

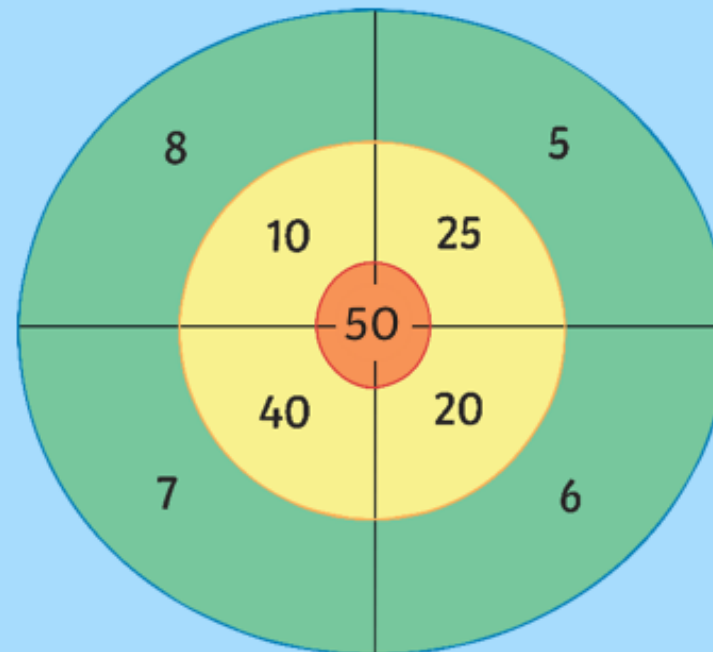
Starter

What is the highest total you could score with three darts? 150

What is the lowest total you could score with three darts? 15

How many ways can you find to score 100?

How many different ways can you find to make a score with a '3' in the ones column?





Summer week 9 Lesson 5 – 26.06.20

LO: To solve problems involving 2-way tables

Success Criteria:

- | |
|--|
| 1. Read the question carefully |
| 2. Decide which section of the chart the question is about e.g. Baseball |
| 3. Look at that section to check your answer |
| 4. Decide whether it is true or false. |

Model

What is your favorite sport to watch on television?			
	Football	Basketball	Baseball
Males	40	22	15
Females	12	16	45
Total	52	38	60

True or false

60 people said their favourite sport on TV was Baseball?

True - the total number of females plus males = 60 - 15 + 45 = 60

There were 22 males who liked football?

False – there were 40



Can you pair the right information with the right two-way table?

1. Number of Boys and Girls in a maths class				2. Number of Boys and Girls in a maths class				3. Number of Boys and Girls in a maths class			
Class 1				Class 2				Class 3			
	Year 7	Year 8	Year 9		Year 7	Year 8	Year 9		Year 7	Year 8	Year 9
Boys	14	15	18	Boys	11	18	7	Boys	11	0	14
Girls	16	13	10	Girls	22	14	20	Girls	15	15	9
<p>This teacher has a class with exactly twice as many girls than boys.</p> <p style="text-align: center; color: red; font-size: 2em;">2 > 7</p>				<p>This teachers has 64 pupils in total in their Key Stage 3 classes.</p> <p style="text-align: center; color: red; font-size: 2em;">3</p>				<p>One of the classes contained 32 pupils in total.</p> <p style="text-align: center; color: red; font-size: 2em;">2 > 8</p>			
<p>This teacher has a class that only contains girls.</p> <p style="text-align: center; color: red; font-size: 2em;">3 > 8</p>				<p>There are 10 girls in this teachers Year 9 class.</p> <p style="text-align: center; color: red; font-size: 2em;">1</p>				<p>In total, there are more boys than girls in these classes.</p> <p style="text-align: center; color: red; font-size: 2em;">1 and 3</p>			

Spicy/ Red Hot - Complete these tables

JustMaths

TABLE A

Students studying a Science				
	Chemistry	Biology	Physics	Total
Boys	18	15	14	47
Girls	8	6	19	33
Total	26	21	33	80

TABLE B

Students studying a Language				
	German	French	Polish	Total
Girls	2	23	9	26
Boys	15	2	18	60
Total	17	25	18	60

TABLE C

Students studying a D&T subject				
	Art	Food	Textiles	Total
Boys	11	6	15	32
Girls	22	18	28	68
Total	33	24	43	100





TABLE D

Students studying an "English" subject				
	Language	Literature	Media	Total
Girls	22	78	20	120
Boys	38	58	22	118
Total	60	136	42	238

TABLE E

Students studying Maths				
	Applied Maths	Statistics	More maths	Total
Girls	20	75	20	115
Boys	100	39	28	167
Total	120	114	48	282

Now solve these problems

<p>How many mistakes?</p> <p>Four teachers have completed some two-way tables. One of the teachers has made 4 errors, one has made no errors and two have made 1 error. Can you work out the number of errors made by each teacher?</p>	
 <p>The ICT teacher said</p> <ul style="list-style-type: none"> - The number of boys who study Textiles is larger than the number of boys who study Physics (15/14) - More boys study English Language than girls who study Art (38/22) - The number of boys who study Food is the same as the number of girls who study Biology. (6/6) - More boys study Polish than boys study Food (9/6) 	 <p>The music teacher said:</p> <ul style="list-style-type: none"> - More girls take a D&T subject than a Science subject (68/33) - The number of students studying French is 2 more than the number studying Food (25/24) - More boys study English literature than "More maths" (58/22) - The number of boys studying "More maths" and girls studying Textiles is the same (28/28)
 <p>The Art teacher said</p> <ul style="list-style-type: none"> - More girls study a D&T subject than boys study an English subject (68/118) - 3 more girls study a maths subject than boys who study an English subject (115/118) - There are 2 more students doing Applied maths than girls studying Art (22/20) - The most popular subject is German 	 <p>The English teacher said</p> <ul style="list-style-type: none"> - The most popular individual subject is English Literature - The total for food <i>and</i> textiles is more than twice the total for Art (67/66) - More boys study Applied maths than all the students studying D&T subjects (100/100) - 43 more students study English Language than German. (60/17)