(6) -> )read /home/kfp/Desktop/work/fricas+texmacs/test\_serializer.input
Fricas]

(6) 
$$\rightarrow \int_a^b f(x, y, z) dx$$

Compiling function tmMath with type String -> String

"(integrate 
$$(f(x, y, z), x = a..b)$$
)"

Type: String

16. 
$$\int f(t) dt$$

"(integrate 
$$(f(t), t)$$
)"

Type: String

17. 
$$\sum_{i=1}^{N} a_i$$

$$(sum(a[i], i=1..N))$$

Type: String

18. 
$$\prod_{i=1}^{N} b_i$$

$$"(product(b[i], i=1..N))"$$

Type: String

19. 
$$\frac{a}{b}$$

Type: String

20. 
$$D(f(x), x)$$

Type: String

22. 
$$df(x)/dx$$

Type: String

24. 
$$g(x) = \frac{1+x}{1-x^2}$$

"
$$g(x) = ((1+x)/(1-x^{2}))$$
"

Type: String

27. 
$$g(x) = \frac{1+x}{1-x^2}$$

$$g(x) = ((1+x)/(1-x^{2}))$$

Type: String

$$28. \lim_{x \to 0} f(x)$$

$$"\lim(x)(0) f(x)"$$

Type: String

29. 
$$\frac{3}{7}$$

Type: String

30. 
$$\frac{a}{b}$$

Type: String

$$"1..n"$$

Type: String

32. 
$$[a, b, c]$$

Type: String

Type: String

34. 
$$df$$

Type: String

**36.** 
$$df(x)/(dx)$$

"
$$df(x)/(dx)$$
"

Type: String

38. 
$$\begin{cases} a: x = 0, \\ b: else. \end{cases}$$

" a: x = 0, b: else. "

Type: String

39. 
$$|x|$$

Type: String

40. 
$$||v||$$

$$"(\text{norm}(v))"$$

Type: String

**41.** 
$$|x|, ||x||, [x], \{y\}, (z)$$

"(abs 
$$(x)$$
), (norm  $(x)$ ),  $[x]$ ,  $\{y\}$ ,  $(z)$ "

Type: String

42. 
$$a[i], a_k, a_m^n$$

$$"a[i],a[k],a[m]\hat{\ }(n)"$$

Type: String

**44.** 
$$a[i,j]^2$$

"
$$a[i,j]^{\hat{}}(2)$$
"

Type: String

**45.** symbol(a, [1, 2, 3])

"symbol(a, [1, 2, 3])"

Type: String

**46.** [1, 2, 3, x]

"[1, 2, 3, x]"

Type: String

47. 1...123

"1..123"

Type: String

48. *x*!()

"x!()"

Type: String

49. !*x* 

"!x"

Type: String

50. —

" '

Type: String

51. —

"longminus"

Type: String

52.  $\mapsto x$ 

||->x||

Type: String

53. not true

"not true"

Type: String

54. ≈5

"approx5"

Type: String

55. *∼v* 

" $^{\sim}v"$ 

Type: String

56. ??

"??"

57. ==

Type: String

"=="

Type: String

58. x == y

"x = =y"

Type: String

59.  $\forall x \in \mathbb{Z}$ 

"forall x in ZZ"

Type: String

60.  $\exists ? x: x > 0$ 

"exists ? x: x > 0"

Type: String

**61.** toggleMathInput()

"toggleMathInput()"

Type: String

62. *x* 

"x"

Type: String

63.  $\int f(x) dm(x)$  $\sum_{x \in A} F[x]$ 

 $"(\mathrm{integrate}\,(f(x),m(x)))\mathrm{sum}\,[F[x]|x\,\mathrm{in}\,A]"$ 

Type: String

64. abc

"abc"

Type: String

65.  $L^{A}T_{E}X$ 

65. 1+2

"1 + 2"

Type: String

66.  $T_E X_{MACS}$ 

66. |-|

"(abs(-))"

Type: String

67.  $\sqrt{x}$ 

 $"[\operatorname{sqrt}(x)]"$ 

```
Type: String
68. \sqrt{x}
   "\operatorname{sqrt}(x)"
   Type: String
69. \langle error | compound x \rangle
69. x
   "x"
   Type: String
70. "x"
   ",x,"
   Type: String
71. limit(1/x, x=4)
   76. limit(1/n,n=%plusInfinity)
   0
   {\tt Type: Union(OrderedCompletion(Fraction(Polynomial(Integer))), \ldots)}
77.
```