

Combinations – How many ways to Roll n

d6	1	2	3	4	5	6	7	8
1	1							
2	1	1						
3	1	2	1					
4	1	3	3	1				
5	1	4	6	4	1			
6	1	5	10	10	5	1		
7		6	15	20	15	6	1	
8		5	21	35	35	21	7	1
9		4	25	56	70	56	28	8
10		3	27	80	126	126	84	36
11		2	27	104	205	252	210	120
12		1	25	125	305	456	462	330
13			21	140	420	756	917	792
14			15	146	540	1161	1667	1708
15			10	140	651	1666	2807	3368
16			6	125	735	2247	4417	6147
17			3	104	780	2856	6538	10480
18			1	80	780	3431	9142	16808
19				56	735	3906	12117	25488
20				35	651	4221	15267	36688
21				20	540	4332	18327	50288
22				10	420	4221	20993	65808
23				4	305	3906	22967	82384
24				1	205	3431	24017	98813
25					126	2856	24017	113688
26					70	2247	22967	125588
27					35	1666	20993	133288
28					15	1161	18327	135954
29					5	756	15267	133288
30					1	456	12117	125588
31						252	9142	113688
32						126	6538	98813
33						56	4417	82384
34						21	2807	65808
35						6	1667	50288
36						1	917	36688
37							462	25488
38							210	16808
39							84	10480
40							28	6147
41							7	3368
42							1	1708
43								792
44								330
45								120
46								36
47								8
48								1
SUM	6	36	216	1296	7776	46656	279936	1679616

Combinations – How Many Ways to Roll n Sixes

d6	1	2	3	4	5	6
C	6	36	216	1296	7776	46656
0	5	25	125	625	3125	15625
1	1	10	75	500	3125	18750
2		1	15	150	1250	9375
3			1	20	250	2500
4				1	25	375
5					1	30
6						1

Percentages – Chances of Rolling n Sixes

d6	1	2	3	4	5	6
0	83.333%	69.444%	57.870%	48.225%	40.188%	33.490%
1	16.667%	27.778%	34.722%	38.580%	40.188%	40.188%
2		2.778%	6.944%	11.574%	16.075%	20.094%
3			0.463%	1.543%	3.215%	5.358%
4				0.077%	0.322%	0.804%
5					0.013%	0.064%
6						0.002%

Success Percentages – Chances of Rolling n or more Sixes

d6	1	2	3	4	5	6
0	100.000%	100.000%	100.000%	100.000%	100.000%	100.000%
1	16.667%	30.556%	42.130%	51.775%	59.812%	66.510%
2		2.778%	7.407%	13.194%	19.624%	26.322%
3			0.463%	1.620%	3.549%	6.229%
4				0.077%	0.334%	0.870%
5					0.013%	0.066%
6						0.002%