

## ■ 2.9.6 Making Plots within Plots

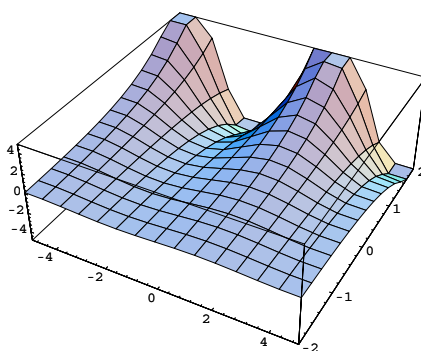
Section 1.9.4 described how you can make regular arrays of plots using `GraphicsArray`. Using the `Rectangle` graphics primitive, however, you can combine and superimpose plots in any way.

```
Rectangle[{xmin, ymin}, {xmax, ymax}, graphics]
render a graphics object within the specified rectangle
```

Creating a subplot.

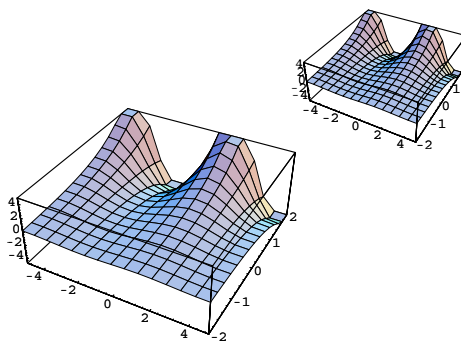
Here is a three-dimensional plot.

```
In[1] := p3 = Plot3D[Sin[x] Exp[y], {x, -5, 5}, {y, -2, 2}]
```



This creates a two-dimensional graphics object which contains two copies of the three-dimensional plot.

```
In[2] := Show[Graphics[ {Rectangle[{0, 0}, {1, 1}, p3],
Rectangle[{0.8, 0.8}, {1.2, 1.4}, p3]} ]]
```



*Mathematica* can render any graphics object within a `Rectangle`. In all cases, what it puts in the rectangle is a scaled down version of what would be obtained if you displayed the graphics object on its

own. Notice that in general the display area for the graphics object will be sized so as to touch at least one pair of edges of the rectangle.