

- 14** For a certain value of the constant p , the random variable X has the probability distribution given in the table.

x	1	2	3	4
$P(X = x)$	p	$\frac{1}{6}p$	p^2	$\frac{1}{2}$

Two independent values, X_1 and X_2 , of X are found.

Determine $P(X_2 = 2X_1 \mid X_2 > X_1)$.

[8]