Phase	Goal	Activity
Data Analysis & Design	to formulate a group of data definitions	determine how many pieces of data describe the "interesting" aspects of a typical object mentioned in the problem statement • add a structure definition and a data definition (for each class of problem object)
Contract Header & Purpose	to name the program, to specify its inputs & outputs, to describe its purpose, to formulate a program header	name the function, its inputs, its output, and specify its purpose: ;; *name* : *in1 in2* . . . → *out* ;; **Purpose**: to compute . . . *x1* . . . *x2* (**define** (*name x1 x2* . . .) . . .)
Examples	to characterize the input-output relationship via examples	search the problem for examples • add examples to function (input(s), output) • validate the examples using the problem statement, if possible
Template	to formulate an outline for a group of programs	for those parameters that stand for compound values, annotate the body with selector expressions • if the function is conditional, annotate all appropriate branches
Body	to define the program	develop a Scheme expression that uses Scheme's primitive operations, other functions, selector expressions, and the variables
Test	to expose mistakes ("typos" and logic)	apply the function to the inputs of the examples • check that the outputs are as predicted above