> restart
> de1 := diff(T(x),x$2) = 0
> Error, invalid input: diff received T(x), x, which is not valid for its 2nd argument
> de1 := diff(T(x),x$2) = 0;
> Error, invalid input: diff received T(x), x, which is not valid for its 2nd argument
> restart;
> de1 := diff(T(x),x$2) = 0;
> Error, invalid input: diff received T(x), x, which is not valid for its 2nd argument
> de1 := diff(T(x),x$2) = 0;

\[ de1 := \frac{d^2}{dx^2} T(x) = 0 \]  

(1)

> bcl1a := T(a) = Ta; bcl1b := T(b) = Tb;
> bcl1a := T(a) = Ta
> bcl1b := T(b) = Tb

(2)

> sl := dsolve({de1,bcl1a,bcl1b},T(x));
> sl := T(x) = \frac{(-Tb + Ta) x}{-b + a} - \frac{Ta b - a Tb}{-b + a}

(3)

> a := 0; b := L; rhs(sl);
> a := 0
> b := L
> -\frac{(-Tb + Ta) x}{L} + Ta

(4)

> Ta := 100; Tb := 0; L := 1; rhs(sl);
> Ta := 100
> Tb := 0
> L := 1
> -100 x + 100

(5)

> plot(rhs(sl), x = 0..L);