

```

1 def main():
2     grapher = CustomPlot(dim = dimension, aspect_ratio = 1)
3     x1 = np.linspace(-32, 32, 100000)
4     y1 = np.cos(x1)
5     grapher.plot(x1, y1, color = 'red', label = r'$y=\cos\,x$')
6     grapher.configure(axis_labels = ('$x$', '$y$', '$z$'))
7     grapher.axis_fix(axis      = 'x',
8                       symbolic = True,
9                       s        = r'\pi',
10                      v        = np.pi,
11                      first     = -2,
12                      last      = 2,
13                      step      = 1 / 4)
14     grapher.axis_fix(axis      = 'y',
15                       symbolic = False,
16                       s        = r'\pi',
17                       v        = np.pi,
18                       first     = -3,
19                       last      = 3,
20                       step      = 1)
21     grapher.fig.tight_layout(pad = 2)
22     plt.show()

```

Listing 1: Cosine

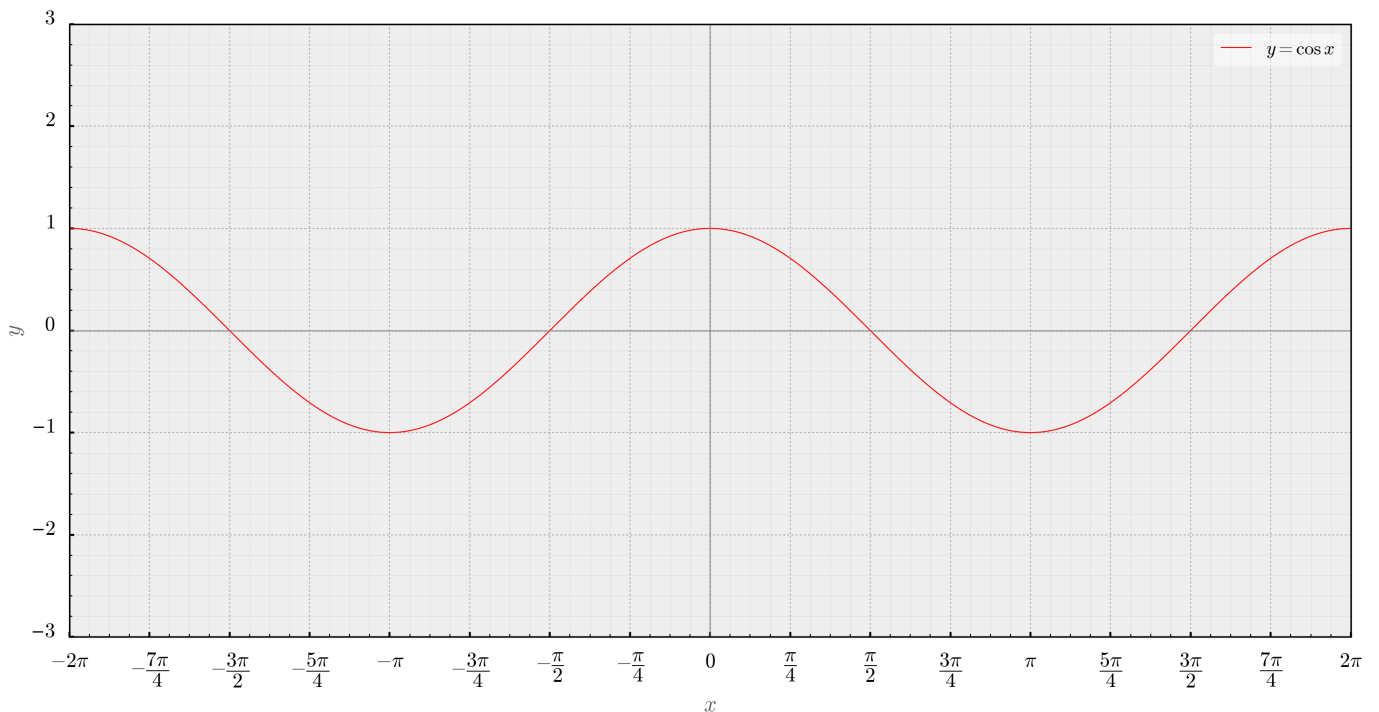


Figure 1: Cosine

```

1 def main():
2     grapher = CustomPlot(dim = dimension, aspect_ratio = 1)
3     x1 = np.linspace(-32, 32, 100000)
4     y1 = np.sqrt(x1)
5     grapher.plot(x1, y1, color = 'red', label = r'$y=\sqrt{x}$')
6     grapher.configure(axis_labels = ('$x$', '$y$', '$z$'))
7     grapher.axis_fix(axis      = 'x',
8                       symbolic = False,
9                       s        = r'\pi',
10                      v        = np.pi,
11                      first     = -2,
12                      last      = 6,
13                      step      = 1)
14     grapher.axis_fix(axis      = 'y',
15                       symbolic = False,
16                       s        = r'\pi',
17                      v        = np.pi,
18                      first     = -1,
19                      last      = 3,
20                      step      = 1)
21     grapher.fig.tight_layout(pad = 2)
22     plt.show()

```

Listing 2: Square Root

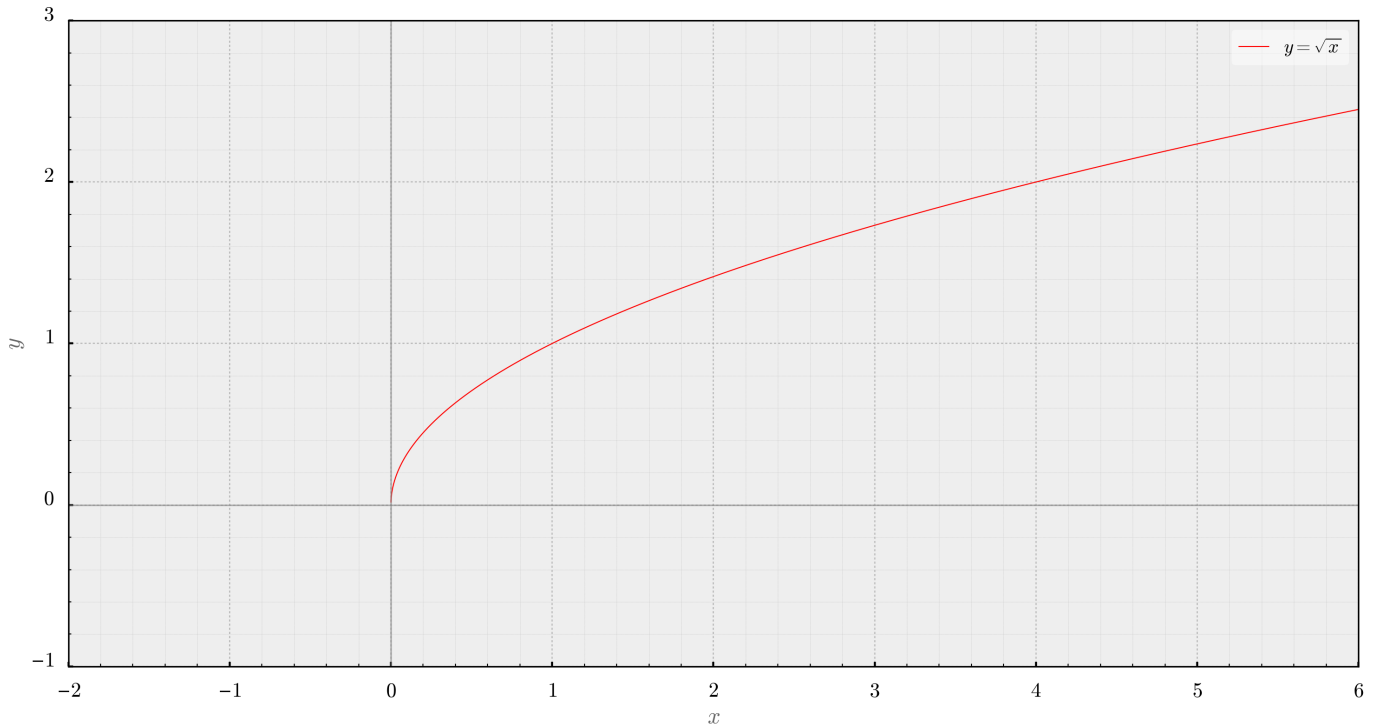


Figure 2: Square Root

You just have to change the `main` function in `'customplot.py'` as described in the above examples. Leave everything else unchanged and run the program.