# Markup, Discount, and Tax Word Problems 

## BLAKE'S BODY SHOP

1.) At Blake's Body Shop, the normal price of an oil change is $\$ 89.00$. If Sean has a coupon for $22 \%$ off an oil change, how much will he be charged before taxes are applied (to the nearest cent)?
2.) It costs Blake a total of $\$ 17.12$ for a quart of motor oil. If sells quarts of motor oil to customers at a $65.3 \%$ how much does he charge (to the nearest cent)?
3.) At Blake's Body shop, the cost of a realignment is $\$ 1,762$ and the cost of an emissions test is $\$ 240$. If the sales tax rate is $8.6 \%$, what would be the total cost, including tax, for both a realignment and an emissions test (to the nearest cent)?
4.) Blake purchased a vintage sports car for $\$ 4,875$. After making repairs to the engine, Blake sold the car at a $150 \%$ markup. How much of a profit did he make after selling the car (to the nearest cent)?
5.) Jeb takes his car into Blake's Body Shop for repairs. He needs an oil change for $\$ 89$, new windshield wipers for $\$ 34$, new tires for $\$ 786$, and new brake pads for $\$ 439$. If Blake gives Jeb a $33.5 \%$ discount before taxes, and the tax rate is $6.4 \%$, what will be the total cost, including tax, of Jeb's repairs (to the nearest cent)?

## ANSWER KEY

1.) $\$ 69.42$
2.) $\$ 28.30$
3.) $\$ 2,174.17$
4.) Cost: 4,875

Sold: 7,312.50
Profit: 7,312.50-4,875 = \$2,437.50
5.) Normal Price: $89+34+786+439=\$ 1,348$

After 33.5\% Discount: \$896.42
Tax: $\$ 896.42 \times 0.064=\$ 57.37$
Total Cost: $896.42+57.37=\$ 953.79$

