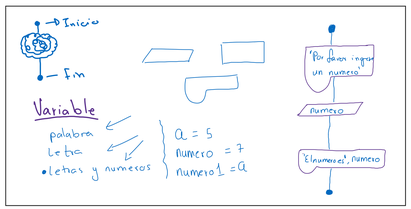
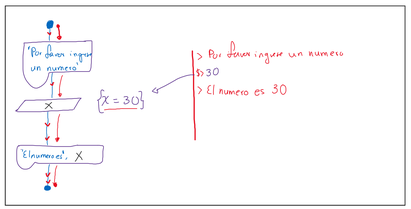
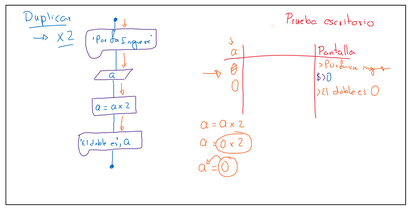
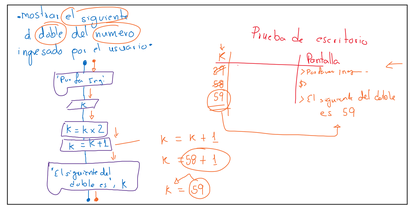
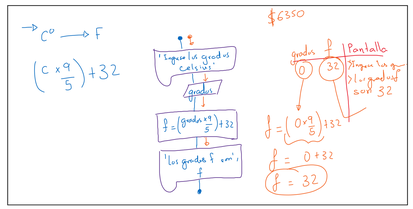
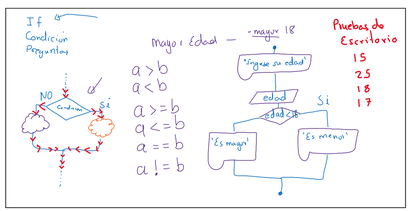

Inicio
Fin
Variable
palabra
Letra
letras y numeros
a = 5
numero = 7
numero1 = a
'Por favor ingrese un numero'
numero
'El numero es', numero

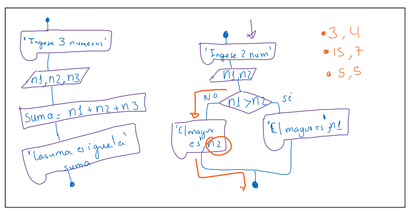

'Por favor ingrese un numero'
x
'El numero es', x
{x = 30}
> Por favor ingrese un numero
> 30
> El numero es 30

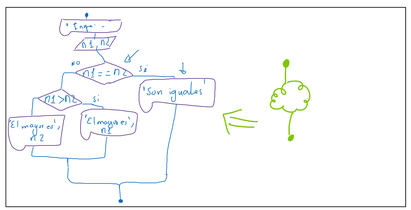

Duplica
x2
'Por favor ingrese'
a
a = a x 2
'El doble es', a
Prueba escritorio
a
0
0
Pantalla
> Por favor ingrese
> 0
> El doble es 0
a = a x 2
a = 0 x 2
a = 0

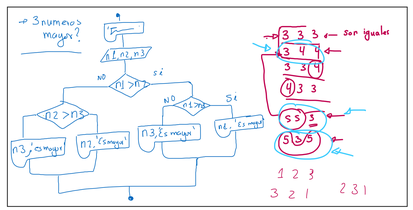

mostrar el siguiente
d doble del numero
ingresado por el usuario
Prueba de escritorio
k
59
Pantalla
> Por favor ingrese
> 59
> El siguiente del doble es 59
Por favor ingrese
k
k = k x 2
k = k + 1
'El siguiente del doble es', k
k = k + 1
k = 58 + 1
k = 59

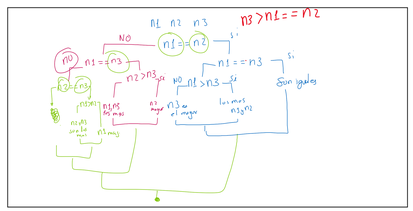

$6350
C° → F
(C x 9/5) + 32
'Ingrese los grados Celsius'
grados
f = (grados x 9/5) + 32
'Los grados f son', f
grados f
0 32
Pantalla
> Ingrese los grados Celsius
> 0
> La equivalencia es: 32
f = (0 x 9/5) + 32
f = 0 + 32
f = 32

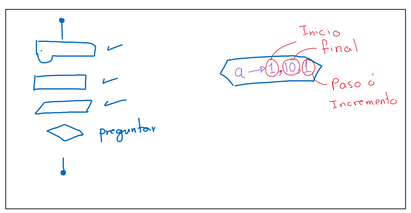

If
Condicion
Preguntas
NO
Condicion
Si
mayor Edad
a > b
a < b
a >= b
a <= b
a == b
a != b
- mayor 18
'Ingrese su edad'
edad
edad >= 18
Si
'Es mayor'
'Es menor'
Pruebas de Escritorio
15
25
18
17

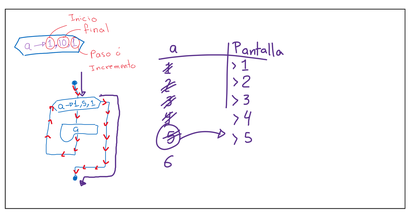

'Ingrese 3 numeros'
n1, n2, n3
Suma = n1 + n2 + n3
'La suma es igual a'
suma
'Ingrese 2 num'
n1, n2
n1 > n2
NO
Si
'El mayor es', n2
'El mayor es', n1
• 3, 4
• 15, 7
• 5, 5

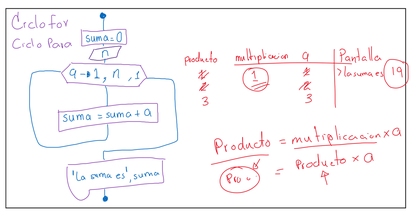

'Ingr...'
n1, n2
n1 == n2
NO
Si
n1 > n2
Si
NO
'El mayor es', n2
'El mayor es', n1
'Son iguales'

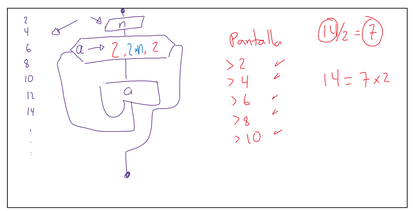

3 numeros mayor?
'F'
n1, n2, n3
n1 > n2
NO
Si
n2 > n3
NO
n1 > n3
Si
n3, 'es mayor'
n2, 'es mayor'
n1, 'es mayor'
3 3 3 ← son iguales
3 3 4
4 3 3
5 5 3
5 3 5
1 2 3
3 2 1
2 3 1

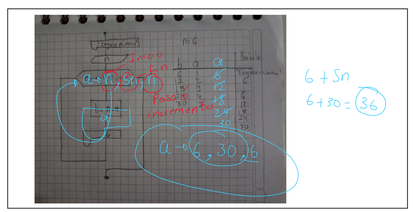

n1 n2 n3
n3 > n1 == n2
NO
n1 == n2
Si
n1 == n3
Si
n2 > n3
Si
NO
n1 > n3
Si
Son iguales
n1 es mayor
n2 es mayor
n3 es mayor
Los mas n3 > n2

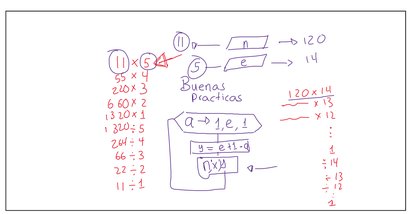

preguntar
Inicio
Final
Paso ó Incremento
a → 1, 10, 1

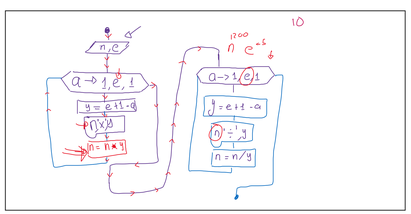

Inicio
Final
Paso ó Incremento
a → 0, 10, 1
a → 1, 5, 1
a
Pantalla
> 1
> 2
> 3
> 4
> 5
6

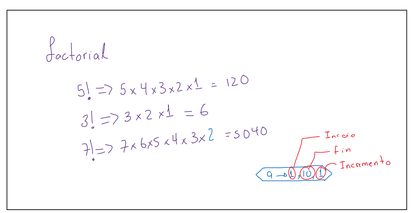

Ciclo for
Ciclo Para
suma = 0
n
a → 1, n, 1
suma = suma + a
'La suma es', suma
producto
multiplicacion
a
Pantalla
> la suma es 19
Producto = multiplicacion x a
Producto = Producto x a

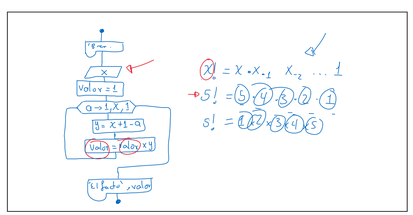

n
a → 2, 2n, 2
a
Pantalla
> 2
> 4
> 6
> 8
> 10
11/2 = 7
14 = 7 x 2

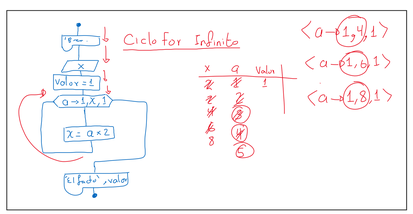

6 + 5n
6 + 50 = 36
a → 6, 30, 6

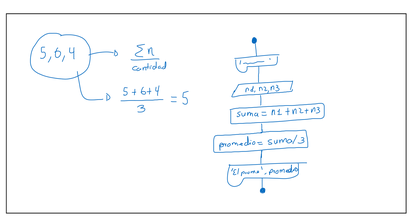

11 x 5
55 x 4
220 x 3
660 x 2
1320 x 1
1320 ÷ 5
264 ÷ 4
66 ÷ 3
22 ÷ 2
11 ÷ 1
11
5
n
e
120
14
Buenas Practicas
a → 1, e, 1
y = e + 1 - a
n = n x y
120 x 14
x 13
x 12
÷ 1
÷ 14
÷ 13
÷ 12
2

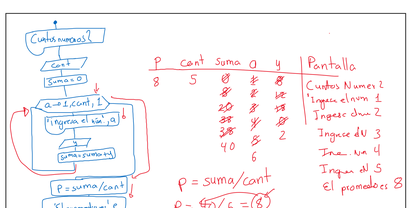

n, e
a → 1, e, 1
y = e + 1 - a
n = n x y
1200
n e^-5
10
a → 1, e, 1
y = e + 1 - a
n = n / y

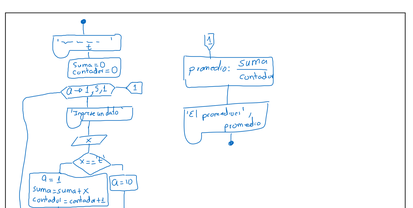

factorial
5! => 5 x 4 x 3 x 2 x 1 = 120
3! => 3 x 2 x 1 = 6
7! => 7 x 6 x 5 x 4 x 3 x 2 = 5040
Inicio
fin
Incremento
a → 0, 10, 1

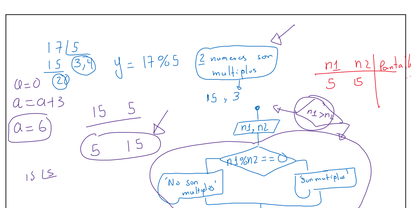

'Ingr...'
x
Valor = 1
a → 1, x, 1
y = x + 1 - a
Valor = Valor x y
'El factor', valor
x! = x · x-1 x-2 ... 1
5! = 5 · 4 · 3 · 2 · 1
5! = 1 · 2 · 3 · 4 · 5

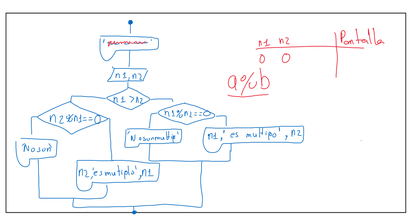

Ciclo for Infinito
'Ingr...'
x
Valor = 1
a → 1, x, 1
x = a x 2
'El factor', valor
x
a
Valor
1
2
4
8
16
32
64
128
256
<a → 1, 4, 1>
<a → 1, 6, 1>
<a → 1, 8, 1>


5, 6, 4
Σn
cantidad
5 + 6 + 4 / 3 = 5
'Ingrese...'
n1, n2, n3
suma = n1 + n2 + n3
promedio = suma / 3
'El prom', promedio


Cuantos numeros?
cant
suma = 0
a = 1, cant, 1
'Ingrese el num', a
suma = suma + a
p = suma / cant
'El promedio es', p
p cant suma a y
8 5 0 1 1 8
2 2 12
3 3 13
4 4 14
5 5 15
40 8 2
6
p = suma / cant
p = 40 / 5 = 8
Pantalla
Cuantos Numeros?
> Ingrese el num 1
> Ingrese dos 2
> Ingrese dos 3
> Ingrese dos 4
> Ingrese dos 5
El promedio es 8


'Ingrese...'
suma = 0
contador = 0
a → 1, 3, 1
1
'Ingrese un dato'
x
x == 0
a = 1
suma = suma + x
contador = contador + 1
a = 10
1
promedio = suma / contador
'El promedio', promedio


17 % 5
15
3, 4
y = 17 % 5
0 = 0
2
a = a + 3
a = 6
15 5
5 15
15 15
5 numeros son multiplos
15 y 3
n1, n2
n2 > n1
n1 % n2 == 0
'No son multiplo'
'Son multiplo'
n1 n2 Pantalla
5 15


'Ingrese...'
n1, n2
n1 > n2
n2 % n1 == 0
n1 % n2 == 0
'No son multiplo'
'Son multiplo'
n1, 'es multiplo', n2
n2, 'es multiplo', n1
n1 n2 Pantalla
0 0
a % b