

1. You think that Big 'n' Oily Malted Balls candy (symbol BOMB) is going to be the next big thing. The stock is currently selling for \$29. You purchase a call options contract to buy 100 shares at \$30. The price of the option was \$2. Answer the following questions: market price = \$29 strike price = \$30 \$1 out-of-the-money
  - i) Is your option: a) "in-the-money" b) "at-the-money" c) "out-of-the-money"
  - ii) What is the break-even point for your option? option price \$2 + strike price \$30 = \$32 break-even point
  - iii) Ignoring commissions, if the stock price rose to \$36, what would be your profit?  

$$\begin{matrix} \$36 \\ \text{stock price} \end{matrix} - \begin{matrix} \$32 \\ \text{break-even point} \end{matrix} = \$4 \text{ profit} \times 100 \text{ shares for one contract} = \underline{\$400 \text{ profit}}$$
2. You are sure that the price of Opie's Obedient Pet Service (symbol OOPS) is far too high. You think investors have bid up the price to an outrageous amount. About a month ago, you purchased a put options contract to sell 100 shares at \$90. The price of the option was \$3. The stock is currently selling for \$88. Answer the following questions:
  - i) Is your option: a) "in-the-money" b) "at-the-money" c) "out-of-the-money" \$90 strike price  
\$88 market price
  - ii) What is the break-even point for your option? Strike price \$90 - option price \$3 = \$87 break-even price
  - iii) Ignoring commissions, if the stock price fell to \$82, what would be your profit?  

$$\begin{matrix} \$87 \\ \text{break-even price} \end{matrix} - \begin{matrix} \$82 \\ \text{stock price} \end{matrix} = \$5 \text{ profit} \times 100 \text{ shares for one contract} = \underline{\$500 \text{ profit}}$$
3. Your broker calls you and says, "Ya' know, straddles are a great way for you to generate commissions, uh, I mean make money. This stock, Young's Underwater Crab Hatchery (symbol YUCH), is extremely volatile. It's currently selling for \$33. I suggest you purchase a call option to buy at \$35 and a put option to sell at \$35. The price of the call option is \$2 and the price of the put option is \$5." Even though you're not quite sure whether or not this is a good idea, you go ahead with the offer from your broker. Answer the following questions:
  - i) What's the total price of your options (excluding commissions)? \$2 call + \$5 put = total price \$7 \$7 \* 100 shares = \$700
  - ii) How far does the stock price have to swing from \$35 in either direction before your straddle is "in-the-money?" (i.e. What's the break-even point?)  
must swing \$7 in either direction above \$42 or below \$28
4. You purchased 100 shares of Pretzel's Unlimited (symbol PU) some time ago when the price was \$10. The current price is around \$72. You are thinking of selling but you aren't sure. Instead, you sell (write) a single call options contract at the strike price of \$75. The option price was \$1. Answer the following questions:
  - i) How much money did you receive when you sold (wrote) the call options contract? \$1 \* 100 shares = \$100 option premium
  - ii) If the option is exercised, what price will you receive for your 100 shares of PU stock? strike price = \$75
  - iii) What is the total amount you will receive? What are the disadvantages of this strategy?  

$$\begin{matrix} \$75 \\ \text{strike price} \end{matrix} + \begin{matrix} \$1 \\ \text{option price} \end{matrix} = \$76 \text{ per share} \times 100 \text{ shares for one contract} = \underline{\$7600 \text{ received}}$$

If the price were to rise very high, you would lose the opportunity to sell the stock at the very high price
5. Fire Abatement Technology (symbol FAT) is currently selling for \$15. You are thinking of purchasing 100 shares but you're not quite sure. Instead, you sell (write) a single put options contract with a strike price of \$15. The put option sells for \$2. Answer the following questions:
  - i) How much money did you receive when you sold (wrote) the put options contract? \$2 option price \* 100 shares for one contract = \$200 received
  - ii) If the option is exercised, what price will you pay for the 100 shares of PU stock? strike price \$15
  - iii) What's the effective price per share that you paid for PU (assuming the option is exercised)? \$15 - \$2 = \$13 effective price
  - iii) Is this an effective strategy? What are the advantages and disadvantages?  

It may be an effective strategy -- as long as you have the cash (covered put option)

advantage - cheaper price than what you would have paid

disadvantages - price could fall very low and you still have to buy the stock at \$15  
- might not get the stock if price goes up