

Check for Mistakes in this Word Problem: state-tax

**Directions:** Some states have different tax rates. New York is 8%, Pennsylvania is 3%, and Delaware is 0%. All other states are 5%. Write a function that takes in the price of an item and returns how much the tax will be on the item.

Contract and Purpose Statement

Every contract has three parts...

; state-tax : string → number  
functionname domain range

; Given the state and an item's price, returns the the tax on that item  
what does the function do?

Examples

Write some examples, then circle and label what changes...

(EXAMPLE( (tax Delaware) (+ 0.0 price) )  
functionname input (s) what the function produces

(EXAMPLE( (tax Georgia) (+ 0.05 price) )  
functionname input (s) what the function produces

Definition

Write the definition, given variable names to all your input values...

(define( state-tax state price )  
functionname variables

(cond

[ (string=? state "Pennsylvania") (\* 0.03 price) ]

[ (string=? state "New York") (\* 0.08 price) ]

[ (string=? state "Delaware") (\* 0.0 price) ]

[else (\* 0.05 price) ]))