Lambda Calculus

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1 Grammar

term ::= '\' bindings '.' term
  | app

app ::= atom
  | app atom

atom ::= var
  | '(' term ')'

var ::= NAME

bindings ::= NAME+

NAME ::= ['a'..'z']

2 Examples

- \x y.x: term => \bindings . term => \x y . term => \x y . app =>
  \x y . atom => \x y . var => \x y . x

- (\x.x) (y z): term =>
  app =>
  app atom =>
  atom atom =>
  (term) atom =>
  (term) (term) =>

```
(\bindings . term) (term) =>
(\x . term) (term) =>
(\x.x) (term) =>
(\x.x) (app) =>
(\x.x) (app atom) =>
(\x.x) (atom atom) =>
(\x.x) (var atom) =>
(\x.x) (y atom) =>
(\x.x) (y var) =>
(\x.x) (y z)
```