

Prime Numbers: The Prime Number Code

Basic

1) On the grid below:

Colour 1.

Colour all the multiples of 2 that are greater than 2.

Colour all the multiples of 3 that are greater than 3.

Colour all the multiples of 5 that are greater than 5.

Colour all the multiples of 7 that are greater than 7.

1	2	3	4	5	6	7	8	9	10
11	12	13	14	15	16	17	18	19	20
21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100

- Why do you not need to colour in all the multiples of 4?
- Why do you not need to colour in all the multiples of 6?
- Why do you not need to colour in all the multiples of 8?
- Why do you not need to colour in all the multiples of 9?
- Why do you not need to colour in all the multiples of 10?

Core

1) On the grid below:

Colour 1.

Colour all the multiples of 2 that are greater than 2.

Colour all the multiples of 3 that are greater than 3.

Colour all the multiples of 5 that are greater than 5.

Colour all the multiples of 7 that are greater than 7.

1	2	3	4	5	6	7	8	9	10
11	12	13	14	15	16	17	18	19	20
21	22	23	24	25	26	27	28	29	30
31	32	33	34	35	36	37	38	39	40
41	42	43	44	45	46	47	48	49	50
51	52	53	54	55	56	57	58	59	60
61	62	63	64	65	66	67	68	69	70
71	72	73	74	75	76	77	78	79	80
81	82	83	84	85	86	87	88	89	90
91	92	93	94	95	96	97	98	99	100

- a) Why do you not need to colour in all the multiples of 4?
- b) Why do you not need to colour in all the multiples of 6?
- c) Why do you not need to colour in all the multiples of 8?
- d) Why do you not need to colour in all the multiples of 9?
- e) Why do you not need to colour in all the multiples of 10?

2) Using factor trees, express each of these numbers as a product of primes:

a) 18

b) 81

c) 50

d) 72

e) 49

f) 100

g) 52

h) 600

