Try to find the function (***y = mx+b***) that describes the following relation between cpu and price:

|  |  |
| --- | --- |
| CPUs (x) | Price (y) |
| 2 | 100 |
| 3 | 200 |
| 4 | 300 |
| 5 | 400 |
| 6 | 500 |
| 7 | 600 |
| 8 | ???? |

Your guessed function is called your hypothesis.

Now let’s try with a little more real data:

|  |  |
| --- | --- |
| CPUs (x) | Price (y) |
| 2 | 80 |
| 3 | 200 |
| 4 | 250 |
| 5 | 400 |
| 6 | 700 |
| 7 | 800 |
| 8 | ??? |

How about fitting the function to these guys:

|  |  |  |
| --- | --- | --- |
|  | Friends | Likes |
|  | 60 | 253 |
|  | 120 | 100 |
|  | 200 | 500 |
|  | 310 | 600 |
|  | 400 | 400 |
|  | 500 | 450 |
|  | 593 | 700 |
|  | 688 | 800 |
|  | 783 | 500 |

**Cost functions:**

Create a function to determine which hypothesis best describes (is closer to) the real data.

|  |  |  |  |
| --- | --- | --- | --- |
| Friends (x) | Likes (y) | hyp 1 | hyp2 |
| 60 | 253 | 100 | 180 |
| 120 | 100 | 50 | 120 |
| 200 | 500 | 400 | 380 |
| 310 | 600 | 500 | 520 |
| 400 | 400 | 420 | 400 |
| 500 | 450 | 380 | 360 |
| 593 | 700 | 500 | 750 |
| 688 | 800 | 600 | 850 |
| 783 | 500 | 400 | 550 |