



# Problem of the Week

## Problem B and Solution

### Ch-ch-ch-change!



### Problem

Canada has the following coins in circulation: nickel (5 cents), dime (10 cents), quarter (25 cents), loonie (\$1), and toonie (\$2). Australia, on the other hand, has coins with value 5 cents, 10 cents, 20 cents, 50 cents, \$1, and \$2.

Using the least number of coins in each case, determine how to obtain multiples of 5 cents, from 5 cents to 95 cents, in each currency. For how many of the amounts did you use a different number of coins in Canadian currency than in Australian currency?

Amount \$	Canadian \$	Australian \$
0.05		
0.10		
0.15		
0.20		
0.25		
0.30	$0.25 + 0.05$	$0.20 + 0.10$
0.35	$0.25 + 0.10$	$0.20 + 0.10 + 0.05$
0.40		
0.45		
0.50		
0.55		
0.60		
0.65		
0.70		
0.75		
0.80		
0.85		
0.90		
0.95		