ALAA BARKA : TP2

Excercice 1 :

```c
#include <stdio.h>
int main () {

    printf("ESSTHS");
    return 0;
}
```

Excercice 1.1.2 :

```c
#include <stdio.h>
int main () {
    /*
    Instruction d'affichage d'unn message sur l'ecran
    */
    printf("ESSTHS");
    return 0;
}
```

Excercice 1.1.5 :

```c
#include <stdio.h>
int main () {
    printf("ESSTHS ¥n");
    printf("je suis en premiere annee ");
    printf("License Informatique ¥n");
}
```

Excercice 1.1.6 :

Retourne a la ligne

Excercice 1.2 :

```c
#include <stdio.h>
int main () {
    printf("¥nbonjour ¥0 ESSTHS");
    printf("¥n Bonjour ¥a ESSTHS ¥n");
}
```

Caractere speciale	Correspondance	Caractere speciale	Correspondance
\0	NULL	\r	Carriage return
\a	ALERT	\t	Horizental tab
\b	BACK SPACE	\v	Vertical bar
\f	Form feed	\\	\
\n	New line	\’	‘

Excercice 1.3.1 :

98

1890

0

37

1

1

1

252

13

1

1

0

0

Excercice 1.3.3

```c
#include <stdio.h>
int main()
{
    int a = 20, b = 5, c = -10, d = 2, x = 12, y = 15;
    printf("%d ¥n", (5 * x) + 2 * ((3 * b) + 4));
```

```
    printf("%d ¥n", (5 * (x + 2) * 3) * (b + 4));
    printf("%i ¥n", a == (b = 5));
    printf("%d ¥n", a += (x + 5));
    printf("%d ¥n", a != (c *= (-d)));
    printf("%d ¥n", a %= d++);
    printf("%d ¥n", a %= ++d);
    printf("%d ¥n", (x++) * (a + c));

    printf("%d ¥n", a = x * (b < c) + y * !(b < c));
    printf("%d ¥n", !(x - d + c) || d);
    printf("%d ¥n", a && b || !0 && c && !d);
    printf("%d ¥n", ((a && b) || (!0 && c)) && !d);
    printf("%d ¥n", ((a && b) || !0) && (c && (!d)));
    return 0;
}
```

Excercice 1.4.1

12

12 -> post- incr

14 -> pres incr

14 post-decr

12 pres-decr

12

Excercice 1.4.3

```
#include <stdio.h>
int main()
{
    int x, y, res;

    x = y = 6;
    res = x + y;
    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
    res = x++ + y;

    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
    res = ++x + y;
    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
    res = x-- + y;
    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
    res = --x + y;
    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
    res = x + y;
    printf("x=%i ¥t y= %i res = %i ¥n ", x, y, res);
}
```

Exercice 1.5

```c
#include <stdio.h>
int main()
{
    int x, y;
    printf("Swapp Enter X ! ¥n");
    scanf("%d", &x);
    printf("Enter Y! ¥n");
    scanf("%d", &y);
    printf("X = %d and Y = %d ¥n", x, y);
    x = x * y;
    y = x / y;
    x = x / y;
    printf("X = %d and Y = %d ¥n", x, y);
}
```

Exercice 1.6

```c
#include <stdio.h>
int main()
{
    float rayon;
    printf("Enter the R ¥n");
    scanf("%f", &rayon);

    float per = 2 * PI * rayon, surf = rayon * rayon * PI;

    printf("The perm is %f and the surface is %f", per, surf);
}
```

Exercice 1.7

```c
#include <stdio.h>
int main()
{
    float math, algo, exam, ds, moy;
    printf("Enter the ds and the exam of math !  ¥n");
    scanf("%f", &ds, &exam);
    math = 0.4 * ds + 0.6 * exam;
    printf("Enter the ds and exam  of algo !  ¥n");
    scanf("%f", &ds, &exam);
    algo = 0.4 * ds + 0.6 * exam;

    moy = (math + algo) / 2;
    printf("Th moy is : %f", moy);
}
```

Exercice 1.8

```c
#include <stdio.h>
int main()
{
    char thing;
    thing = getchar();

    putchar(thing);
}
```

TP 2 : Algo :

$a = 20$, $b = 5$, $c = -10$.

$d = 2$, $x = 12$, $y = 15$

1) $(5 \times x) + 2 \times ((3 \times b) + 4))$

$\hookrightarrow (5 \times 12) + 2 \times ((3 \times 5) + 4))$

$\hookrightarrow 60 + 2(3 \times 5) + 8$

$\hookrightarrow 60 + 30 + 8 = 98$. (V)

2) $(5 \times (x + 2) \times 3) \times (b + 4)$

$x = 12$

$b = 5$.

$(5 \times (12 + 2) \times 3) \times (5 + 4)$

$= (15(12 + 2)) \times (5 + 4)$

$\hookrightarrow (180 + 30) \times (5 + 4)$

$\hookrightarrow 900 + 720 + 150 + 120 = 1890$

(V) -

(3) a == (b = 5) = 0

(4) a += (x + 5)

= 20 + 17 = 37.

(1)

x = 12
a = 20

(5)

a ± (c x = (-d))

-10 b - 2 = 20.

-> (1)

c = -10
d = 2

(6) a mod d ++

- 20 mod 3

6 6 6

18

=> (1) -

(7) a mod d ++ -> 4 ~

(8) (x++) x (a + c)

= 13a + 13c

= 13 x 37 + 13 x 20

sc = 12

a = 37

c = two.

two

F 221 N

5)

$a = x(b<c) + y!(b<c)$

$\Rightarrow 13 \times (5<20) + 15 \times 0$

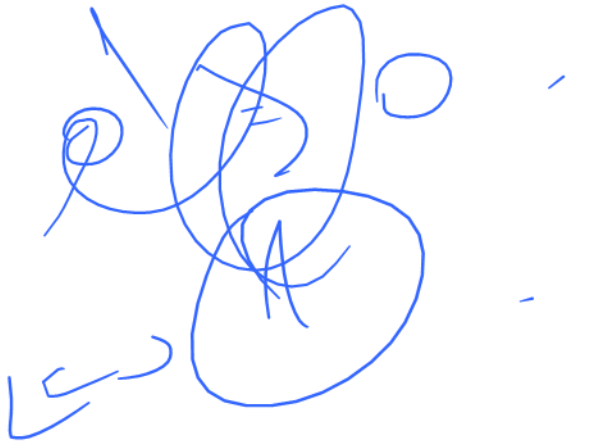
$\Rightarrow 13 \times 1 + 0$

$a = 13$

$10 \; !_0 (x - d + c) \; || \; d$

$(13 - 2 + 20)$

$= (11 + 20)! \ldots 0$



11

0.885 = 10

12 → 0

13 → 0

ex 4 :

x ← y ← 6 .

Res ← 6 + 6 = 12

Resultat : x = 6, y = 6, Res = 12 .

Res ← x++ + y , Res = 12 .

7 6

x = 7 , y = 6 .

Res ← ++x + y → Res = 14

8 6

Res ← x-- + y , Res = 2

7 6

Res ← --x + y , Res = 12

6 6

hes ← 4 + 4, hes = 12
6 6