

Section 2.5 – Union and Intersection

Problem Set 1

Find the union and intersection of the following sets.

1. $\{3, 5, 12, 13\}$ and $\{3, 4, 5, 6\}$
2. $\{-11, -4, -2, 4\}$ and $\{11, 25, -2, 3, 4\}$
3. $\{6, 12, -10, -4, 17\}$ and $\{3, 5, 7, 8, 10\}$ and $\{3, 4, 5\}$
4. $\{-10, -2, 2, 7, 12\}$ and $\{-21, -1, 1, 11, 21\}$
5. $\{a, b, x, y, z\}$ and $\{a, b, m, n, x\}$
6. $\{2, 4, 6, 8, \dots\}$ and $\{0, 2, 4, 6, 8, \dots\}$
7. {the natural numbers greater than 1} and {the integers less than 5}
8. {the real numbers greater than -2} and {the whole numbers between -11 and 3}
9. {the even integers} and {the positive natural numbers}
10. $\{e, f, g, h, i, j\}$ and {all English vowels}
11. {states that border Canada} and {states that border Mexico}
12. {mammals} and {animals that live in the ocean}
13. {power tools} and {hand tools}
14. {English vowels} and {the last ten letters of the English alphabet}