17 April

Probability

Pg 152 15.3

1a) (4,4) = $\frac{1}{36}$

b) (1 4) (2 4) (3 4) (4,4) (5,4) (6,4)
(4 1) (4 2) (4 3) (4,5) (4,6)

36 − 11 = 25 $\frac{25}{36}$

c) $\frac{10}{36}$

2a) (1,1) = 2

b) (6,6) = 12

c) (2,1)
(1,2) = $\frac{2}{11}$

2, 3, 4, 5, 6, 7
8, 9, 10, 11, 12

3a) 7 b) 2 and 12 c) $\frac{1}{36}$

d) $\frac{6}{36}$ e) $\frac{15}{36}$ f) $\frac{18}{36}$ g) $\frac{15}{36}$

	1	2	3	4	5	6
1	2	3	4	5	6	7
2	3	4	5	6	7	8
3	4	5	6	7	8	9
4	5	6	7	8	9	10
5	6	7	8	9	10	11
6	7	8	9	10	11	12

18 April

Experimental and Theoretical Probabilities

1a) $\frac{6}{10} = 0.6$

b) Not enough coin spins

c) 6 + 3 = 9 $\frac{9}{20}$

d) 9 + 9 = 18 $\frac{18}{50}$

e) 18 + 19 = 37 $\frac{37}{100}$

f) Probability with most spins.

2a) 1+1+1+1 = 4

b) 6+6+6+6 = 24

c)	$\frac{7}{25}$	$\frac{16}{50}$	$\frac{42}{100}$	$\frac{68}{150}$	$\frac{88}{200}$
d)	$\frac{11}{25}$	$\frac{24}{50}$	$\frac{45}{100}$	$\frac{76}{150}$	$\frac{94}{200}$

e) Mia's results are higher for every single set.

f) 88 + 94 = 182 $\frac{182}{400}$

20 April 2023
Percentages

100% = the whole number

50% = half (÷2)

25% = quarter (÷4)

75% = three quarters (÷4 then x 3)

10% = ÷ 10

1 % = ÷ 100

5% = Find 10% then halve it (÷ 10 then ÷ 2)

10% of 62

÷10 $\quad$ 62. = 6.2

50% of 286

÷2 $\quad \boxed{143}$

25% of 264

$\boxed{\div 4} \quad$ 66

1% of 822.

$\boxed{\div 100} \quad$ 8.22

75% of 80

$\div 4 \quad = \quad 20$

$\times 3 \quad = \quad \underline{\underline{60}}$

5% of 75

$10\% \quad = \quad 7.5$

$\div 2$

$$\begin{array}{r} 3.75 \\ 2\overline{)\,7.{}^{1}5{}^{1}0} \end{array}$$

10% of 100 = 10

100% of 10 = 10

25% of 10

10% of 25 = 2.5

5% of 32

$$\boxed{\frac{5}{100} \times \frac{32}{1}} = \frac{160}{100}$$

$= 1.6$

Decimal Method

5% of 32

0.05×32

$5 \times 32 = 1.60$

21 April

Percentages

Eg.

$3\% \text{ of } 55$

$$\begin{array}{lcr} 1\% & = & \overset{1}{5}.5 \\ 1\% & = & 5.5 \\ 1\% & = & 5.5 \\ \hline & & 16.5 \end{array}$$

$$\begin{array}{r} 5.5 \\ \times \quad 3 \\ \hline 16.5 \\ \hline \end{array}$$

Eg 2.

$15\% \text{ of } 60$

$$\left.\begin{array}{lcr} 10\% & = & 6 \\ 5\% & = & 3 + \end{array}\right\} = \boxed{9}$$

Eg 3.

$30\% \text{ of } 23$

$$\begin{array}{lcr} 10\% & = & 2.3 \\ 10\% & = & 2.3 \\ 10\% & = & 2.3 \\ \hline & & 6.9 \end{array}$$