

If X is a continuous random variable that is uniformly distributed on the interval $[-5, 8]$, then what is the probability that $X^2/3$ is less than $6 - X$?

- (a) $8/13$
- (b) $9/13$
- (c) 8
- (d) $1/8$
- (e) $1/13$
- (f) $1/3$
- (g) $2/8$
- (h) $2/13$
- (i) $2/3$
- (j) 1
- (k) 0
- (l) None of these