

COT**PURPOSE**

Compute the cotangent for a variable or parameter.

DESCRIPTION

The cotangent is defined for all real numbers except integer multiples of π . The range is minus infinity to plus infinity. By default, the angle is specified in radian units. To use degree values, enter the command ANGLE UNITS DEGREES (ANGLE UNITS RADIANS resets it).

SYNTAX

LET <y2> = COT(<y1>) <SUBSET/EXCEPT/FOR qualification>

where <y1> is a number, parameter, or variable;

<y2> is a variable or a parameter (depending on what <y1> is) where the computed cotangent value is stored; and where the <SUBSET/EXCEPT/FOR qualification> is optional.

EXAMPLES

LET A = COT(-2)

LET A = COT(A1)

LET X2 = COT(PI/2)

DEFAULT

None

SYNONYMS

None

RELATED COMMANDS

SIN	=	Compute sine.
COS	=	Compute cosine.
TAN	=	Compute tangent.
SEC	=	Compute secant.
CSC	=	Compute cosecant.
ARCCOS	=	Compute arccosine.
ARCSIN	=	Compute arcsine.
ARCTAN	=	Compute arctangent.
ARCCOT	=	Compute arccotangent.
ARCSEC	=	Compute arcsecant.
ARCCSC	=	Compute arcsecant.

APPLICATIONS

Trigonometry

IMPLEMENTATION DATE

Pre-1987

PROGRAM

```
TITLE COT(X) FOR X = -3.14 TO 3.14
XILABEL ANGLE (RADIANS)
YILABEL COT(X)
YLIMITS -10 10
XLIMITS -3 3
XTIC OFFSET .2 .2
LINES SOLID SOILD DOT DOT DOT DOT
PLOT COT(X) FOR X = 0.01 0.01 3.14 AND
PLOT COT(X) FOR X = -0.01 -0.01 -3.14
LINE DOTTED
MOVEDATA -3.2 0
DRAWDATA 3.2 0
MOVEDATA 0 10
DRAWDATA 0 -10
```

