Divisibility Tests

- A number is divisible by 2 if its last digit is even (0,2,4,6 or 8)
- A number is divisible by 3 if the sum of its digits is divisible by 3.
- A number is divisible by 4 if the number's last two digits are divisible by 4.
- A number is divisible by 5 if its last digit is a 0 or 5.
- A number is divisible by 6 if it is divisible by 2 and 3 (see rules above).
- A number is divisible by 7 if 5 times the last digit added to the number made from the other digits is divisible by 7.
- A number is divisible by 8 if the last three digits form a number that is divisible 8.
- A number is divisible by 9 if the sum of the digits is divisible by 9.
- A number is divisible by 10 if its last digit is 0.
- A number is divisible by 11 if the alternating sum of its digits is divisible by 11. Alternating sum means a-b+c-d+... – m
- A number is divisible by 12 if it is divisible by 3 and 4.

Put ticks or crosses to show whether numbers below are divisible by numbers to the right.	2	3	4	5	6	8	9
12							
24							
31							
52							
68							
100							
155							
200							
250							
301							
368							
725							
2456							
7281							
284657							
123123							

Answers	2	3	4	5	6	8	9
12	✓	✓	✓	×	✓	×	×
24	✓	✓	✓	×	✓	✓	×
31*	×	×	×	×	×	×	×
52	✓	×	✓	×	×	×	×
68	✓	×	✓	×	×	×	×
100	✓	×	✓	✓	×	×	×
155	×	×	×	✓	×	×	×
200	✓	×	✓	✓	×	✓	×
250	✓	×	×	✓	×	×	×
301**	×	×	×	×	×	×	×
368	✓	×	✓	×	×	✓	×
725	×	×	×	✓	×	×	×
2456	✓	×	✓	×	×	✓	×
7281	×	✓	×	×	×	×	✓
284657	×	×	×	×	×	×	×
123123	×	✓	×	×	×	×	×

*31 is a prime number.

**301 look as though it might be a prime number but is composite (7 × 43)