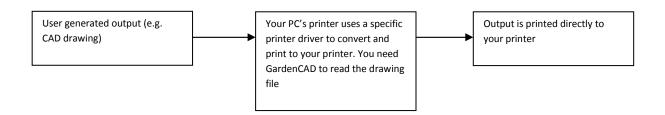
# Printing to a .pdf file

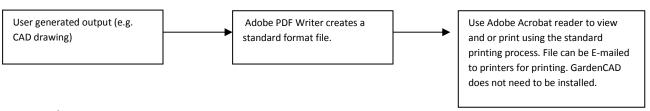
#### What is a PDF file and why use it?

PDF or Portable Document Format is a file format developed by the Adobe Corporation. It has become a pseudo standard for document distribution in a compact, platform independent way. PDF files can contain Images, Text and Hyperlinks and allow documents to be transported anywhere and processed without having the software installed that created it (In our example GardenCAD or AutoCAD) All each receiving device requires is a working Adobe PDF reader.

### Standard Printing Flow



#### Print to Adobe Driver



#### What you need

In order to print using the Adobe print output process you'll need to download and install a PDF writer onto your PC. Once this is installed, it will appear like any other available printer on your printer list.

## Note:

You can find some more information including a training video at the <u>www.landscapetutor.net</u> site

Go to the GardenCAD section <u>Using GardenCAD Pro - CAD software for Landscape & Garden Design</u> and look at

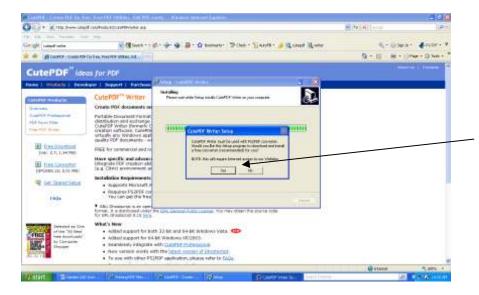
- 13 Printing a GardenCAD drawing:
- 14 Installing CutePDF printing a GardenCAD drawing to a PDF file:

Here's a quick summary.

1. To create (print to) PDF files you'll need a PDF Writer.

You can get CutePDF for free from <a href="http://www.cutepdf.com/Products/CutePDF/writer.asp">http://www.cutepdf.com/Products/CutePDF/writer.asp</a>

Select Free Download and Run, Run and accept license



You make get a question to install a PS2Converter. Click 'yes' to this pop up.

When the install process is complete, check that the CuetPDF is available by checking your installed printers.

Do: Start/Control Panel/Printers and Other Hardware/View installed printers or fax printers.



2. To view PDF files you'll need a reader. Most PC's will have this but if not you can get a free download from the Adobe website. <a href="http://www.adobe.com/">http://www.adobe.com/</a> and select Get Adobe reader.

You now be able to print to the PDF writer rather that directly to your printer.

- Try Follow the process for Printing to your attached printer and when the print pop-up appears select the Change button to the right of your Printer Device at the top. From the Printer Setup pop up select CutePDF from the Name drop down list. Then OK and OK. Then rather than the print appearing you'll be asked to save the file. Once complete find the file and open it. The Adobe Reader will open the file and from here you can use the standard print commands. [Top left is the Print Icon]
- **Tip** Make a note where the file is saved. It makes it easier to find. It's also good practice to do a preview before creating. .PDF drivers enable a large range of papers sizes so the default setup may not be what you want

## Printing using Scale

The **Printing a GardenCAD** drawing at <u>Using GardenCAD Pro - CAD software for Landscape & Garden Design</u> has a section covering printing headed **Plotting a drawing to a defined scale.** As a guide it's worth seeing this.

#### **Basic Printing Scale Summary**

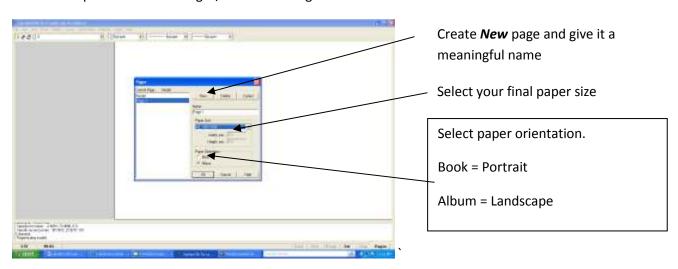
Printing to scale is transferring your model drawing to the GardenCAD clipboard, pasting it into a New Page using the Pages command, scale down your picture using Scale and overly it to fit the new paper size.

Here's a quick step by step.

Check using File/Print that your device can handle the size of paper you'll be using. If you wish to create to a PDF then ensure your Printer Device is the PDF writer.

Create a new working page with the paper size you want our final drawing.

From the Top Toolbar select Pages/Create Edit Pages.



Once complete go back to your Model screen. Select Pages and Model from the pop-up.

Use the Information/Distance command to measure the width and Height of your model drawing (Model). Include any space you might like on either side. Understanding this measurement is important as this will help us calculate the scale factor to use for the size paper we wish to print to.

In order to make this calculation we need to divide the width or height of the paper you've chosen by the width of the page you created above. If your drawing is wider than it is taller and you want it printed in landscape you need to use the width value and visa versa for portrait.

Here's the formula

Page Width (mm) / Drawing Width (mm) = Scale Factor

Or

Page Height (mm) / Drawing Height = Scale Factor

E.g. To print a drawing that is 20 meters wide and 10 meters high on A3 (Landscape) you need to

420 / 20000 = 0.021

The closest value to this on you scale ruler is 0.02 or 1/50

If the scale factor had have been 0.019 then you either have to round up to .02 (1/50) or down to .01 which is 1/100. You need to find a scale factor that matches the standard scale ruler a builder may use.

To help here's a list of the scale factors and their respective scale values.

Metric Scale (on your Scale Ruler)	CAD Scale factor
1:10	0.1
1:100	0.01
1:20	0.05
1:200	0.005
1:25	0.04
1:250	0.004
1:30	0.0333
1:300	0.00333
1:40	0.025
1:400	0.0025
1:50	0.02
1:500	0.002

To help understand the width and height of standard paper here's a table of A4 - A0

Paper Size	Paper Dimensions (mm)
A4	210 x 297
A3	297 x 420
A2	420 x 594
A1	594 x 841
A0	840 x 1189

If you have been requested specifically to deliver your drawing on a particular size paper you need to select a scale factor that is the neatest fit given the size of your drawing.

The easiest way to do this is to measure you're drawing as above and just multiply by the scale factors until you get one that fits the best.

For example to fit our drawing that's 20 meters x 10 meters on A1 we need to find a scale factor that will expand that drawing to paper that is 841 mm wide.

Eg  $20000 \times 0.01 = 200$  (too small)

20000 x 0.1 = 2000 (too large)

20000 x 0.02 = 400 (too small)

20000 x 0.04 = 800 (good fit. This will scale your drawing to 1:25 on A2)

Now you have the scale factor calculated you need to move a copy of your drawing onto your page and prepare it for printing.

Make sure you are on the page with your model. Zoom out so you can see your complete drawing. Place a marquee box around your drawing (Left click the top left and drag down and right the opposite bottom corner and left click. Your drawing will be pink and in Edit Mode.

Now Right Click and select Create Block

In the **Block Definition** window give your drawing block a name and select **OK** 

Now from the Top Toolbar select Pages/Select Page/Select the page you created previously. Zoom out and centre

From the Top Toolbar select *Draw* and *Insert Block*. In the *Insert Block* window enter the name of your drawing block and select OK. In the Command line window enter 0,0 (enter) to the *Specify Insertion Point:* question and your model will be pasted onto your new page.

Left Click any part of your drawing and Right Click and select Scale

Specify base point: 0,0 <enter>

Specify scale factor<>: [enter your scale factor] <enter>

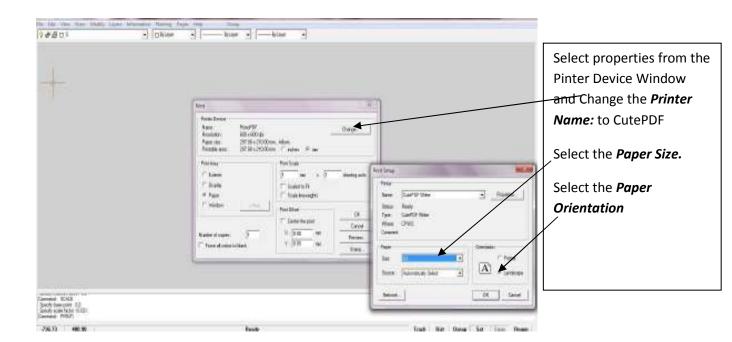
From here it should just be a matter of moving your drawing around to position using the move command. If your scale is still not correct then erase the model from the page and repeat the paste and scale step with an amended scale factor. Once you're happy either print directly to your printer or create a PDF file and take to your local printing office.

- **Tip-** Getting your scale factor correct might take a few goes.
- **Try –** Try doing a few basic drawings of house blocks and work out the best scale factor to use when using A1 or A2 sheets. It's worth doing a few test prints and getting them printed and checked with a scale rule. Once you're confident with the calculations you could build up a table so it's easy later on.

Once you have completed the scaling of you drawing you can now print to a PDF file. The following procedure assumes your have install the appropriate PDF writer (eg CutePDF) onto your machine.

Select File/Print from the Top Toolbar

Select the *Printer Name*, the *Paper Size* and the *Paper Orientation* and select *OK* 



Select Window and then select the Pick box and draw a marquee box around your drawing.

Scaled to Fit

Centre the Print

Took Did Dings Set Too Repor

Now select, Scaled to Fit, Centre the Print and Window. Then select Pick and draw a marquee box

After a few moments a PDF Window will appear asking you to give your PDF file and name and a location where you wish to save it. Once that is done you can take this file to your local print shop and have them print you drawing on the paper you've chosen.

Important Note: Remember that you drawing in the Model screen is now a block. So you can return it to a drawing to can edit/add select it (left click) so it goes pick and do Right Click/Explode. If it doesn't explode the first time then does it again. Sometimes blocks need to be exploded twice.

