

61A Extra Lecture 2

Announcements

cs61a.org/extra.html

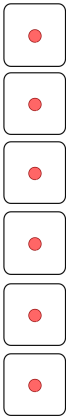
Dice

Exact Chances for Rolling Dice

`roll_dice(2)`

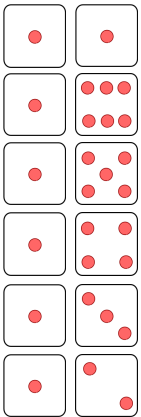
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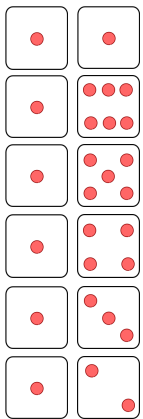
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Exact Chances for Rolling Dice

roll_dice(2)



1

2

3

4

5

6

7

8

9

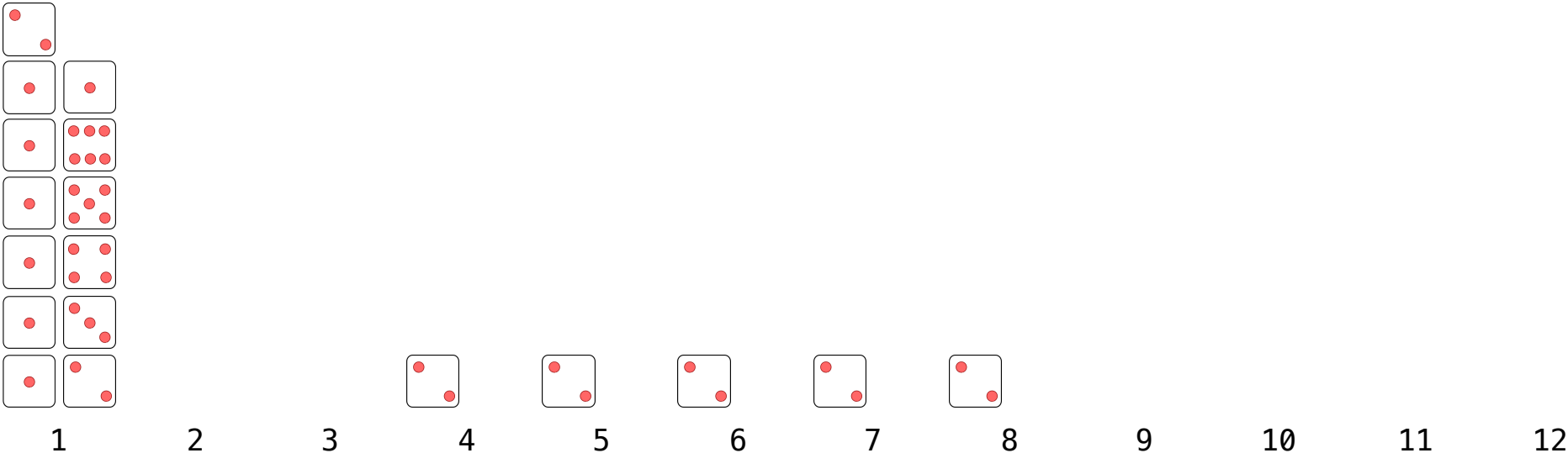
10

11

12

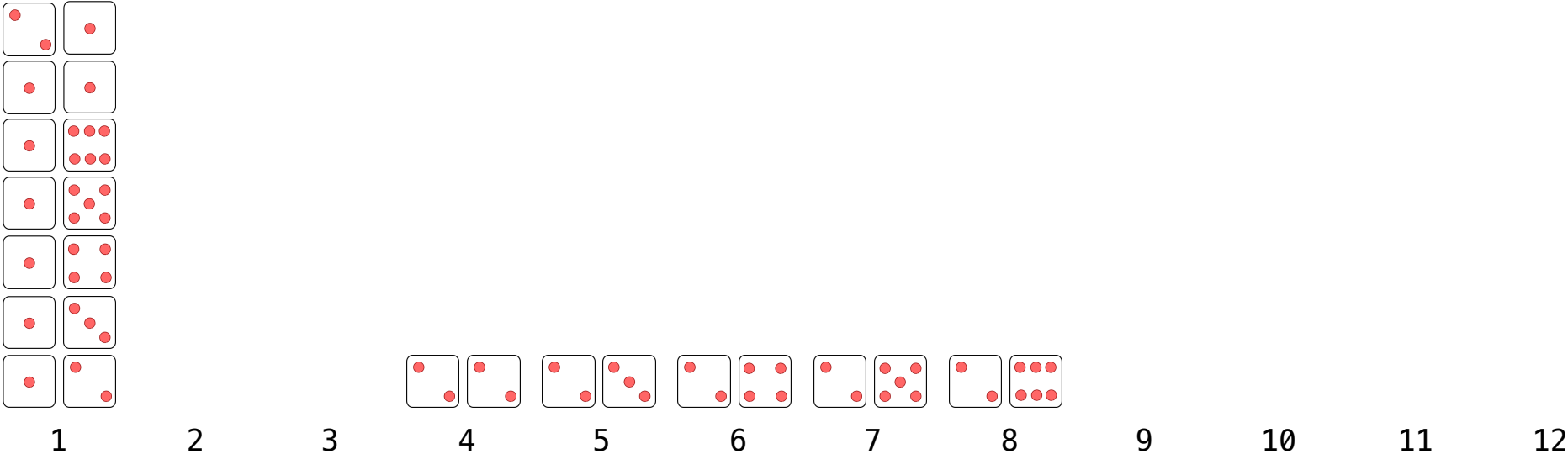
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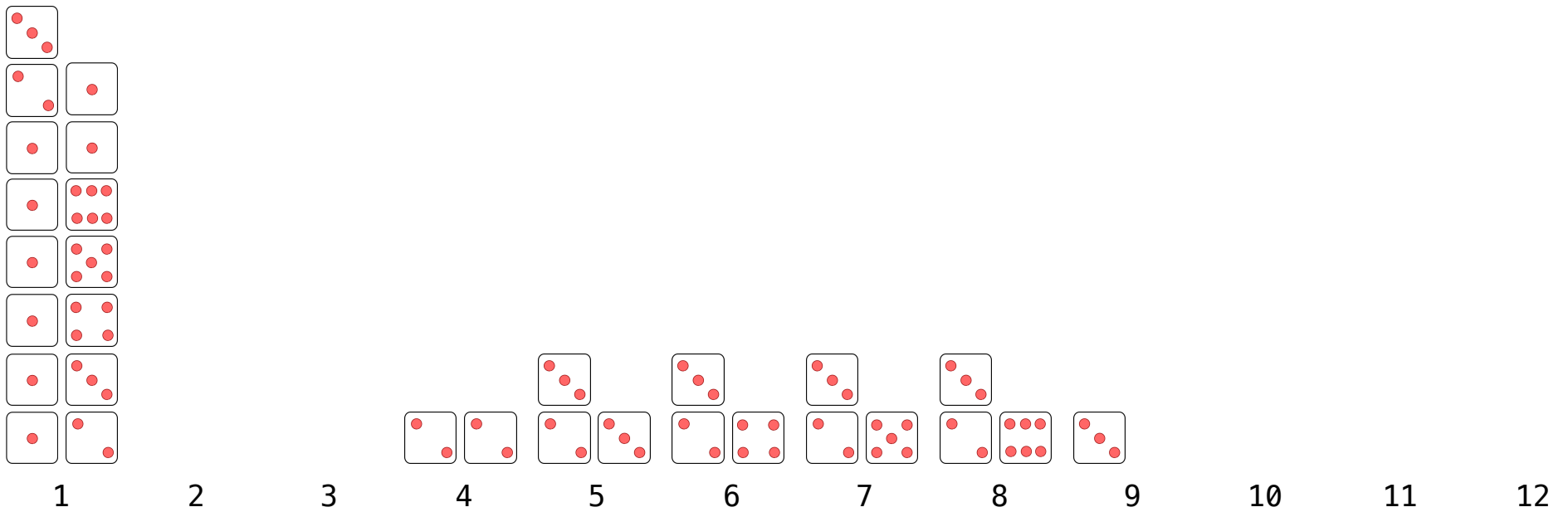
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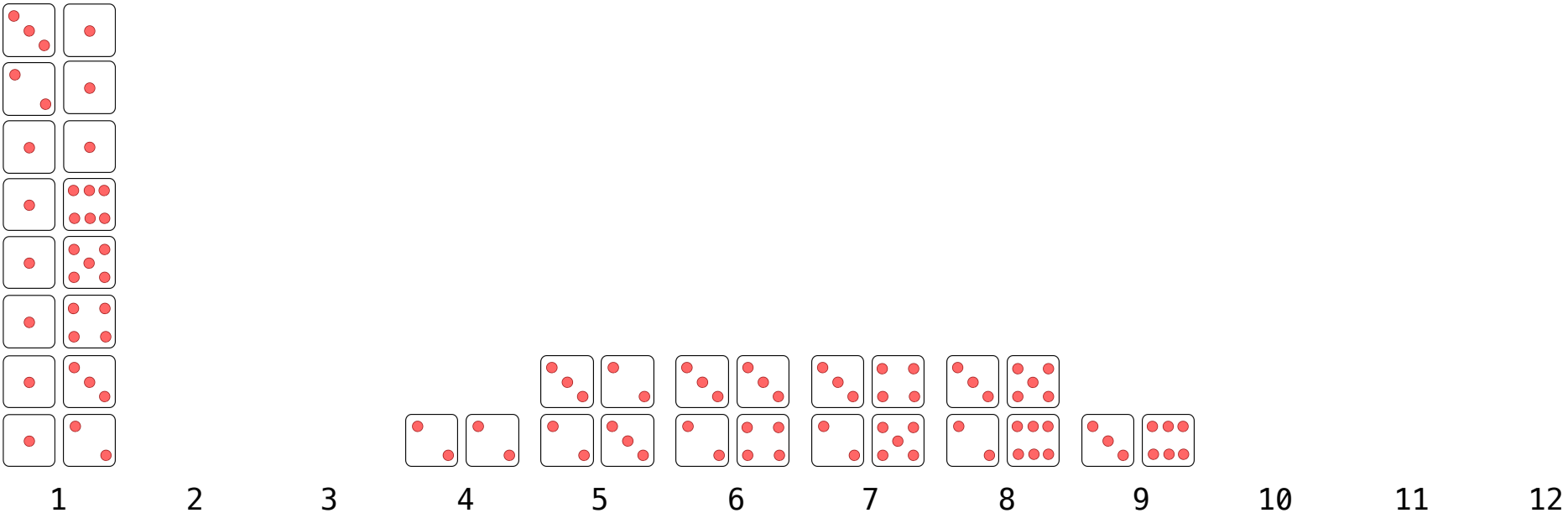
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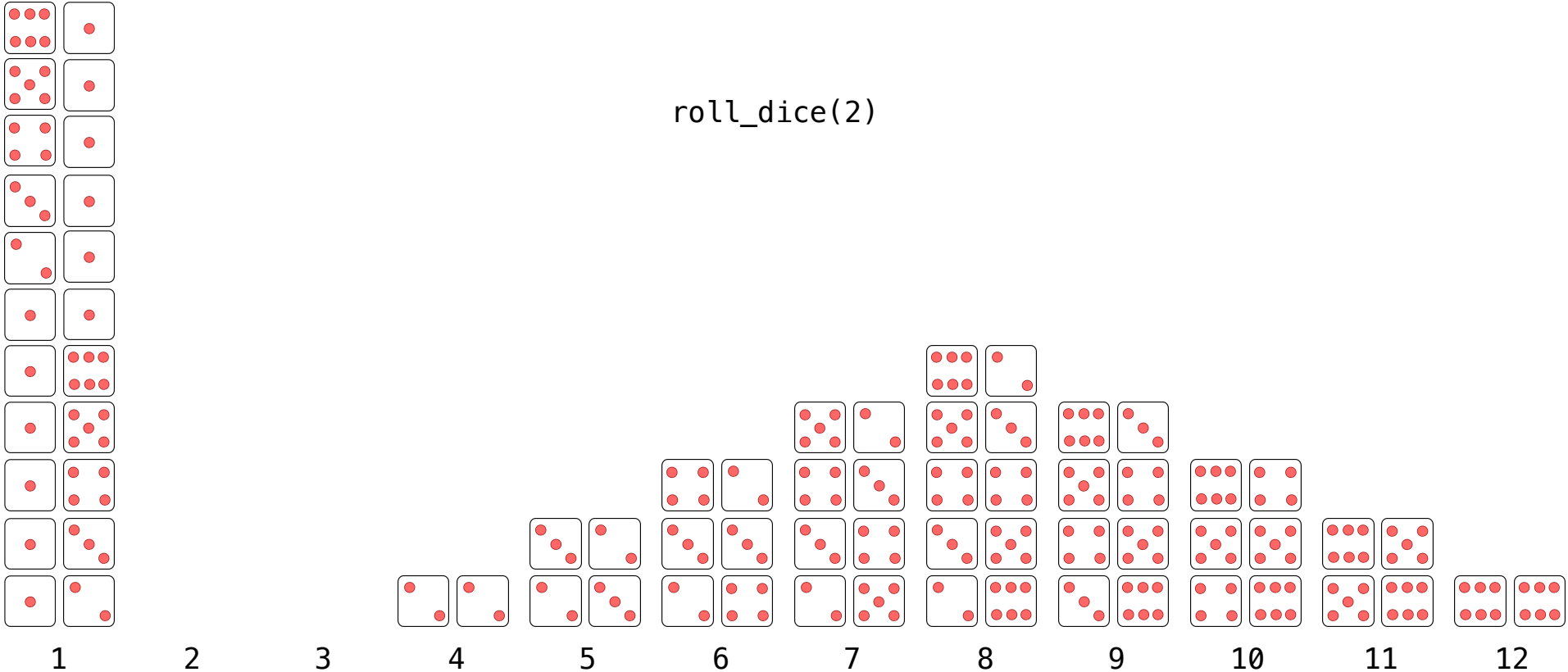


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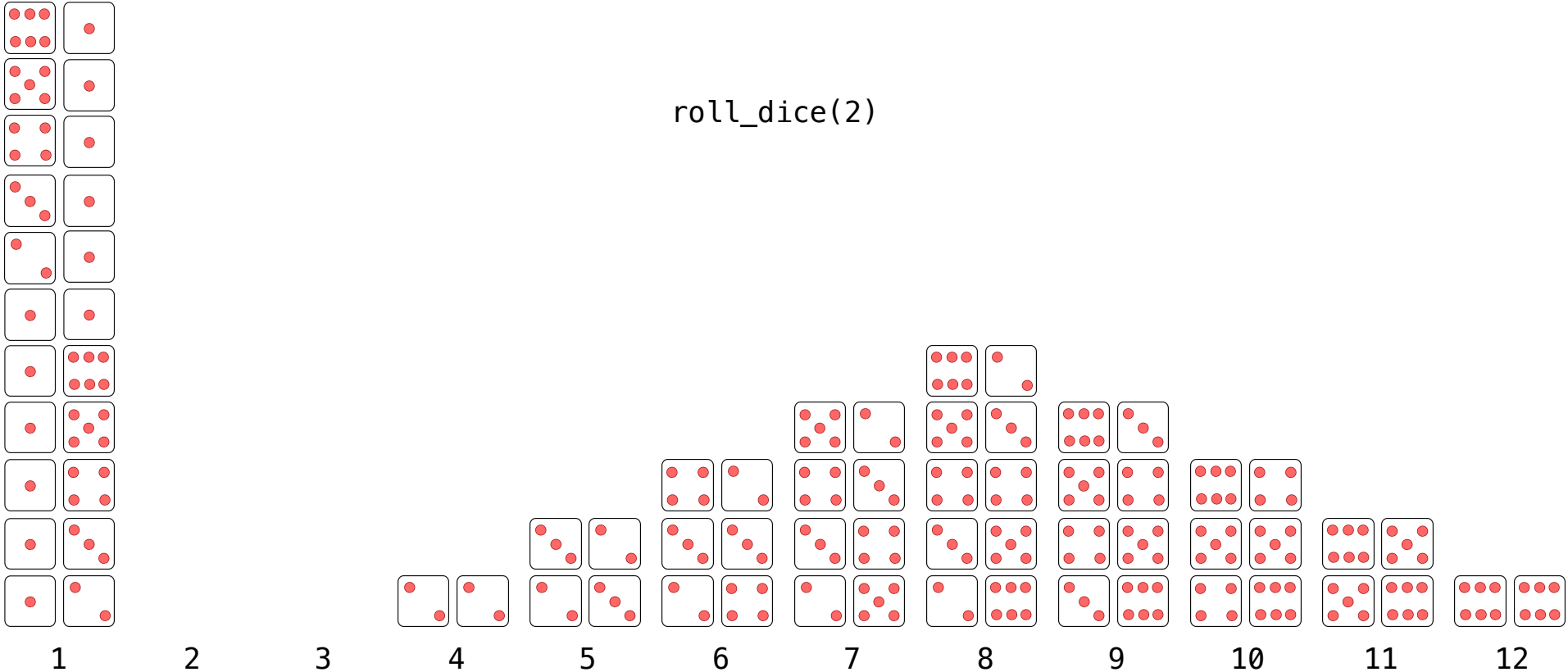
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Exact Chances for Rolling Dice



Exact Chances for Rolling Dice



(Demo)

Hog: The End Game

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You: 99
Them: 99

Hog: The End Game

You: 99
Them: 99

You: 88
Them: 99

Hog: The End Game

You: 99
Them: 99

You: 88
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You: 80
Them: 99

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You: 99
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What is the chance that I'll score *at least* **k** points rolling **n** six-sided dice?

Hog: The End Game

You: 99
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What is the chance that I'll score *at least* k points rolling n six-sided dice?

(Demo)

Twenty-One (Nim)

Twenty-One Rules

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Two players alternate turns, on which they can add 1, 2, or 3 to the current total

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Some states are good; some are bad

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21

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(Demo)

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21 **20**

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(Demo)

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(Demo)

19

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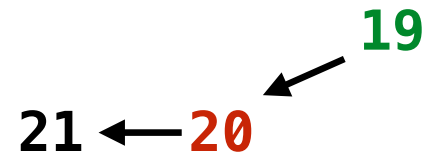
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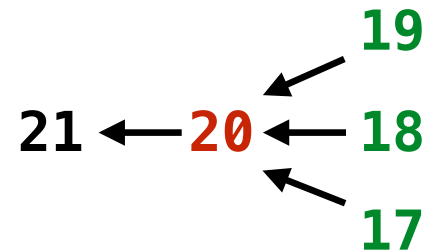
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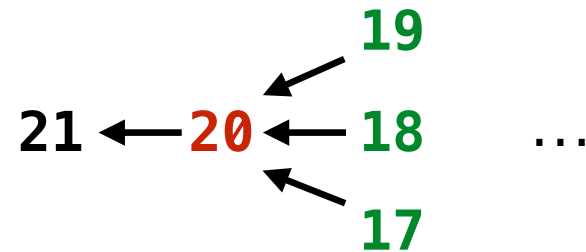
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