

- 1) (5 pts) Write a script that will estimate the value of the definite integral

$$I = \int_{-2}^2 x e^{-x} dx$$

using the trapezoidal rule. You can only use one loop, so you need to tabulate the function and do the trapezoidal rule at the same time.

- 2) (4 pts) Write a script that will take the string

```
s = 'ABCDEFGHIJKLMNOPQRSTUVWXYZ'
```

and create a new string

```
t = 'ZYXWVUTSRQPONMLKJIHGFEDCBA'
```

Note that there is a built in command to do this, but you should use a loop over the elements of `s` and manually insert the elements into `t`.