

## Create a Mendelian creature!

- 1) Combine your gametes (Put your sperm and egg together) This is the genotype of your creature!
- 2) Glue down the genotype of your creature on the top of your poster.
- 3) Next, look at the chart below and circle the traits your creature will have.
- 4) Create the phenotype! Cut out the required traits and glue your creature on poster paper. Be careful! You can only create what your genes tell you to make!

### Dominant Traits

1. **HH** or **Hh** = 3 yellow Horns on a big oval head. (Draw head)
2. **PP** or **Pp** = Eyes have pupils
3. **EE** or **Ee** = Three eyes on head
4. **MM** or **Mm** = Mean Red eyes  
slanted like this: (\ /)  
Third eye on top (if you have three eyes)
5. **NN** or **Nn** = Human nose below eyes
6. **RR** or **Rr** = Color the nose red
7. **FF** or **Ff** = Fangs under nose
8. **CC** or **Cc** = Teeth are creamy white
9. **DD** or **Dd** = Teeth point down
10. **BB** or **Bb** = Bad teeth (cut 2 or 3 off)
11. **TT** or **Tt** = Tyrannosaurus Rex legs
12. **AA** or **Aa** = Has arms (Draw the body)
13. **SS** or **Ss** = Spikes on tail
14. **LL** = Light Brown skin color
15. **WW** or **Ww** = Gray bat wings (Draw them!)



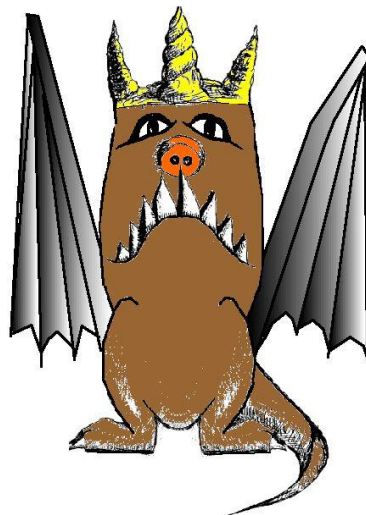
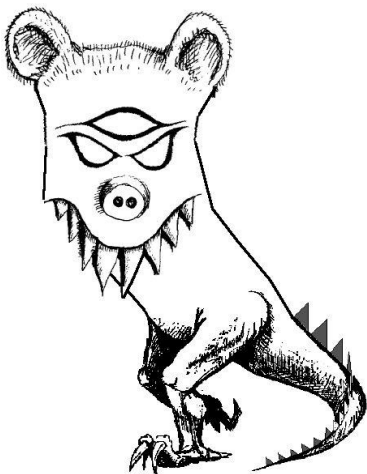
### Recessive Traits

- hh= Fuzzy ears (Draw head)
- pp= Eyes don't have pupils
- ee= Two eyes on head
- mm = Nice white eyes  
slanted like this: (/ \)  
Third eye on bottom (if you have three eyes)
- nn= Pig nose below eyes
- rr= Color the nose orange
- ff= Human teeth under nose
- cc = Teeth are yellow.
- dd= Teeth point up
- bb= No missing teeth
- tt= Bunny legs
- aa = Armless (Draw body)
- ss= Tail, but no spikes
- ll = no color (no pigment)
- ww = No wings at all.

## Analyzing your creature

**When you are done, attach this page on the back of your monster and answer the questions!**

1. Why do 2 letters control each trait? Explain carefully.
2. How many genes does your beast have?
3. Which trait is neither dominant nor recessive when the genotype is comprised of an uppercase and lowercase letter? In other words, what trait has a mixed phenotype as a result of mixed letters?
4. Look at your creature's eyes. Is your creature nocturnal? Or, can it move about during the day as well as the night?
5. Look at your creature's coloring. Where should your creature live? In the brown woods? In the green grassland? Other? Why? Describe its habitat and why it should live there.
6. Look at your creature's teeth. Is your creature designed to be an herbivore or a carnivore/predator?
7. What are the positive and negative features of your creature? Make a list of pros and cons.
8. How likely is your creature to survive and reproduce in its habitat? Why or why not? Be very specific when answering this question!
9. Examine the other creatures in the room and find one that is likely to die. Describe the creature and why it will probably not survive. Be very specific when answering this question!



H P E M N R F C D B T A S L W

H p E m N r F c D b T a S l W

h P e M n R f C d B t A s L w

h p E M n r F C d b T A s l W

H p e M N R f c d B T A s L w

h P e m N r f c D b t a S L w

h p E m n R f c d b t A s l w

h p e m n r f C D b t a S L W

H p e m N r f c d B T A s l w

h P e M n r F c d B t a s L W

h p E m n R F C D b T A S l w

h P e m N r f C D b t a s L W

h p E M n r f c d b T A s l w

H p e m N r F c D b t a S L w

h P E m n r F C d b t a s L w

H p e m n r F C d B t a s l W

h p e m n r f c d B t A s L w

h p E M N r f c d b t a S l w

H P e M n R F c d B t a s L w

h p e m n r f c d b t a s l w

h p E m N r f c d b t a s l w

h p e m n r f c d b t a s l w

h P E m n r F c d b t A s L W

h p e m n r f c d b t a s l w

h p e m n r f c d b t a s l w

h P E m n r F c d b t A s L W

h P E m n r F c d b t A s L W