

MA 15200 Exam 1, Fall 2008 – Answers

1) $\{-\frac{3}{4}, 2.85, -3, 0.3636\dots, 0\}$

2) $x < -2$ or $x \geq 3$

3) $\frac{16a^8}{b^{22}}$

4) 9.0×10^{-5}

5) $27^{\frac{1}{3}} = 9$

6) $42\sqrt{2}$

7) I and III

8) The solution is between 2 and 5. ($r = 3$)

9) $(a^2 + 9)(a - 2)(a + 2) = a^4 + 5a^2 - 36$

10) $\frac{3(3 + \sqrt{5})}{2}$

11) $\frac{2x + 1}{2(x + 2)(x + 5)}$

12) $p = -\frac{1}{5}$

13) $\frac{m + n}{2}$

14) $4m(3m + 2n)(3m - 2n)$

15) $0.045x + 0.0525(5500 - x) = 266.25$