Autonomous functions

We have chosen the term *autonomous function* for a function that accomplishes its work using only:

- values of arguments and local variables computed from these arguments,
- globally defined constants, and
- globally defined autonomous functions that are assumed to be nearly constant.

Autonomous functions are much easier to test and debug than other functions, since they yield the same result every time they are executed. They are not influenced by changes in the global environment such as values of global variables).

Notice that the definition is recursive, so that autonomous functions can be built as long as only other autonomous functions are used in their implementation.

This fact greatly simplifies bottom-up programming, in which more and more complex functions are created out of simpler, lower-level functions. Keeping these functions autonomous makes it possible to test and debug very complicated functions in a very efficient way.