



UNIVERSITY OF WISCONSIN  
**PLATTEVILLE**  
DEPARTMENT OF MATHEMATICS

PROBLEM OF THE WEEK #1  
(Fall 2023)

Let's shuffle a standard deck of 52 cards (no jokers), then reveal cards one by one until we've seen three kings. On average, how many cards do we expect we'll see?

[Please fully explain your answer.]

Email solutions to [swensonj@uwplatt.edu](mailto:swensonj@uwplatt.edu) by 2:00pm on Wednesday, September 20, 2023.

Every week, the best solution submitted earns a \$10 Platteville gift certificate; the top scorer each semester also wins a cash award. Good luck!

You can always see the Problem of the Week (and complete rules) online at:

<http://uwpmath.weebly.com/>