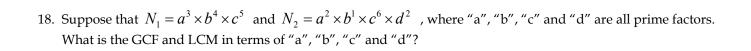
Name:	Math 8 H	onours HW Losson 6	S Primo Factors I CN	Date:			
1. What does it	Math 8 Honours HW Lesson 6 Prime, Factors, LCM, and GCF  What does it mean that two values are relatively prime? Explain?						
2. If the GCF of	"a" and "b" is one of	the values "a" or "b'	, then what is the re	lationship between "	a" and 'b'?		
3. IF the LCM of "a" and "b" is one of the values "a" or "b", then what is the relationship between "a" and 'b'?							
4. Circle all the 3	prime numbers belov 29	v. If it's not a prime i 39	number, give one of : 43	its factors other than	1:   61		
23							
71	93	79	101	109	113		
117	119	137	147	157	169		
5. Given each se	t of numbers below,	find the greatest com	mon factor (GCF) ar	nd lowest common m	ultiple (LCM):		
a) \langle 15, 24 \rangle		b) \(\langle 18, 12 \rangle		c) \langle 16,8 \rangle			

a) $\langle 15, 24 \rangle$		b) (18,12)		$ c\rangle\langle16,8\rangle$	
CCE	LCM	CCE	LCM	CCE	LCM
GCF: d) $\langle 35,14 \rangle$	LCM:	GCF: e) \langle 65,91 \rangle	LCM:	GCF:	LCM:
a)(33,14)		e) (03, 91)		f) $\langle 195, 221 \rangle$	
GCF:	LCM:	GCF:	LCM:	GCF:	LCM:

6. How many prime numbers are there less than 100? (list them out)				
7. Is "1" a prime number? Explain:				
O Charlest and of the following:	ata zana ana anima anumahana /Ulaa tha Dain	and Name have TECT). If the growth are in		
NOT a prime, state of it's prime				
a) 117	b) 167	c) 279		
4) 012	a) 402	f) 891		
d) 913	e) 493	1) 891		
g) 1003	h) 451	i) 717		
	,	,		
j) 637	k) 217	L)323		
9. Suppose "A" and "B" are integ and "y"?	ers with a GCF of "x" and a product of "y	y". What is the LCM in terms of "x"		
10. Carrage 1217 and 2020 have a	CCE at 100 Milestic that CM2			
10. Suppose 1316 and 2820 have a	GCF of 166. What is the LCM?			
11. What is the smallest number w	ith four factors?			
11. What is the smallest number w	initour inclois:			

	12. Find a number between 1 to 100 that has 5 factors?
	13. Why do perfect squares have an "odd" number of factors? Explain:
14.	What number less than 100 has the greatest number of factors?
15.	In the multiplication shown below, each letter represents a different digit. What digit does the letter "C" represent? $ \frac{ABCDE}{EDADE} $
16.	Find the smallest two-digit number that is twice the product of its digits
	17. What is the product of the LCM and GCF of two distinct numbers "a" and "b"?



19. If two numbers "a" and "b" have a GCF of 36 and a LCM of 1440, then what are the possibilities of "a" and "b" if a > b?

20. Challenge: Given that a, b, c, d, e, f, g, h, and i all represent a different digit from 1 to 9. If  $\frac{ab}{cde} + \frac{fg}{hi} = 7$ , then what numbers do each letter represent?