

BRONX COMMUNITY COLLEGE
of The City University of New York

DEPARTMENT OF MATHEMATICS and COMPUTER SCIENCE

MATH 04

Test 1

(Sample)

1. prime factor 144
2. find the GCF (Greatest Common Factor) for set of expressions:
 $4x^5y^7, 6x^4y^3, 7x^3y^8$

Factor each expression completely, if possible:

3. $-14x^8y^9 + 42x^5y^4 - 28xy^3$
4. $4a(a - 3b) + 5(a - 3b)$
5. $10xy - 15y + 8 - 12$
6. $4a^2b^2 - 9$
7. $15a^2 + 1$
8. $x^2 - 11x + 18$
9. $3n^2 + 14n - 5$
10. $8x^3y^2 + 4x^2y^3 - 12xy^4$

Solve each equation:

11. $y^2 - 49 = 0$
12. $3a^2 = 2a + 5$
13. One number is three times another number. The sum of their squares is 40.
Find the numbers.
14. The width of a rectangle is 4 yards less than its length. The area is 17 more than its perimeter.
Find the length and the width.