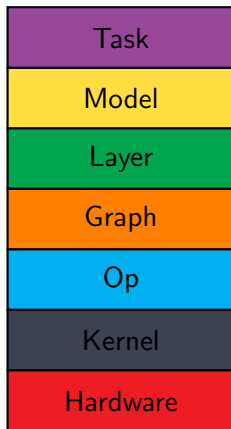


```
>>> c++ deep-learning.cpp
```

```
>>> ./a.out data.csv
```

```
>>> 42
```



OSI Model of Machine Learning

Task Layer

$$f\left(\text{Teapot Image}\right) = \text{Teapot}$$

Classification[★]

$$f(\text{文内容}) = \begin{matrix} \circ & \circ & \circ \\ \circ & \circ & \circ \\ \circ & \circ & \circ \end{matrix}$$

Translation[★]

$$f\left(\text{Cloud Image}\right) = \begin{matrix} \text{Cloud Image} & \text{Cloud Image} & \text{Cloud Image} \\ \text{Cloud Image} & \text{Cloud Image} & \text{Cloud Image} \\ \text{Cloud Image} & \text{Cloud Image} & \text{Cloud Image} \end{matrix}$$

Generative[†]

★ Supervised

† Unsupervised

