$$
\begin{aligned}
\text { 1. a. Quick } & =Q \\
\text { slow } & =q
\end{aligned}
$$

$$
\text { Brown }=B
$$

$$
\text { white }=b
$$

b. $P_{1}$ cross: $Q_{q} B b \times q q b b$ Gametes
C.


Genotype ratio:

$$
1: 1: 1: 1
$$

phowtye ratio:

$$
1: 1: 1: 1
$$



4. Antennapecia-A normul - a

$$
\begin{aligned}
& A: 575 / 1200=47.9 \%(50) \\
& a: 625 / 1200=52.6 \%(50)
\end{aligned}
$$

$$
\begin{array}{cc}
A: & A \\
a & a \\
a+A_{a} & a a \\
a & A_{0} \\
a a \\
\hline
\end{array}
$$

P.
B. $A_{a} \times A_{a}$

| $A$ | $a$ |  |
| ---: | ---: | ---: |
| $A$ | $A A$ | $A_{a}$ |
| $a$ | $A_{a}$ | $a a$ |

6. ratio:

$$
1: 2: 1
$$

P.ratio: 3:1

