**More Monohybrid Punnett Squares Practice**  Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Date: \_\_\_\_\_\_\_\_\_\_\_ Hr:

1. Two guinea pigs have mated and have had 100 babies. One guinea pig is heterozygous for black hair and the other has brown hair. The black allele is dominant over the brown allele. How many offspring would you expect to be black?
2. There are two squirrels that have mated and produced offspring. One squirrel is heterozygous for black hair. The other squirrel has brown hair. What is the probability that the squirrels' children have black hair?
3. A person who is pure for having a widow's peak is crossed with a person who is pure for no widow's peak. All of the offspring have a widow's peak. Which trait is dominant and which is recessive. Show a punnett square to support your answer.
4. In guinea pigs, black fur is dominant. If a black guinea pig is crossed with a white guinea pig, and the litter contains a white offspring, what is the genotype of the black haired parent? Show the punnet square to support your answer.
5. In minks, brown fur is dominant over silver-blue color.
   1. What offspring would you predict if you crossed a homozygous brown mink with a silver-blue mink? Show the punnett square to support your answer?
   2. What would the genotype and phenotype ratios be if you crossed two F1 generation mink from the above problem to produce the F2 generation?
6. Mr. Mendel (Gregor Mendel's brother) and his wife recently had a little baby Pea Pod, but it has not been a happy occasion for them. Mrs. Mendel has been upset since she first saw her new baby who had short eyebrows. She claims that the hospital mixed up her baby with someone else's. Mr. Mendel is homozygous for his long eyebrows, and Mrs. Mendel is heterozygous for her eyebrows. Some of the members of her family have short eyebrows, which is the recessive trait. Create a punnett square to determine the genotype and phenotype ratios of their children. Did the hosptial make a mistake? Explain your answer.