PROGRAMMES MATHS

Programme TRINOME

```
"- Fonction TRINOME -"
Lbl A
" "
"A : "?→A:" "
"B : "?→B:" "
"C : "?→C:" "
Lbl B
" ":"DELTA :"
B*B-4AC→D Disp
Lbl C
D<0⇒Goto 0
D=0⇒Goto 1
D>0⇒Goto 2
Lbl 0:" ":"Pas de solutions.":Goto 3
Lbl 1:" ":"1Solution double :"
-B/2A→E:E→F Disp Goto 3
Lbl2:" ":"2Solutions :"
(-B+√D)/2A→E Disp
(-B-√D)/2A→F Disp
Goto 3
Lbl 3
"-":"Sommet S(X,Y):"
-B/(2A)→G Disp
-D/(4A)→H Disp
' a(x-G)(x-G)+H
Range -10,10,1,-10,10,1
Graph Y=AXX+BX+C Disp
"Ok"
```

Programme Fonction

```
Lbl 1
"X:"?→X
Prog "EQU" Disp
Goto 1
```

Programme DICHOTOMIE

```
Z=1234567890⇒Goto A
1234567890→Z
"  -- DICHOTOMIE --"
"Fonction dans EQU"
"A:"?→G
"B:"?→H
G<H⇒Goto 8
G→I:H→G:I→H
Lbl 8
G→X:Prog "EQU":Ans→J
H→X:Prog "EQU":Ans→K
JK≥0Goto B
"Precision "?→P
Abs P→P
P=0⇒1E-16→P
Lbl 1
(G+H)/2→I
G→X:Prog "EQU":Ans→J
I→X:Prog "EQU": Ans→L
JL<0⇒Goto 2
I→G:Goto 3
Lbl 2:I→H
Lbl 3:H-G>P⇒Goto 1
Lbl A
G→A:G Disp
H→B:H Disp
Goto Z
Lbl B
"Pas de Solutions"Disp
Goto Z
Lbl Z
0→Z
"Ok"
```

Programme Tangente

```
" --- TANGENTE ----"
" "
" "
"Tangent en "?→F
F→X:2→A:Prog H
Prog "EQU"
Ans→I
H Disp
I-(H*F) Disp
"Ok"
```

Programme FRACTION

```
"FRACTION"
"    Par Remi P?" Disp
" "
"Rationnel"?→A
A→B
Int A→C
1→D
1→E
0→F
Abs (A/1E08)→G
Lbl 1
G>Abs (A-C/D)⇒Goto 9
1/(B-Int B)⇒B
C→H
(Int B)*C+E→C
H→E
D→H
(Int B)*D+F→D
H→F
Goto 1
Lbl 9
C (fraction) D Disp
"Ok"
```

Programme GAUSS (Z)

```
' ---- MODE WRT/MATRIX ---
GAUSS
"PIVOT DE GAUSS"
"     PAR REMI P."
" "
"NOMBRE D'INCONNNUE"?→A
" "
Mat A Disp
1→B:Lbl 1
B+1→C:Lbl 2
*Row+ (-Mat A[C,B]/Mat
A[B,B],A,B,C
C+1→C
A≥C⇒Goto 2
Mat A Disp
B+1→B:A>B⇒Goto 1
A→B
Lbl 3
B-1→C:Lbl 4
*Row+ Mat (Mat A[C,B]/Mat
A[B,B]),A,B,C
C-1→C:C>0⇒Goto 4
B-1→B:B>1⇒Goto 3
A→B:Lbl 5
*Row 1/Mat A[B,B],A,B
Dsz B:Goto 5
Mat A Disp
"OK"
```