

ROCK-CLIMBING GYM

(name) _____

For \$360, a rock-climbing gym offers a yearly membership where members can climb as many days as they want and pay \$4 per day for equipment rental. Nonmembers pay \$10 per day to use the gym and \$6 per day for equipment rental.

a) If you go rock-climbing once a month, should you buy a yearly membership? Explain.

I wrote equations for the total cost of using the gym with a yearly membership and the total cost of using the gym without a yearly membership. Then I graphed both equations and labeled them 1 and 2.

b) Which line represents the cost of using the gym with a yearly membership? Explain.

c) Write an equation for the total cost of using the gym with a yearly membership, and an equation for using the gym without a yearly membership.

d) How many visits will it take until the total cost for a member and nonmember are the same?

