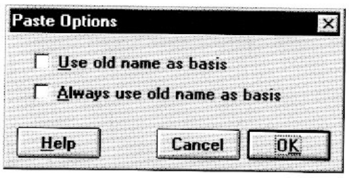
The new option allows you to copy and paste your network logic retaining the original node numbers but adding a prefix or a suffix. This means that you can choose to copy 1-2-3-4 and paste them as A1-A2-A3-A4 rather than leaving *Micro Planner* to renumber them as 5-6-7-8. To use this new option:

- **Open a subproject and create the logic you wish to copy.**
- **Choose Network Options from the View menu.**
- **Type a character in the Mask Prefix or Suffix then click OK.**



- **Select the logic to be copied in the usual way.**
- **Choose Copy from the Edit menu.**
- **While holding down the *Shift* and *Control* keys, choose Paste from the Edit menu.**

The following dialog appears...



■ **Click Use old name as basis.**

If you wish to use this method every time you copy and paste, select 'Always use old name as basis'.

■ **Click OK.**

The new logic now appears in the network using your chosen Prefix or Suffix.

note:

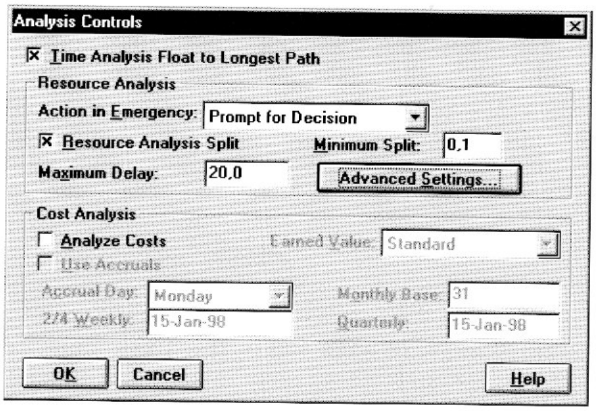
If you wish to copy and paste logic between different project files (or subprojects), you need to ensure that the relevant Mask Prefix or Suffix is set in the Network Options dialog in the destination project before you paste.

[More information on copying and pasting logic can be found in Book 1, Chapter 7, pp168-74]

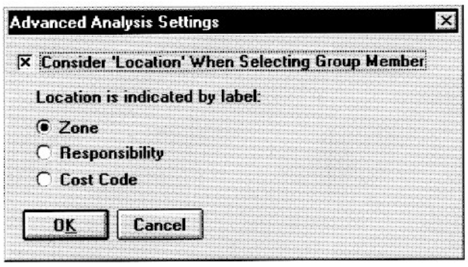
resource analysing group resources

As well efficiency, 'location' can now also be specified as a factor to influence which resource is chosen from a group during resource analysis. If selected, resource analysis considers availability then location then efficiency when allocating a resource from a Group to a task — if this facility is enabled, location takes priority over the efficiency rating of the resource otherwise Group resources operate as before. To use this new facility:

■ **Choose Analysis Controls from the Analysis menu.**



■ **Select Advanced Settings and the following dialog appears...**



As you can see the labels — Zone, Responsibility, Cost Code — in *Micro Planner* can now be used to specify a 'location' for a task. This means once a resource has been assigned to a task at a particular location, resource analysis will ensure it stays there to do any subsequent tasks unless it is required by more critical tasks at a different location — this is designed to prevent unnecessary, inefficient travelling wherever possible.

notes:

• A resource has no 'location' of its own, it gets one from the task that uses it. This location information is tracked for *all* resources but resource analysis only uses it when choosing a member from a Group.

• The proximity of labels to one another in the relevant Label List is used by resource analysis to assess the distance between different locations — those next to each other in the Label List will be assumed closer than those at opposite ends.

• Resource analysis assumes that a task with no 'location' label can happen at any location and, therefore, the location of a resource is not considered during its allocation.

When you wish to take account of location:

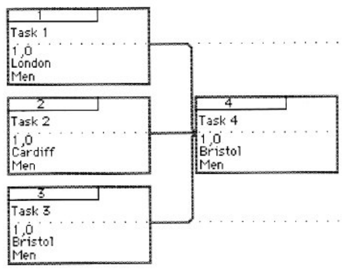
■ **Click the Consider 'Location' When Selecting Group Member check box so that a cross appears.**

■ **Select which label - Zone, Responsibility, Cost Code - is to be used to specify location.**

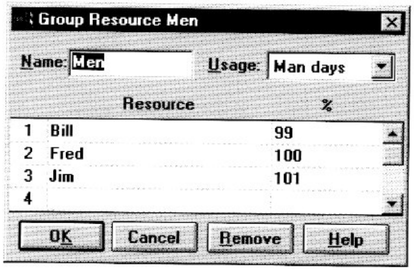
■ **Click OK.**

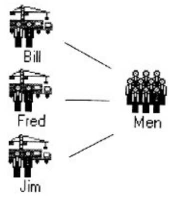
example!

A small network contains three tasks in parallel each of 1 week duration followed by a fourth task with all of them using 1 resource from the Group — Men. Tasks 1 to 3 have Zone labels London, Cardiff and Bristol respectively, while Task 4 has the Zone label Bristol.



The Group Resource — Men — comprises Bill, Fred and Jim who are all available full time, with the following efficiency ratings:





If we resource analyse our small project without selecting 'Consider Location', we obtain the following result:

			Duration	Start	Finish
London	Task 1		1,0	0,0	1,0
		Bill		1.00 Rate	
Cardiff	Task 2		1,0	0,0	0,4...
		Jim		1.00 Rate	
Bristol	Task 3		1,0	0,0	1,0
		Fred		1.00 Rate	
Bristol	Task 4		1,0	1,0	1,4...
		Jim		1.00 Rate	

If we select 'Consider Location' (to use Location ahead of Efficiency rating as the means of choosing the resource for Task 4) and re-analyse, our results change, as follows:

			Duration	Start	Finish
London	Task 1		1,0	0,0	1,0
		Bill		1.00 Rate	
Cardiff	Task 2		1,0	0,0	0,4...
		Jim		1.00 Rate	
Bristol	Task 3		1,0	0,0	1,0
		Fred		1.00 Rate	
Bristol	Task 4		1,0	1,0	2,0
		Fred		1.00 Rate	

Instead of choosing Jim (the most efficient resource), resource analysis has now chosen Fred to work on Task 4 because he is already located in Bristol having completed Task 3.

[More information on Group Resources during Resource Analysis can be found in Book 2, Chapter 14, pp86-87 and on the creation and use of Labels in Book 3, Chapter 19, pp4-8]

enhancements to list resource dialog

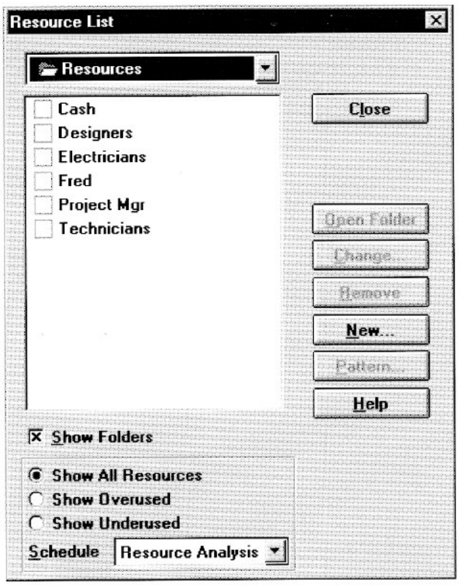
Directory lists are available for Weekly Cycles, Calendars and Resources which can be used for selection throughout all areas of the program.

To increase the functionality of the Resource list, a number of modifications and enhancements have been made.

using resource filtering

You can now filter the list of resources to view only overused (overloaded) or underused resources, based on current Resource Analysis results or on the information stored in the Master or Interim Archives. To do this:

■ Choose List Resources from the List Menu and the following dialog appears...



■ Select the required resource selection - All, Overused, Underused.

■ Click on the Schedule drop down menu and choose the required schedule - Resource Analysis, Interim Archive, Master Archive.

The list of resources changes to reflect the options selected. This provides a quick way of filtering resources to see those having the largest impact on the project.

producing a histogram or cost profile

In addition to selecting Resource Histogram or Cost Profile from the View menu, you can now create either chart for a selected resource simply by highlighting the resource in the List, pressing the right mouse button and choosing your required chart from the pop-up menu.

note:

The schedule used for the histogram will be the one specified in the Schedule menu.

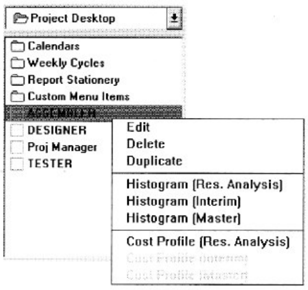
With these new features added to the Resource List dialog, you can now easily view a Summary Histogram for any resource that has been overloaded by Resource Analysis, like this...

▪ **Select the Resource Analysis schedule from the Schedule drop down menu.**

The Resource List changes to show only those resources that are overloaded.

▪ **Highlight your chosen resource and press the right mouse button.**

The following menu appears...



▪ **Choose the chart you wish to see.**

The appropriate chart opens showing the schedule and the resource you have selected.

[More information on Resource Lists can be found in Book 2, Chapter 12, pp14-15, on Summary Histograms in Book 2, Chapter 17, pp 166-77 and on Cost Profiles in Book 2, Chapter 17, pp178-96]

changes to cost profiles

Cost Profiles are a graphic presentation of cost results against a calendar and form the central facility for cost control and performance monitoring. Comparison profiles are used to monitor cost performance against archived results, in particular the original project budget stored in the Master Archive.

To ensure that results are more consistent, Cost Profiles have been modified as follows:

- A Cumulative Cost Profile will display costs to the end of the chosen time period.

- A Non-cumulative Cost Profile will display costs from the start of the chosen time period.

notes:

- All costs will be aligned to Accrual periods if that option has been selected in the Analysis Controls dialog.

- Tabular Cost Profiles are now exported according to the Time Interval you set in the Cost Profile Options dialog and not just daily as before.

[More information on Cost Profiles can be found in Book 2, Chapter 17, pp178-96]

using the right mouse button

As with other Windows applications, the use of the right mouse button within *Micro Planner* offers additional functionality. Using the right mouse button to select an icon on the desktop causes a pop up menu to appear from which a number of options may be selected; the options available depend upon the type of item selected.

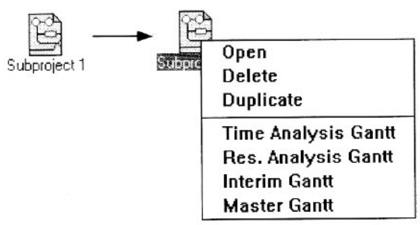
note:

Please note that if you use the Mouse/Trackball Control Centre Utility to assign various functions to the right mouse button within Windows, you may need to alter some of the settings within this utility. To take advantage of the right mouse button features, you must ensure that the right mouse button option is set to 'Unassigned'. Naturally if you have swapped the mouse button functions to left hand operation, it is the left mouse button that must be set to 'Unassigned'.

subprojects

In addition to being able to Open, Delete and Duplicate the selected subproject, you have the option to generate a Gantt Chart showing just the one subproject selected. To do this:

▪ Move the pointer onto the relevant subproject then press the right mouse button to obtain this menu...



■ **Select a Gantt Chart of the contents of the subproject based on Time Analysis or Resource Analysis results, or on the information stored in the Interim or Master Archives.**

work breakdown structure

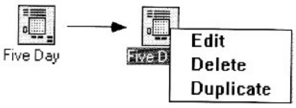
The Work Breakdown Structure can only be opened and it can not be deleted.

folders

Folders may be opened; only empty folders may be deleted.

calendars and weekly cycles

Calendars and Weekly Cycles may be edited and duplicated; they may also be deleted if they are not being used.



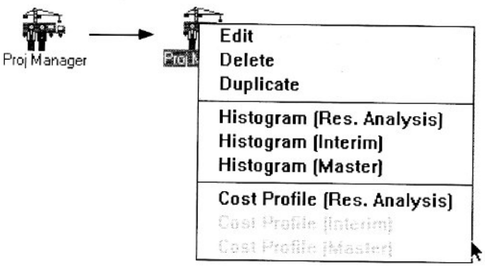
note:

The same menu appears if you select a calendar or weekly cycle from the 'List Calendars' or 'List Weekly Cycles' dialogs and press the right mouse button.

resources

In addition to being able to Edit, Delete and Duplicate the selected resource, you have the option to generate a Summary Histogram or a Cost Profile of the resource. To do this:

■ **Move the pointer onto the relevant resource then press the right mouse button to obtain this menu...**



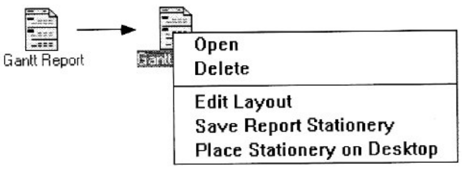
- **Select a Histogram or a Cost Profile of the resource based on Resource Analysis results, or on the information stored in the Interim or Master Archives.**

note:

The same menu appears if you select a resource from the 'List Resources' dialog and press the right mouse button.

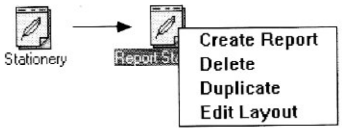
report and charts

Reports and Charts may be opened and deleted. Reports also allow the report layout to be altered or saved as report stationery.



report stationery (excluding standard stationery)

Report Stationery that you have designed may be deleted, duplicated or edited; reports may also be generated from the selected stationery.



note:

This option is not available on report stationery for the standard reports produced by *Micro Planner*.

printing enhancements

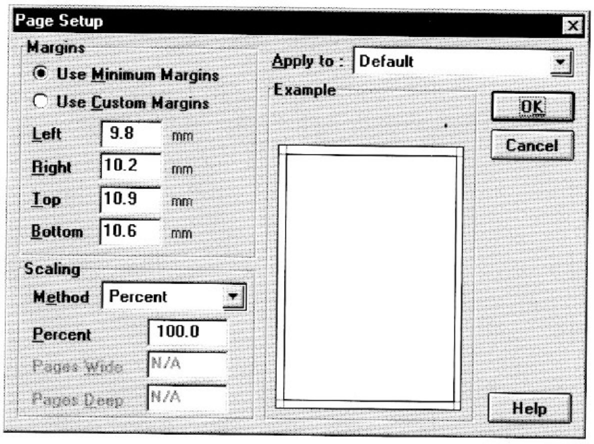
Micro Planner can now scale any chart or report to any Windows compatible device. To scale an output:

- **Choose Page Setup from the File menu.**

note:

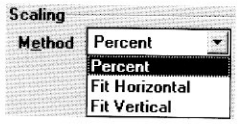
You may select Page Setup even while using the Preview facility so you can fine tune report layouts before printing.

The following dialog appears...



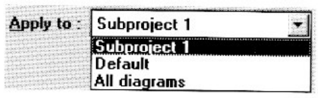
■ **Select your required options.**

As you can see a number of options are available:



• **Margins** allows you to choose whether to use margins that are predefined to maximise the printable area of your paper or to select your own settings.

• **Scaling** allows you to scale any or all of your reports and charts by page(s), either horizontally or vertically, or by a set percentage.



• **Apply To** allows you to choose whether you wish to apply the Margin and Scaling settings to a particular report, only reports produced from now on or all reports.

Finally, the **Example** area automatically changes to illustrate the paper size, orientation and the margins you have selected so you have a chance to see the effect of your selections before leaving the dialog. Once you are happy...

■ **Click OK.**

Your chart or report is now scaled to your specification.

notes:

• If you select Fit Horizontal or Fit Vertical as a scaling option and later change the orientation of your paper in the Print Setup dialog, the scaling will have been converted to a percentage scale to maintain the original size of your report. If you wish to ensure the report fits to your new page, return to the Page Setup dialog and reselect the appropriate option.

• Changes made to the Drawing Size may affect any scaling settings for network diagrams in a similar way.

using hatched patterns

A new option is now available on the Print Dialog to allow the use of Hatched patterns (instead of solid colour) on reports to speed up printing/plotting and reduce amount of ink used; this applies particularly to outputs with large areas of solid colour/pattern, for example Histograms and Cost Pie Charts.

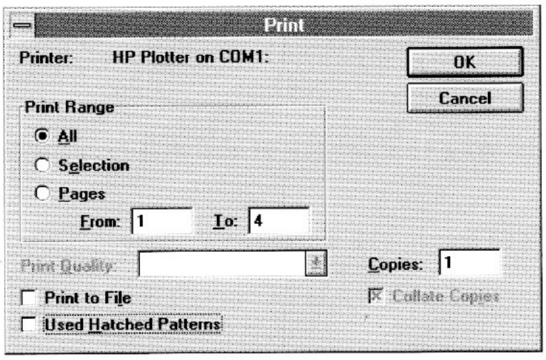
note:

A Hatched pattern is one which is created using a series of parallel lines rather than the solid pattern produced by bitmaps.

If the option is selected, *Micro Planner* will try to find a hatched pattern which matches as closely as possible the bitmapped pattern of the original. To use Hatched patterns:

- **Choose Print from the File menu.**

The following dialog appears...



- **Click the Use Hatched Patterns check box so that a cross appears.**
- **Click OK.**

Your chart or report will now print using Hatched patterns.

notes:

- The option to use Hatched patterns is only available if the device chosen (via Print Setup) is a vector device (i.e. a pen plotter).
- The Set Up button has been removed from the Print dialog — printer settings should be set using Print Set Up from the File menu.

[More information on Printing can be found in Book 3, Chapter 21, pp106-15]

changes to the report editor

In addition to a suite of standard reports, *Micro Planner* offers a Custom Report Editor to allow you to design and save your own report layouts. The Report Editor allows you to create reusable report templates containing preferred fonts, logos and legends, as well as resources and operations. A blank drawing area lets you arrange headers, footers, labels, resources and any data field (including static graphics or images that change with each record) to suit your particular requirements.

resizing the components dialog

At the bottom of the Report Editor Layout window is the Component Window which is rather like a toolbox full of objects that you can place on the layout; these objects are the data fields in *Micro Planner* that can be applied to a report. You may wish to change the size of this window — to do so:

- **Choose Report Stationery from the Edit menu and then choose New Stationery from the submenu.**

- **Click with the right mouse button anywhere on the Components Dialog other than the title bar or system menu.**

A normal re-sizable border will appear.

- **Use the left mouse button to click and drag the border of the dialog until it is the size you want.**

- **Click on the dialog with the right mouse button as before.**

The Components Dialog will default to this size unless it is changed again or the .ini file is deleted.

note:

The Resource Usage dialog can also be re-sized to allow you to show more or less resource entries for a task or activity, up to the maximum of 20 entries.

other minor changes

Using the Tab key in the Report Editor enables you to move around the entire layout.

The Today's Date and Today's Time Report components update in 'real time' according to the system clock. This means that a report created today and kept on the desktop will show tomorrow's date tomorrow.

[More information on the Report Editor, Stationery and Custom Reports can be found in Book 3, Chapter 22]

file transfer

Transferring data between different applications and different operating systems is becoming more and more important as companies try to streamline operations and minimise duplication of effort. With this in mind, *Micro Planner* has been enhanced in a number of areas...

merging projects (only available in X-Pert)

calendars

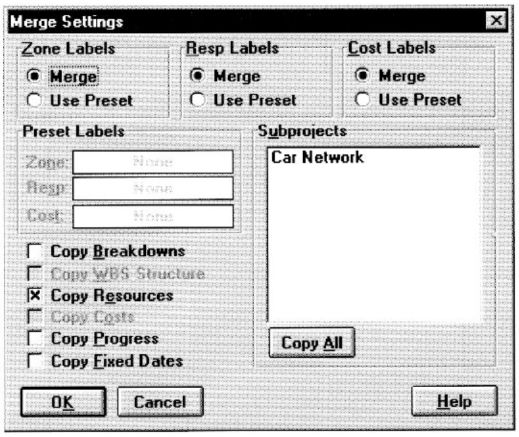
Calendars are only brought in with resources and operations if they differ from calendars which already exist in the destination project. This applies even if Calendars share the same name in both the source and the destination projects; for example, if a 'Five Day' calendar exists in both projects but in the source file it has a different Basic Cycle and/or Overlays, it will be imported by Merge and given a unique name - 'Five Day 2'

work breakdown structure

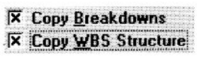
The Merge facility has been enhanced to copy the Structure of the Work Breakdown Structure (WBS) as well as the breakdown elements (Breakdowns) when a file is merged. To merge a structure, do this...

- **Choose Merge from the File menu.**
- **Select the project to be merged then choose OK.**

The following dialog appears...



- **Click the Copy Breakdowns check box so that a cross appears.**
- **Click the Copy WBS Structure check box so that a cross appears.**



▪ Select any other required options then choose OK to close this dialog.

The project is merged (imported).

note:

This dialog now gives you the option to bring either only those breakdowns used or the whole structure.

If you have specified a subproject to be merged, only those breakdown elements linked to operations in that subproject will be merged. If you have no subprojects specified, the entire WBS will be merged.

The only exception to this is when you select "Copy WBS Structure" with a subproject specified, it selects all breakdowns used on the subproject and merges them – it will also bring in associated breakdowns which may not be used by any tasks if they are parents of any of the breakdowns used. For example, we are merging a subproject that has a WBS consisting of a breakdown 1 and its child 11. On all the tasks in the subproject only 11 is used. If we choose to merge the subproject and copy breakdowns without structure, only 11 will be transferred - but if we merge the subproject and copy breakdowns with structure both 11 and 1 will be transferred since 11 is a dependant of 1.

[More information on Merge can be found in Book 3, Chapter 28, pp398-404]

reading Microsoft Project files

Micro Planner can read documents created by Microsoft Project, if they have been saved in MPX format. To import an MPX file the following minimum requirements must be met:

- All dates must show: DAY, MONTH, YEAR and TIME fields.

note:

You should select the correct date format (31/1/99 12:33) from the Options dialog on the Tools menu in Microsoft Project. Do not assume that if you change the Date format displayed on a table in the Edit Table Options dialog that the format has been changed - it has not.

For an MPX project file without resources the following task fields must be present:

- I.D.
- Preceding Number (predecessor).
- Duration.
- Outline Level.
- Name.
- Summary.

For an MPX file with resources the same fields as above, plus the following resource fields must be present:

- Resource Name.
- I.D.
- Maximum Unit.

For further information regarding MPX files, you should refer either to your Microsoft Project documentation or contact Microsoft Technical Support.

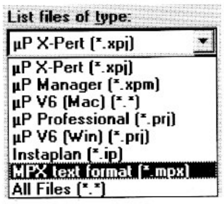
Once you have your project file correctly saved in MPX format, you can convert it like this...

■ Run *Micro Planner.*

■ Choose Open from the File menu.

The Open dialog appears.

■ Choose the MPX text format (*.mpx) from the List Files of Type: box.



■ If necessary, switch drives and/or directories then select the required MPX document and choose OK.

The converted network will be placed in a new subproject on the Project Desktop and the project will bring with it all the Resource types that it needs. The default calendar used by Microsoft Project will be brought in and applied to all operations, including any new operations that are added to the project once it is a *Micro Planner* file.

hint!

Having brought in a file from Microsoft Project, we recommend that you use 'Clean Up Network' to tidy up the network diagram!

[More information on Converting MPX Files can be found in Book 3, Chapter 28, p413]

exporting to Predict!

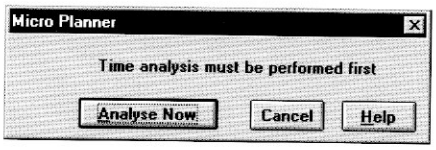
Predict! Risk Analyser is a powerful Risk Analysis tool produced by Risk Decisions Ltd. It is designed to build models that include uncertainty and its spreadsheet based environment offers a choice of Monte Carlo or Latin Hypercube simulation as well as providing up to 26 standard distribution shapes. Predict! is ideal for decision making and modelling both financial and non-financial problems, including such factors as time/duration, reliability, processes and workforce performance.

To give our clients an opportunity to consider the uncertainties and risks affecting project timings/durations, costs and cash on *Micro Planner* projects, a new link has been implemented which allows the transfer of data to Predict! Risk Analyser.

Transferring *Micro Planner* project information to Predict! could not be easier...

- **Choose Time Analysis from the Analysis menu.**

The *Micro Planner* project must have been time analysed before you export to Predict! because the calculated start and finish dates will be required for the risk analysis. If you try to export before running Time Analysis, you will see this warning message...



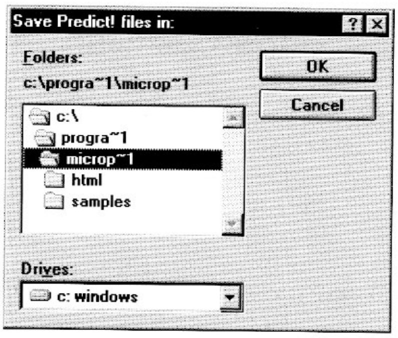
notes:

- Only Time Analysis results are understood by Predict! It is not possible to risk analyse project information using resource analysis or archived information.

- Predict! does not understand Activity-on-Arrow projects so the *Micro Planner* link only works for Precedence projects.

- **Choose Export to Predict! from the File menu.**

The following dialog appears allowing you to specify where you wish to save the export files...



- **Choose an appropriate destination directory and/or drive.**

■ **Click OK.**

The export file is saved.

note:

Three files are saved - MP1, MP2 and MP3 - but when you open Predict! you will only see one file name. These three files contain the following information...

File <Project>.MP1 - project information

Type	Chars	Field
String	48	Project name
Date	7	start date
Date	7	estimated end date
Float	6	Week length (hours, format XXX.XX)
Int	1	Number of worked days

File <Project>.MP2 - task information

Type	Chars	Field
String	50	Description
Int	5	integer ID (unique across all subprojects)
String	8	(String) identifier (unique within subproject)
String	16	subproject
Long	10	duration (minutes)
String	1	'm'
Int	3	percentage complete
Date*	7	Actual start
Date*	7	Imposed date
String	2	Imposed type (SB/SO/SA EB/EO/EA or blank)
Float	12	Fixed cost
Float	12	Cost to date
Float	12	Future cost

File <Project>.MP3 - link information

Type	Chars	Field
Int	5	Predecessor
Int	5	Successor
String	16	Subproject
String	2	Link type (SS/SF/FS/FF)
Long	10	duration
String	1	'm'

Interfaces are output to a separate subproject (called "INTERFACE") containing the interface nodes.

To open the information in Predict is equally easy...

■ **Run Predict! and choose Open from the File menu.**

■ **Select X-Pert from the file type options.**

▪ **Find the file name <Project> that you saved from *Micro Planner* and click OK.**

▪ **Select the appropriate options from the Predict! dialog that appears.**

The file is loaded and you are ready to run whatever simulations you choose.

For further information regarding Predict!, you should refer either to your Predict! Risk Analyser documentation or contact Risk Decisions Ltd Technical Support.

miscellaneous

tiling

Tile now tiles open windows horizontally. If you wish to tile vertically...

▪ **Hold down the Shift key when you select Tile from the Window menu.**

[More information on Tiling and Working with Windows can be found in Book 1, Chapter 1, pp18-21]

follow selection changes

In response to client requests, the 'Follow Selection Changes' facility has been implemented to let you to choose whether you wish a selected item to be highlighted in every chart or report that you view, rather than just the one in which you made the original selection.

This means that if you select a particular operation in one view (for example, a Network Diagram) whilst other views are open (for example, a Gantt chart), the views already open will change to highlight the same operation — provided the operation is included in the chart or report's selection criteria!

▪ **Choose Follow Selection Changes from the Window menu.**

The tick which appears next to the Follow Selection Changes command indicates that the option is currently selected. To deslect it, choose Follow Selection Changes from the Window menu again.

hint!

This feature is particular useful for scrolling through a large project and keeping track of fields that are relevant to a given section of the table but are out of the display boundary of the window. Simply create two identical tables, tile them vertically and turn on 'Follow Selection Changes' - you can then ensure that the node number remains visible in the left hand table while you are free to move horizontally through the fields of the table in the right hand window.

Similarly it can be used in the same way as Panes in Excel or other spreadsheets to enable different worksheet areas to scroll together. Again create two identical tables, tile them vertically and turn on 'Follow Selection Changes' - you can select a row in either table and the other table will automatically change to follow the selection.

resizing the resource usage window

This window can be re-sized to show more or less resource entries for a task or activity, up to a maximum of 20 entries. To change the size of the window:

- **Use the left mouse button to click and drag the border of the dialog until it is the size you want.**
- **The Resource Usage Dialog will default to this size unless it is changed again or the .ini file is deleted.**

[More information on the Resource Usage Dialog can be found in Book 2, Chapter 13, pp30-46]

editing the .ini file

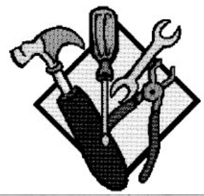
The .ini file is created by *Micro Planner* in the Windows directory; Preferences selected by you are stored here. You can edit this file directly using, for example, Windows NotePad, but you should take care and only do so if you are clear about what to do. If a mistake is made, simply delete the file and run *Micro Planner* again. This will automatically generate a new, default, .ini file.

note:

Micro Planning International Ltd cannot take responsibility for problems introduced by editing the .ini file.

using the toolbar

SECTION THREE

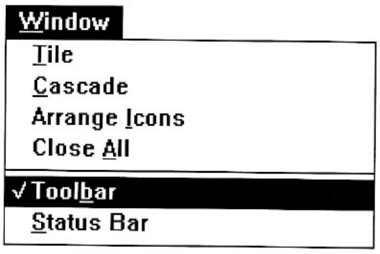


The toolbar provides the user with an alternative and more rapid way of selecting certain menu commands. This section illustrates what appears on the different toolbars, and also describes how to use the toolbar.

micro planner toolbar

The *Micro Planner* toolbar contains a set of buttons which provide an alternative way of selecting certain menu commands. The toolbar is an optional facility which if you require more space you can hide in the following way...

■ Place the mouse pointer on the Window menu and hold down the mouse button...



The tick which appears next to the Toolbar command indicates that the option is currently selected — to reverse this:

■ ...drag the mouse pointer to Toolbar then release the mouse button to deselect it.

The toolbar disappears from the *Micro Planner* window — and the tick next to the Toolbar command also disappears indicating that it is deselected.

customising toolbar colours and size

Micro Planner defaults to using small, 16 colour buttons on the toolbar. You can change the number of colours and size by modifying the [Preferences] section of the .ini file.

The default settings are:

[Preferences]
toolBarColour=4c
toolBarSize=s

Possible values for toolBarColour are:

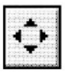
toolBarColour=4c (16 colour)
toolBarColour=4g (grey)
toolBarColour=m (black and white)

Possible values for toolBarSize are:

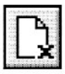
toolBarSize=s (small)
toolBarSize=m (medium)

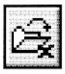
A brief description of the function of the Toolbar buttons is available on the following pages...

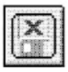
the main - *micro planner* - toolbar

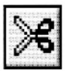
 Resizes the current window to fit the available area (optimizes).

 Displays the Help index.

 Creates a new project.

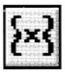
 Opens an existing project.

 Saves the current project.

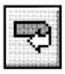
 Cuts the current selection.

 Copies the current selection.

 Pastes the contents of the clipboard at the insertion point.

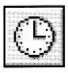
 Selects all items in the current window.

 Duplicates current selection.

 Undoes the previous action.

 Clears the current selection.

 Deletes the current selection.

 Initiates a Time Analysis

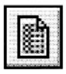
 Initiates a Resource Analysis- deadline critical

 Initiates a Resource Analysis- resource critical

 Archives resource and cost results.

 Produces a Gantt Chart

 Produces a Linked Gantt Chart

 Produces a Table.

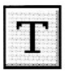
 Displays the Reports Menu

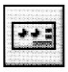
 Lists the Custom Menu Items

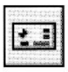
 Produces a Resource Histogram

 Produces a Cost Profile

 Produces a Cost Pie

 Displays the Font selection dialog.

 Displays the Project Control Panel

 Displays the Analysis Controls dialog

 Displays the Progress Details dialog.

 Tiles all the open windows.

Cascades all the open windows.

Turns the Status Bar On/Off.

Imports information from other files.

Merges information from other Micro Planner projects.

project desktop toolbar

Displays information about the currently selected item.

Creates a new folder in the current window.

Creates a new subproject.

Creates a new Calendar.

Creates a new Weekly Cycle.

Creates a new resource.

Creates a new report template.

Loads an existing report template.

Edits the layout of the current or selected report or stationery.

Saves the selected report stationery to disk.

Creates a new template based on the layout of the selected report (place stationery on desktop).

Arranges the icons in the current window.

note:

This toolbar also appears on the Calendars, Weekly Cycle, Report Stationery and Custom menu items folders.

network diagram toolbar

Changes the technique to Precedence.

Changes the technique to arrow.

Adds new task/event in the current subproject.

Displays the drawing size dialog.

Previews the network diagram.

Displays the Print Setup dialog.

Adds new link/activity in the current subproject.

Displays the network diagram options dialog.

Displays information about the currently selected item.

Cleans up the network diagram.

Displays a list of all the operation in the network.

Displays a list of all the dangles in the network diagram.

Displays a list of the predecessors to the selected operation.

Displays a list of the successors to the selected operation.

Moves to a specified operation.

Finds a specified operation.

Finds the next operation with the same specification.

Displays the scale menu.

Prints the network diagram.

Copies the current chart to a picture file.

Adds a text annotation to the network diagram.

Adds a graphic annotation to the network diagram.

Adds a key to the network diagram.

Displays the annotation options dialog.

gantt chart toolbar

Displays the gantt chart options dialog.

Displays information about the currently selected item.

Displays the scale menu.

Previews the gantt chart.

Displays the Print Setup dialog.

Prints the gantt chart.

Copies the current chart to a picture file.

work breakdown toolbar

Displays the work breakdown elements in the tree format.

Displays the work breakdown elements in a tree format.

Adds a new work breakdown element.

Converts the selected work breakdown element to a task.

Displays the work breakdown options dialog.

Displays information about the currently selected item.

Displays a list of all the work breakdown codes.

Displays the scale menu.

Previews the work breakdown structure.

Displays the Print Setup dialog.

Prints the work breakdown structure.

Copies the current chart to a picture file.

Shows/hides the children of the selected work breakdown element.

Shows/hides all descendants of the selected work breakdown element.

Shows the operations linked to the selected work breakdown element.

Shows all operations linked to the descendants of the selected element.

Hides all operations linked to the selected work breakdown element.

Promotes the children of the selected work breakdown element up one level.

Demotes the children of the selected work breakdown element down a level.

Moves the selected element and its descendants up within the same level.

Moves the selected element and its descendants down within the same level.

Moves the selected element and its descendants up to the next level.

Moves the selected element and its descendants to the level below.

report stationery toolbar

Displays the report layout options dialog.

Displays/hides the components window.

Displays/hides the ruler

table toolbar

Changes the technique to Precedence.

Changes the technique to arrow.

Adds new task/event in the current table.

Adds new link/activity in the current table.

Displays the table selection dialog.

Displays information about the currently selected item.

Displays the scale menu.

Previews the table.

Displays the Print Setup dialog.

Prints the table.

Exports information to other files.

resource histogram toolbar

Displays the resource histogram options dialog.

Displays the scale menu.

Previews the resource histogram.

Displays the Print Setup dialog.

Prints the resource histogram.

Copies the current chart to a picture file.

Exports information to other files.

Adds a text annotation to the resource histogram.

Adds a graphic annotation to the resource histogram.

Adds a key to the resource histogram (redundant).

Displays the annotation options dialog.

cost pie toolbar

- Displays the cost pie options dialog.
- Displays the scale menu.
- Previews the cost pie chart.
- Displays the Print Setup dialog.
- Prints the cost pie chart.
- Copies the current chart to a picture file.
- Adds a text annotation to the cost pie chart.
- Adds a graphic annotation to the cost pie chart.
- Adds a key to the cost pie chart (redundant).
- Displays the annotation options dialog.

cost profile toolbar

- Displays the cost profile options dialog.
- Displays the scale menu.
- Previews the cost profile.
- Displays the Print Setup dialog.
- Prints the cost profile.
- Copies the current chart to a picture file.
- Exports information to other files.
- Adds a text annotation to the cost profile.
- Adds a graphic annotation to the cost profile.
- Adds a key to the cost profile (redundant).
- Displays the annotation options dialog.

reports toolbar

Displays the options dialog.

Displays information about the currently selected item.

Edits the layout of the current report.

Saves report stationery to disk.

Places stationery based on current report on desktop.

Displays the scale menu.

Previews the current report.

Inserts a page break in the current report.

Removes the page break.

Displays the Print Setup dialog.

Prints the current report.

Copies the current reports to picture file(s).

Adds a text annotation to the current report.

Adds a graphic annotation to the current report.

Adds a key to the current report (redundant).

Displays the annotation options dialog.