

Name _____ Date _____ Period _____

Simple Genetics Practice Problems

1. For each set of alleles, indicate whether it is purebred (P) or hybrid (H)

AA _____	Ee _____	li _____	Mm _____
Bb _____	ff _____	Jj _____	nn _____
Cc _____	GG _____	kk _____	OO _____
Dd _____	HH _____	Ll _____	Pp _____

2. For set each of alleles below, determine what trait the organism will have.

<i>Purple flowers are dominant to white flowers</i>	<i>Brown eyes are dominant to blue eyes</i>
PP _____	BB _____
Pp _____	Bb _____
pp _____	bb _____
<i>Round seeds are dominant to wrinkled</i>	<i>Bobtails are recessive (long tails dominant)</i>
RR _____	TT _____
Rr _____	Tt _____
rr _____	tt _____

3. For each trait, list the symbols of the alleles. (Remember to use the letter of the dominant trait, ex. The letter for Straight hair would be "S" and for curly hair would be "s")

<i>Straight hair is dominant to curly.</i>	<i>Pointed heads are dominant to round heads.</i>
_____ straight	_____ pointed
_____ straight	_____ pointed
_____ curly	_____ round

**4. A TT (tall) plant is crossed with a tt (short plant). What will the alleles of the offspring be? _____

**5. A purebred round seeded plant is crossed with a purebred wrinkled seeded plant. What are the alleles of the parents?

_____ x _____

What percentage of the offspring will also be purebred? _____