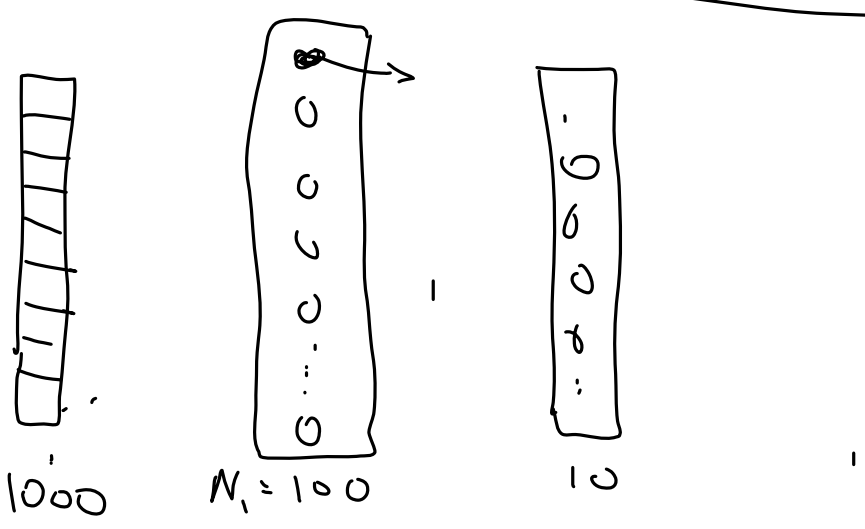


ΑΡΧΙΖΟΥΜΕ 15:15



ΕΠΙ	Μ.ΕΥΡ.	ΠΟΛΥΠΛ	ΠΡΟΣΘ.	ΑΥΘ.	ΜΕΤΑΚ.	ΔΙΑΥΡ.	ΕΥΡ.
ΕΠ1		1000 x 100	100 x 100	1 x 100	2000	10	100
ΕΠ2		100 x 10	100 x 10	1 x 10	202 x 10	10	10
ΑΔΡΟΙ ΕΛΛ		110000	10	-	-	-	-

$$y = \sum_{i=1}^N w_i x_i$$

$$0 = \frac{1}{1 + e^{-y}}$$

DSP → ΠΟΛΥΠΛΗ + ΠΡΟΣΘΕΣΗ ΣΕ ΕΝΑ ΚΥΚΛΟ ΜΗΧΗΝΗΣ

$$w_1 x_1 + w_2 x_2 + w_j x_j$$

4.20 , #1 - - - - -

$$\alpha = \cos(x);$$

$$\alpha + = \beta + c + 2;$$

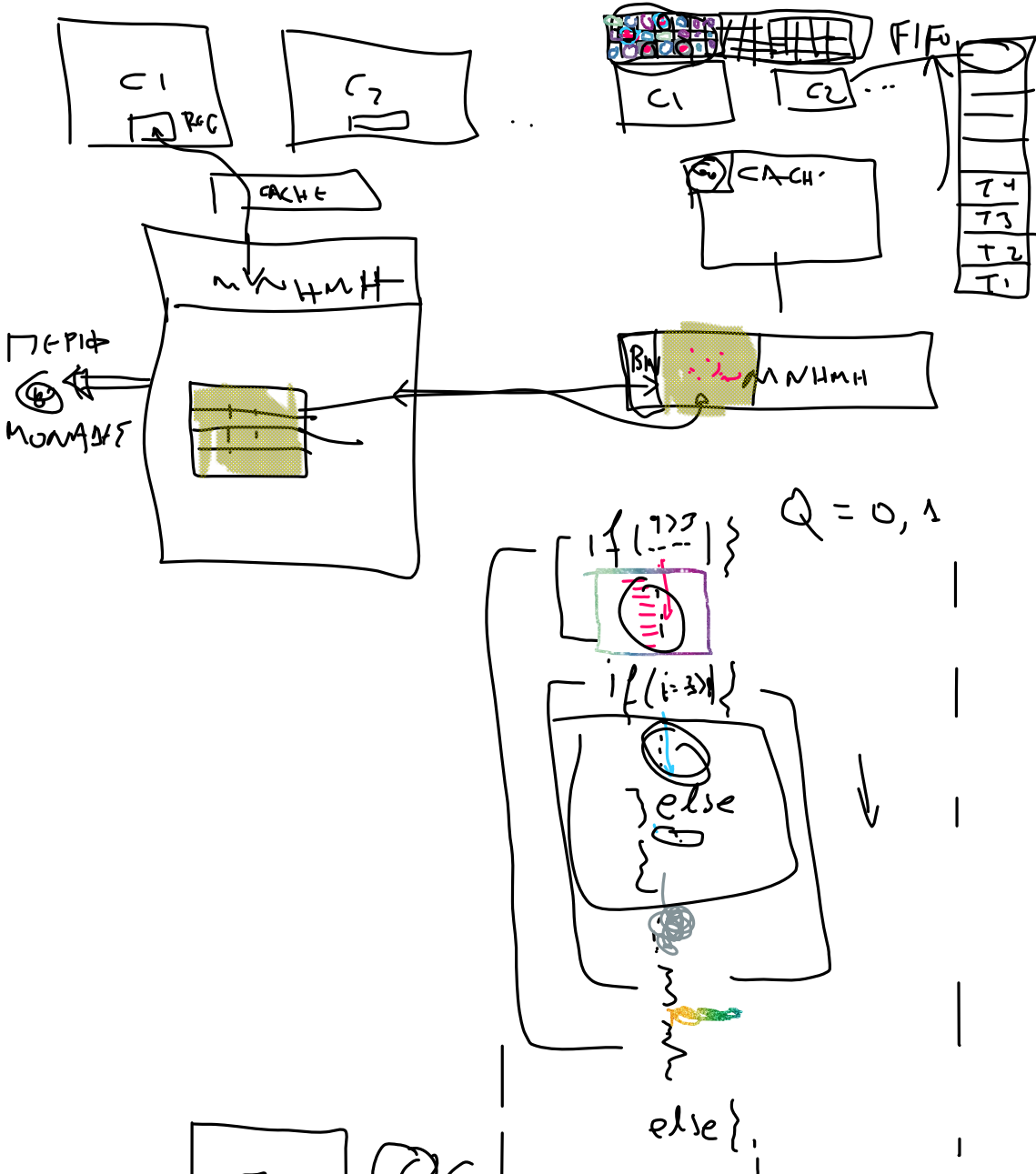
5:30

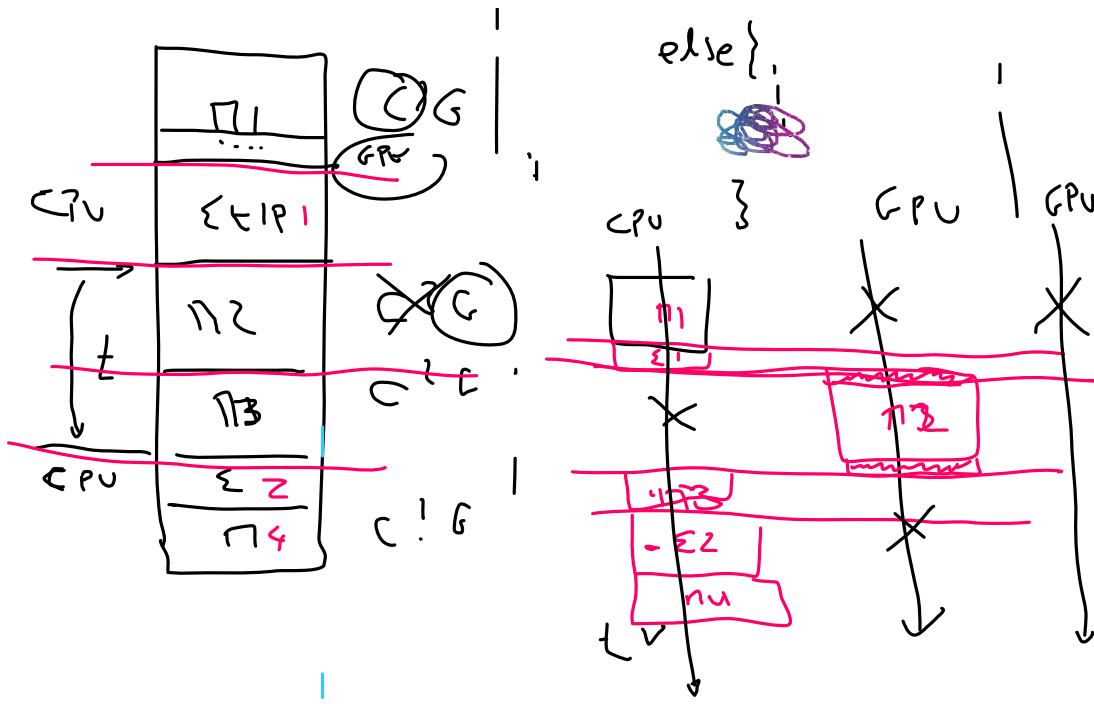
OPENMP
OPENACC

t

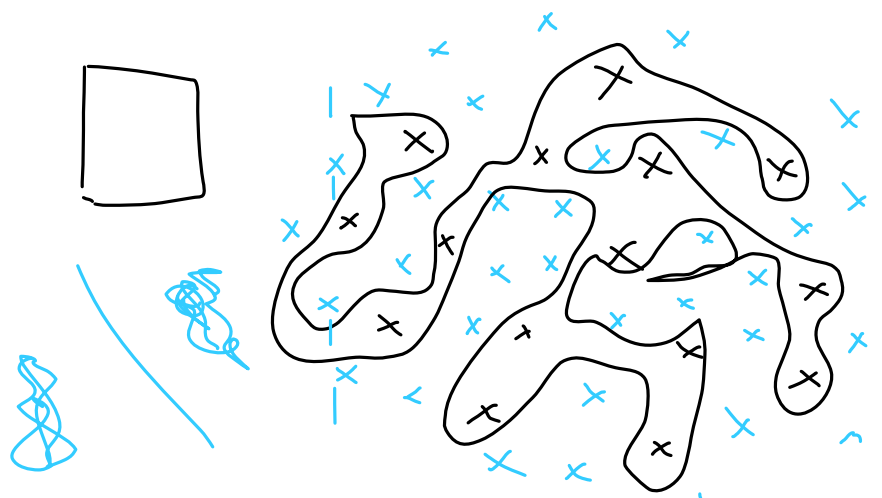
CPU

GPU





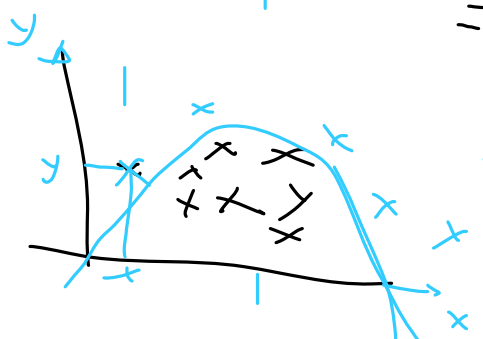
CONVOLUTION CNN



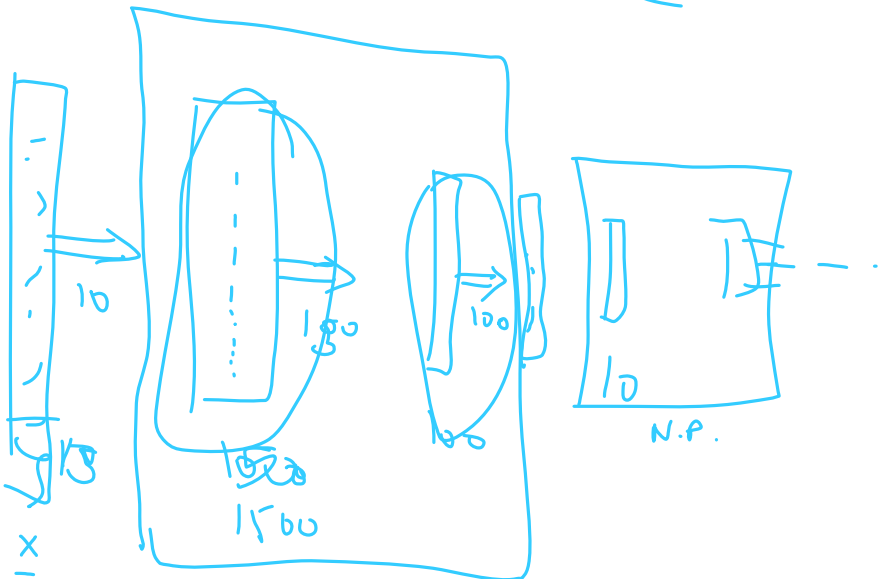
COVER

$m > N$

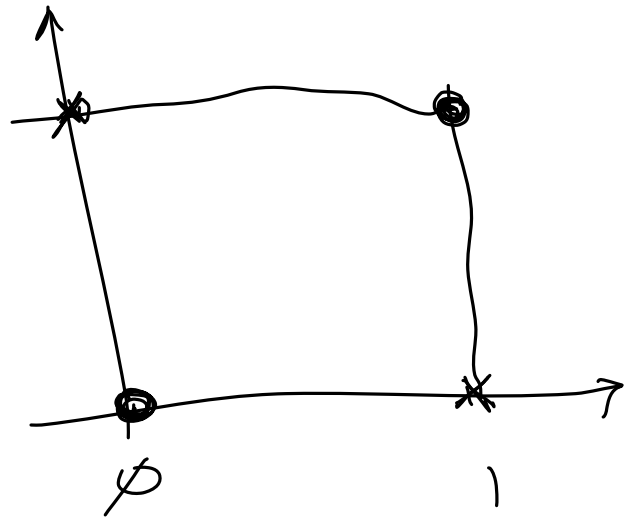
$$y_{1 \times m} = \int_{1 \times n} (x)$$



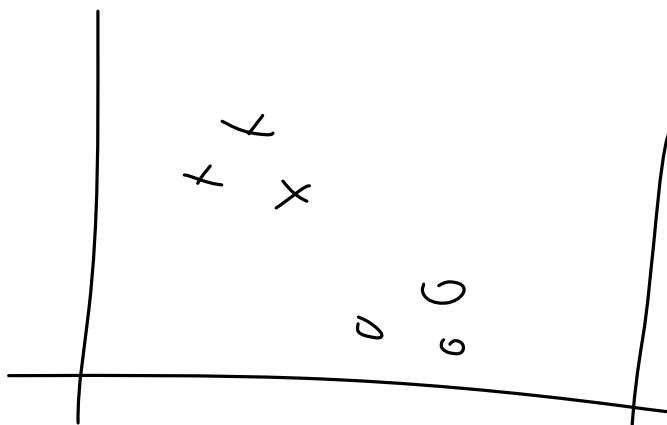
$$g(x) = y = \alpha x^2 + \beta x + \gamma$$



ΕΠΕΚΤΑΣΗ ΚΑΤΑ ΛΟΓΟΣ



$$\begin{array}{r} 0 \ 0 \ 1 \ 1 \\ 0 \ 1 \ 0 \ 1 \\ \hline 0 \ 1 \ 1 \ 0 \end{array}$$

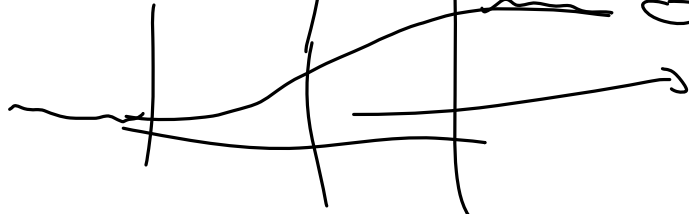
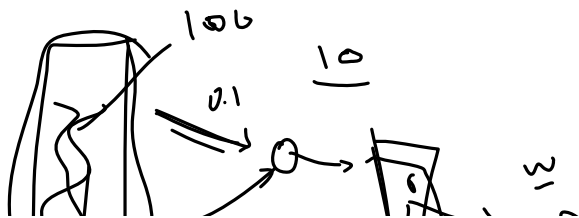


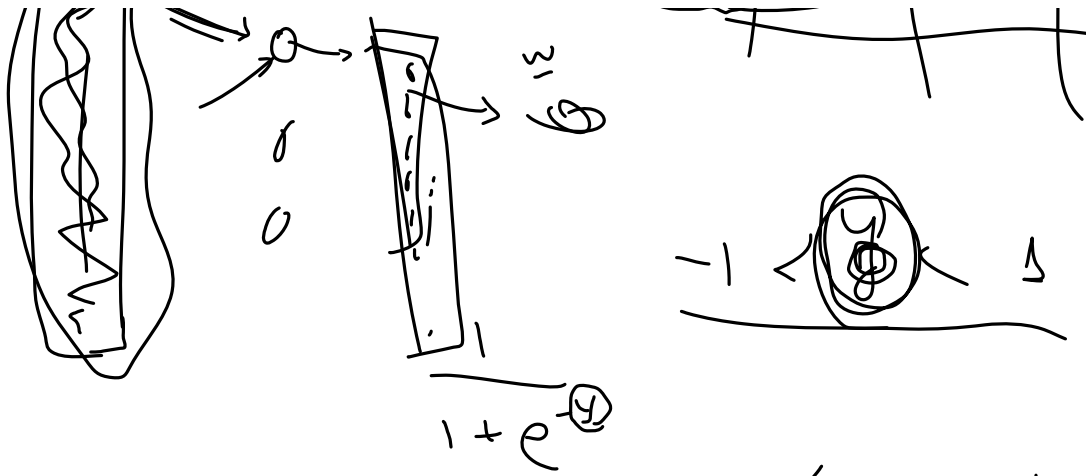
float f = -0.1,

```
if ( f == -0.1 ) {
    printf( "0.1", f );
    ~~~~~
}
```

```
printf( "NADOL 0.1", f );
```

(w) $-0.1 < w < 0.1$





$$y = \sum_{i=1}^{100} w_i \cdot 0$$

$\frac{0.001}{-0.1}$ < 0.1

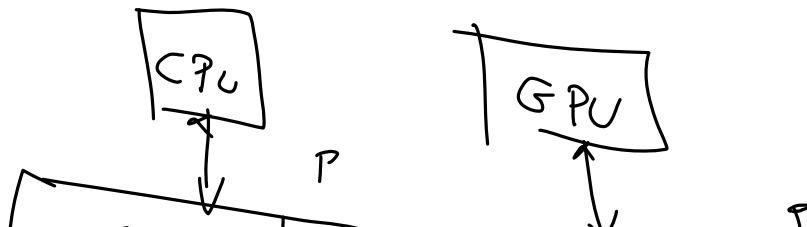
$$\sum_{i=1}^{100} 15.1$$

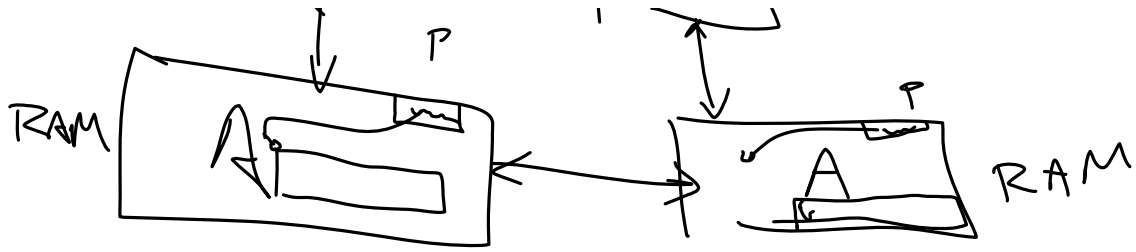
$$|\Delta w| \propto \delta_i \cdot 0_i$$

APXIZOM E 14:30 (TEKHNIKO PROBLHMA)

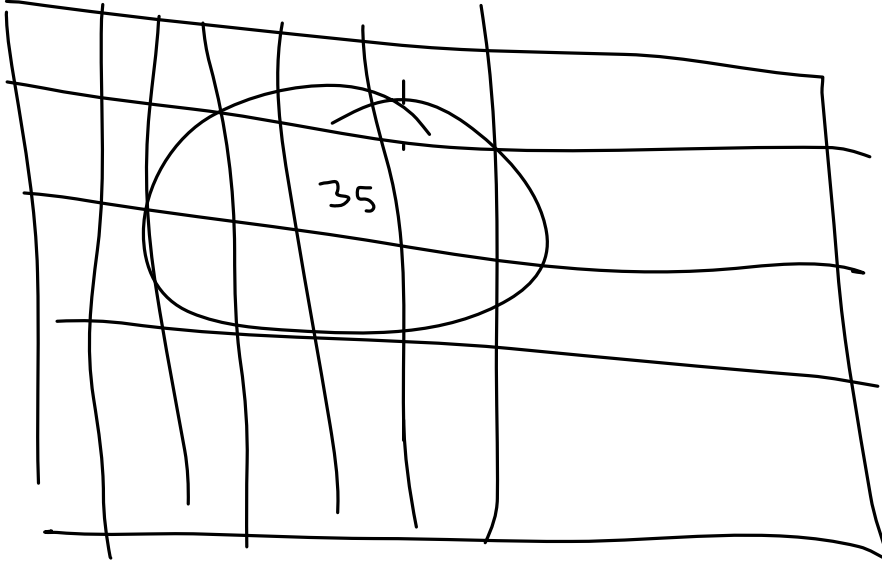
int A[n]

for





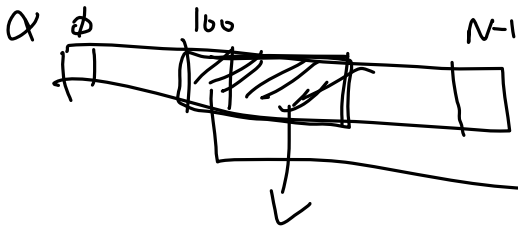
```
int A[0:N][0:m]
```



→

CPU
HOST

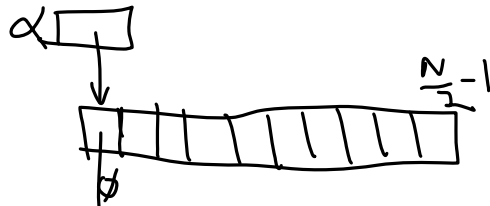
Host



CPU

ACCEL.

Host

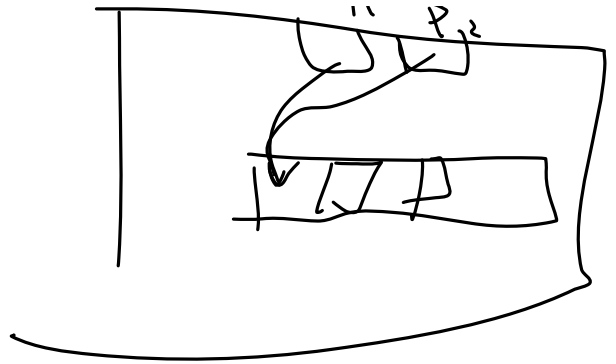
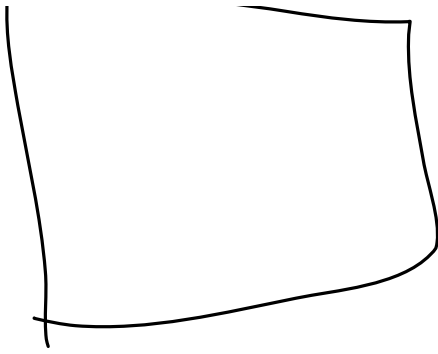


$P_1 - (A, \dots)$

$1 \dots P_1(A)$

P_2

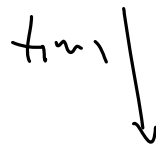
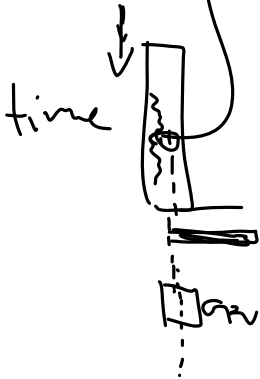
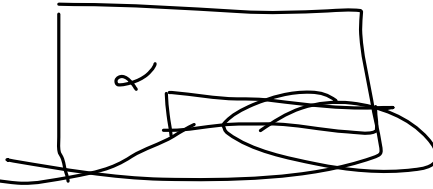




GPU



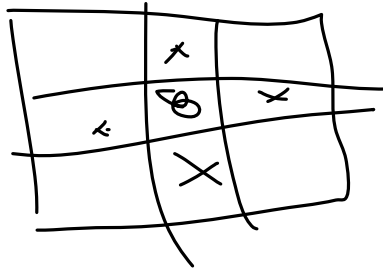
GPU



B

J

C -



GPU

