EduSahara™ Worksheet

Name : Chapter Based Worksheet

Chapter : Venn Diagrams

Grade : ICSE Grade VIII

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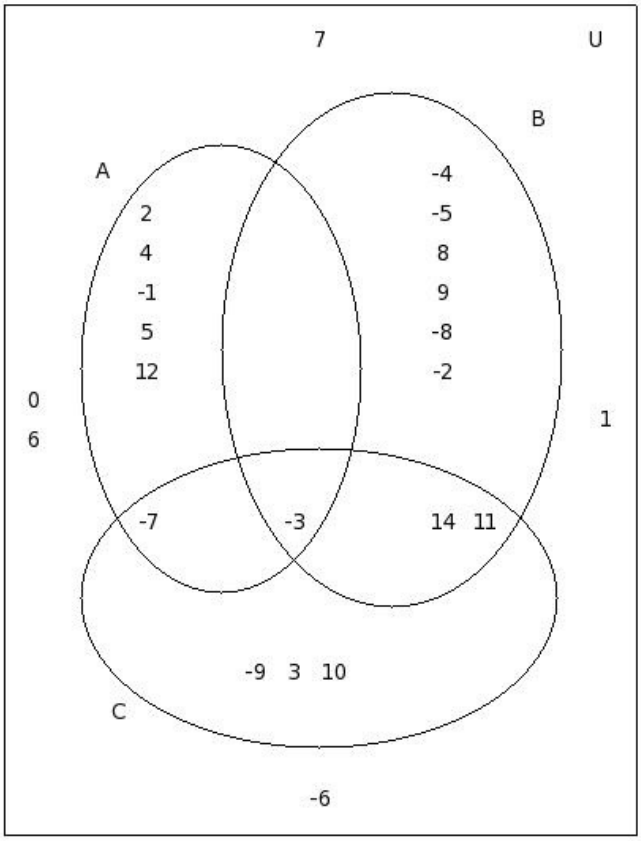
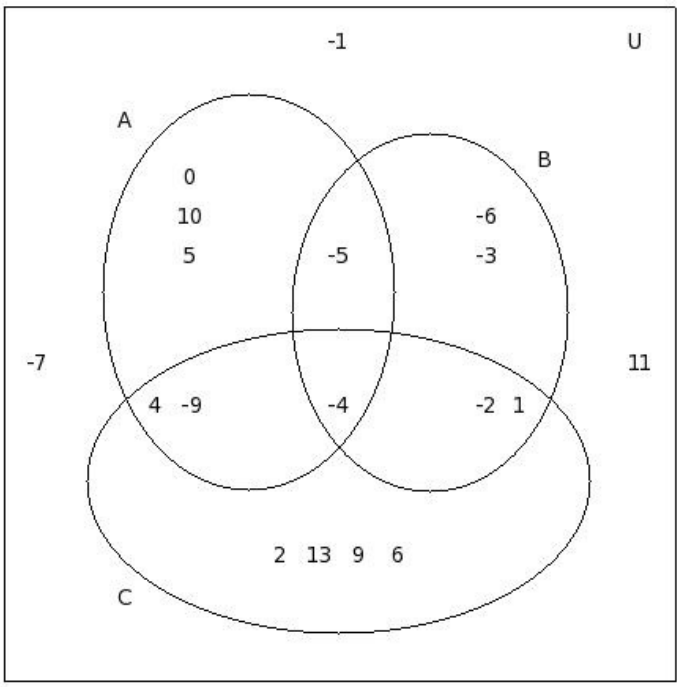
1. Find C



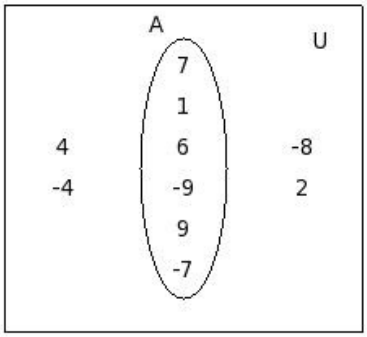
(i) {10,14,-3,3,-9,11,-7} (ii) {10,14,-3,3,11,-7} (iii) {10,14,-3,3,-9,11,-7,-1} (iv) {10,14,-3,3,11,-7,-1} (v) {10,14,-3,3,11,-7,8}

2. Find n((C − A) ∩ (C − B))



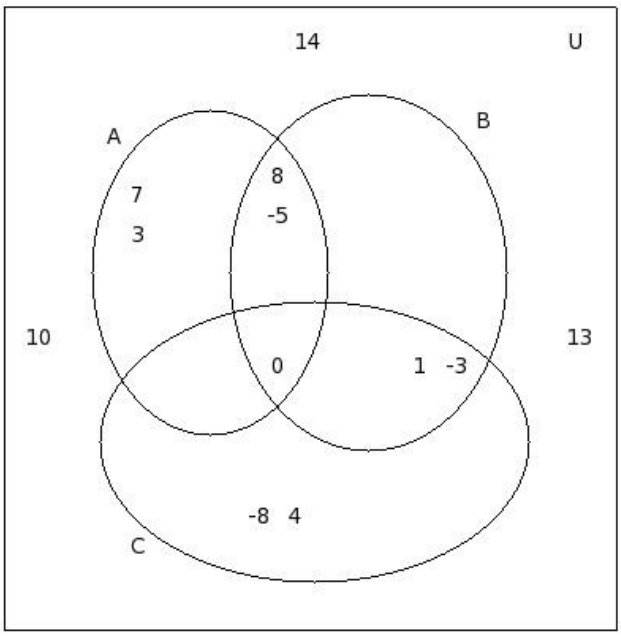
(i) 3 (ii) 6 (iii) 4 (iv) 2 (v) 5

3. Find n(A ∩ A')



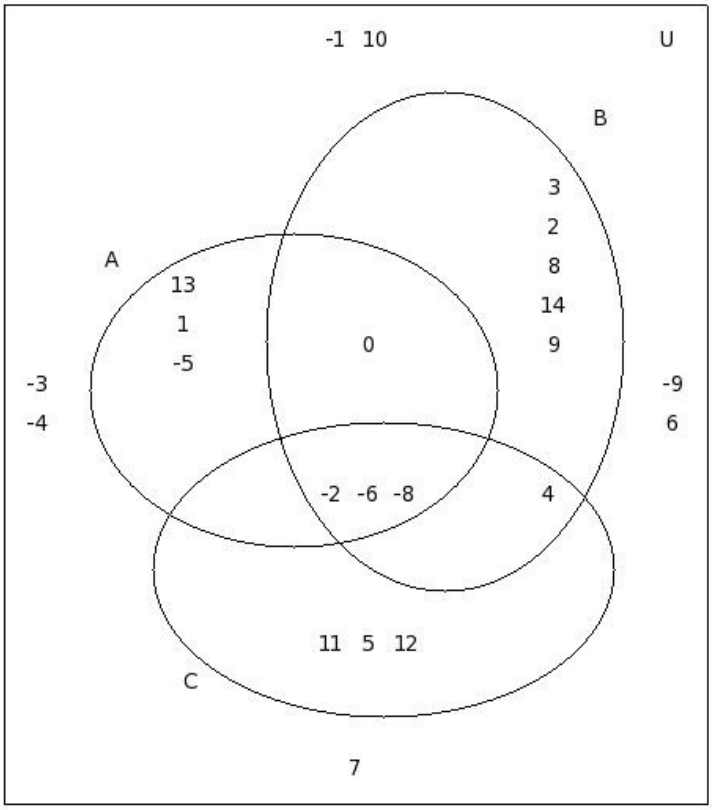
(i) (-1) (ii) 2 (iii) 1 (iv) 0 (v) (-3)

4. (B ∩ C) ∩ A=



(i) {0} (ii) {5,0} (iii) {0,3} (iv) {0,13} (v) {0,4}

5. Find B'

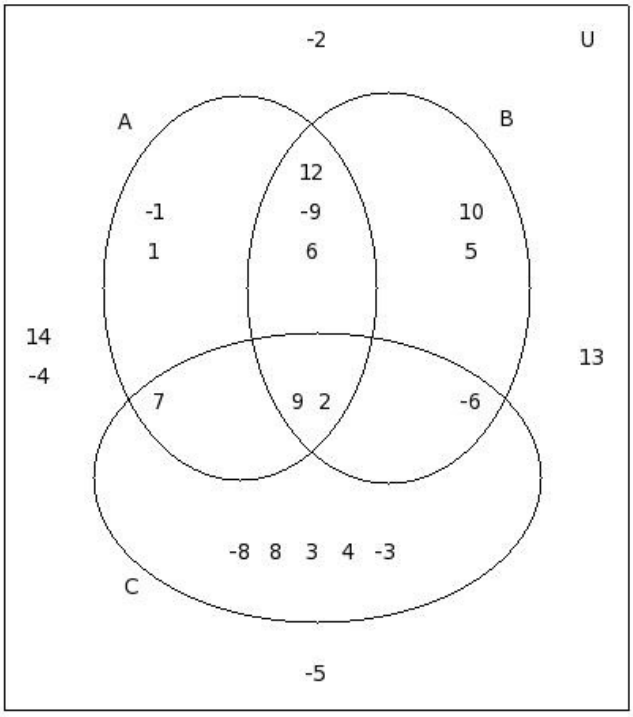


(i) {-9,-4,10,1,-1,-5,11,12,7,5,13,6,-3,2} (ii) {-9,-4,10,1,-1,-5,12,7,5,13,6,-3,2}

(iii) {-9,-4,10,1,-1,-5,11,12,7,5,13,6} (iv) {-9,-4,10,1,-1,-5,11,12,7,5,13,6,-3}

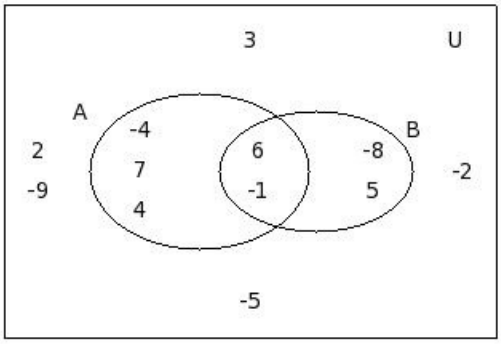
(v) {-9,-4,10,1,-1,11,12,7,5,13,6,-3,9}

6. Find n(C − (A ∩ (B ∩ C)))



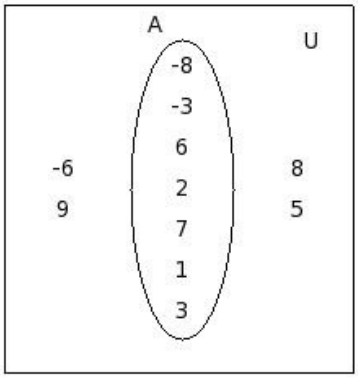
(i) 7 (ii) 8 (iii) 10 (iv) 4 (v) 6

7. Find n(A ∪ B)



(i) 10 (ii) 5 (iii) 8 (iv) 7 (v) 6

8. Find n(A)



(i) 7 (ii) 9 (iii) 6 (iv) 5 (v) 8

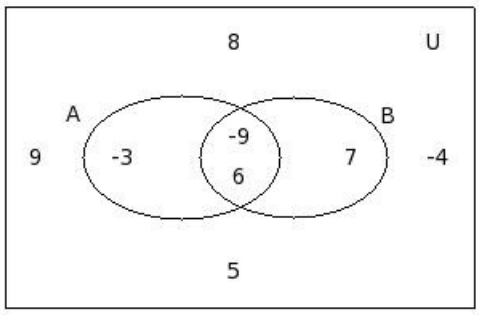
9. In a class of 32 students, 21 students prefer 'By Foot', 22 students prefer 'Bicycle', 8 students prefer 'Scooter', 17 students prefer 'By Foot' and 'Bicycle', 6 students prefer 'Bicycle' and 'Scooter', 5 students prefer 'Scooter' and 'By Foot', 5 students prefer all the three modes of transport. How many of them prefer only 'Bicycle'?

(i) 5 (ii) 4 (iii) 7 (iv) 2 (v) 3

10. In a class of 12 students, each one likes either 'Listening music' or 'Dancing' or both. If 9 students like 'Listening music' and 7 students like 'Dancing', how many like 'Dancing' only?

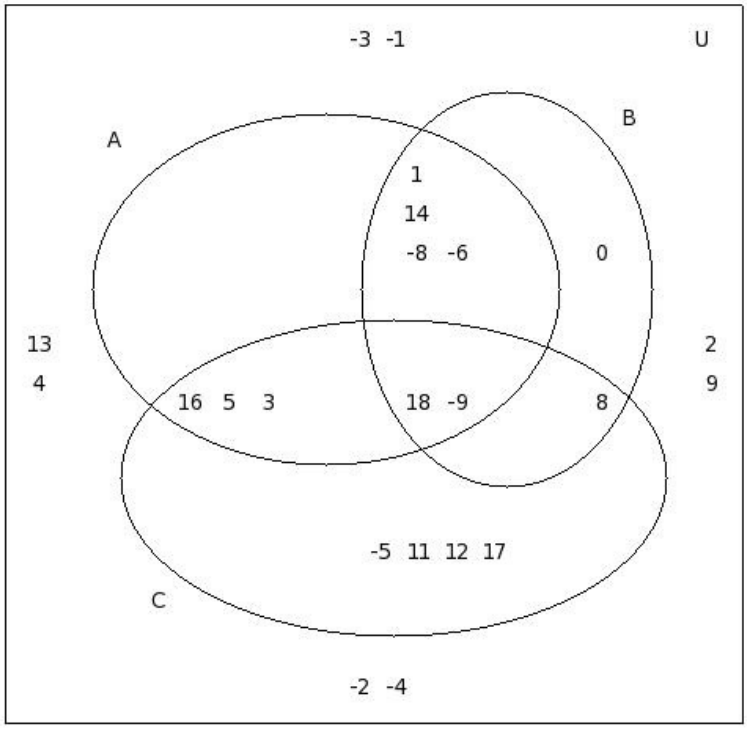
(i) 6 (ii) 4 (iii) 1 (iv) 3 (v) 2

11. Find n(B')



(i) 6 (ii) 4 (iii) 5 (iv) 8 (v) 3

12. Find B ∪ C



(i) {14,5,12,8,-5,0,11,-6,16,-8,1,-9,18,17} (ii) {14,5,12,8,-5,0,11,-6,16,-8,3,1,-9,18,17,-2}

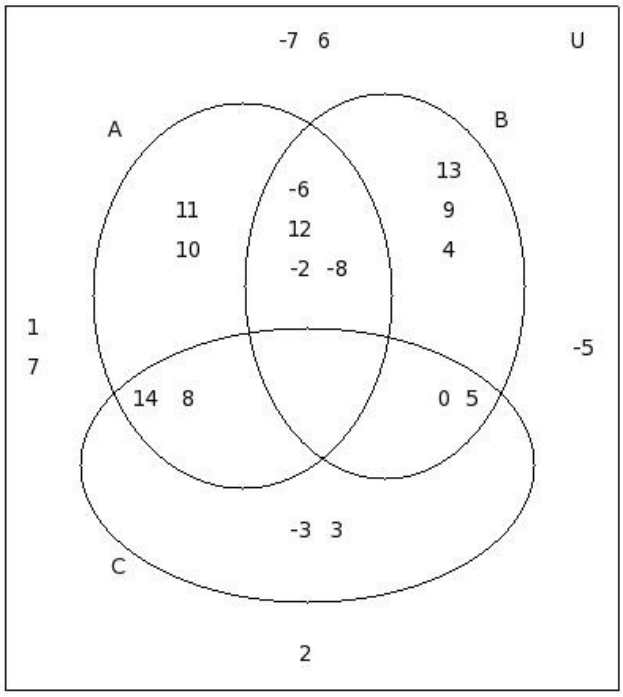
(iii) {14,5,12,8,-5,0,11,-6,16,-8,3,1,-9,17,-4} (iv) {14,12,8,-5,0,11,-6,16,-8,3,1,-9,18,17,-2}

(v) {14,5,12,8,-5,0,11,-6,16,-8,3,1,-9,18,17}

13. In a class of 34 students, 8 students like 'kabaddi', 29 students like 'wrestling', 12 students like 'volleyball', 8 students like 'kabaddi' and 'wrestling', 10 students like 'wrestling' and 'volleyball', 3 students like 'volleyball' and 'kabaddi', 3 students like all the three games. How many of them like only 'wrestling'?

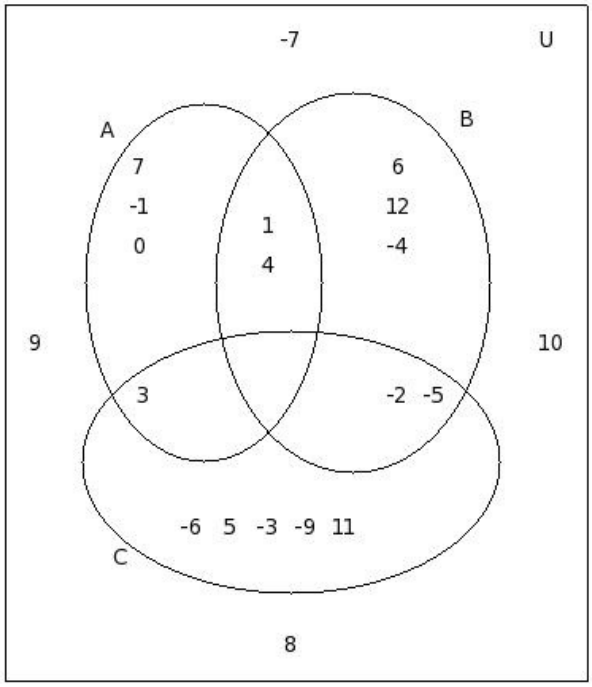
(i) 12 (ii) 14 (iii) 15 (iv) 17 (v) 13

14. Find n((B ∩ C)')



(i) 21 (ii) 19 (iii) 18 (iv) 20 (v) 16

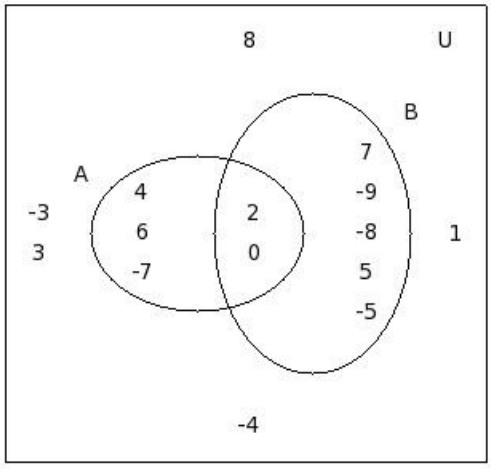
15. Find B



(i) {4,-2,1,12,6,-5} (ii) {4,-2,1,12,6,-4,-5,8} (iii) {4,-2,1,12,6,-4,-5} (iv) {4,-2,1,12,6,-4,5}

(v) {4,-2,1,12,6,-5,8}

16. Find n(A' ∪ B')

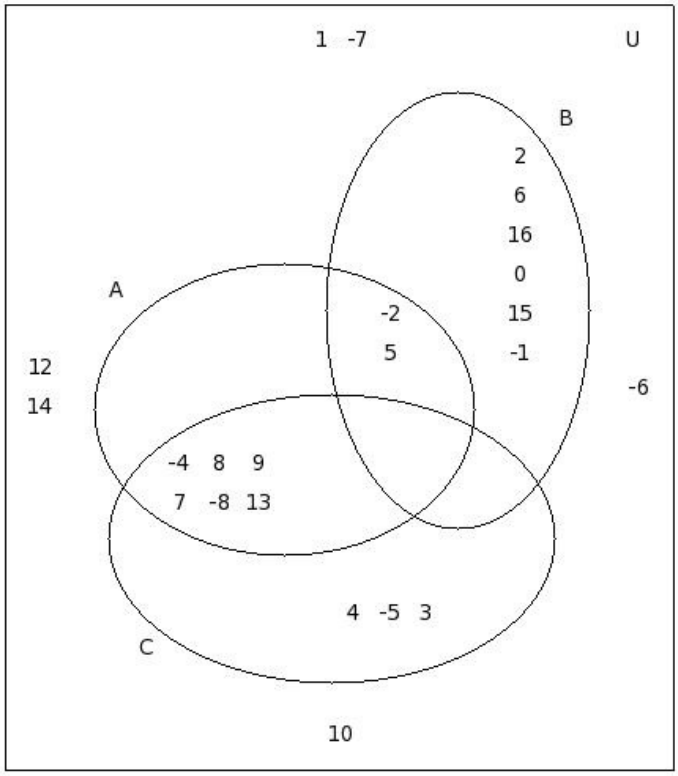


(i) 10 (ii) 15 (iii) 14 (iv) 13 (v) 12

17. In a class of 35 students, 19 students in 'Sanskrit', 17 students in 'Science', 22 students in 'Social Studies', 8 students in 'Sanskrit' and 'Science', 9 students in 'Science' and 'Social Studies', 14 students in 'Social Studies' and 'Sanskrit', 5 students in all the three subjects could get first class marks. How many of them got first class marks in more than one subject?

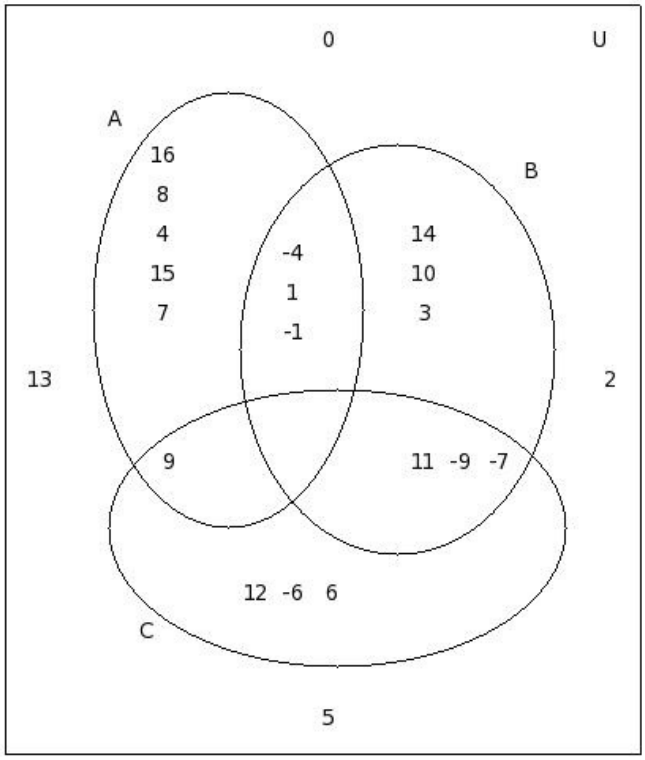
(i) 21 (ii) 19 (iii) 22 (iv) 20 (v) 23

18. Find (B ∩ C) ∪ (B ∩ A)



(i) {-2,5} (ii) {5,12} (iii) {-2,5,9} (iv) {-2} (v) {5,9}

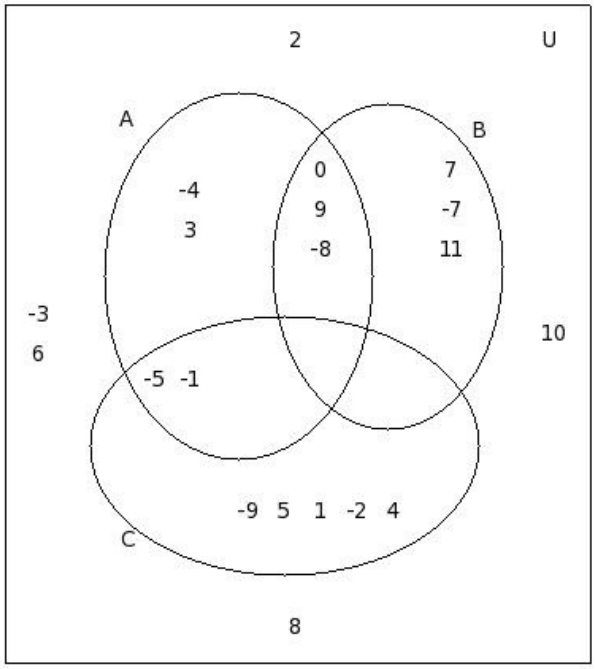
19. Find (B − (A ∩ (B ∩ C)))'



(i) {4,0,15,12,13,8,7,6,5,9,2,-6,11} (ii) {4,0,15,12,13,8,7,6,5,9,2,-6,16} (iii) {4,0,12,13,8,7,6,5,9,2,-6,16}

(iv) {4,0,15,12,13,8,7,6,5,9,-6,16,-4} (v) {4,0,15,12,13,8,7,6,5,9,2,-6,16,-4}

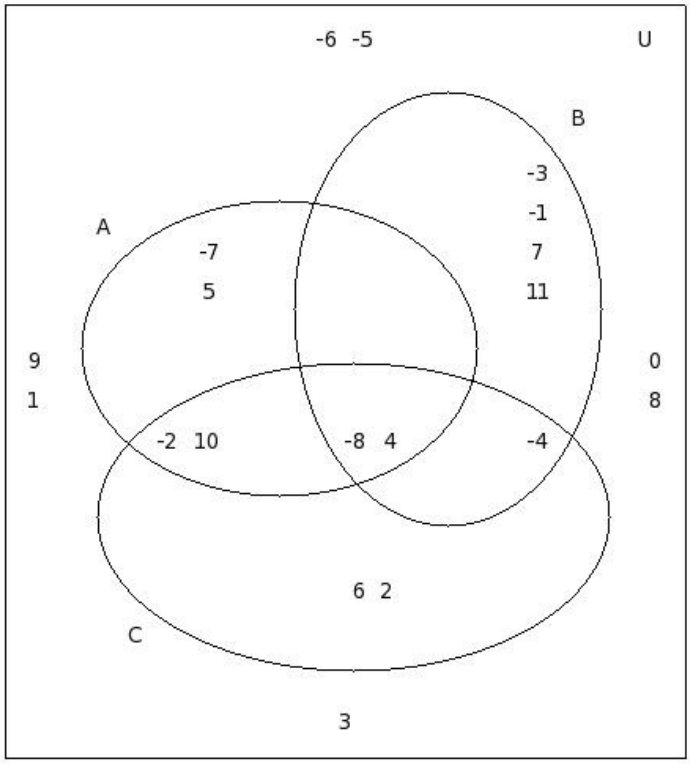
20. Find C − (A ∩ (B ∩ C))



(i) {1,4,-2,5,-9,-5,11} (ii) {1,4,5,-1,-9,-5} (iii) {1,4,-2,5,-1,-9,10} (iv) {1,4,-2,5,-1,-9,-5}

(v) {1,4,-2,5,-1,-9,-5,11}

21. Find n(A − (B ∩ C))

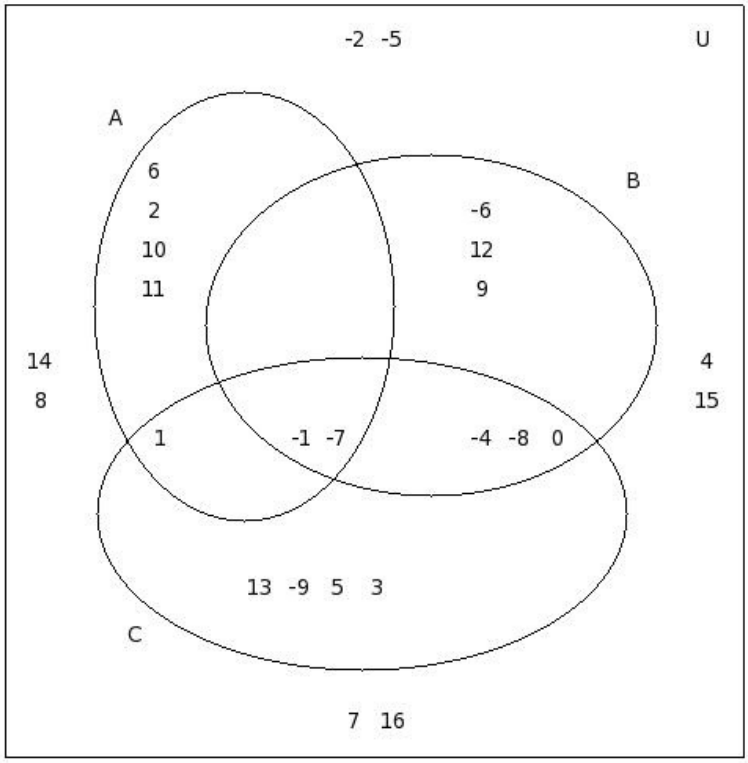


(i) 4 (ii) 1 (iii) 5 (iv) 6 (v) 3

22. In a class of 28 students, 6 students prefer 'Car', 11 students prefer 'Scooter', 21 students prefer 'RTC Bus', 3 students prefer 'Car' and 'Scooter', 6 students prefer 'Scooter' and 'RTC Bus', 4 students prefer 'RTC Bus' and 'Car', 1 students prefer all the three modes of transport. How many of them prefer only 'Car'?

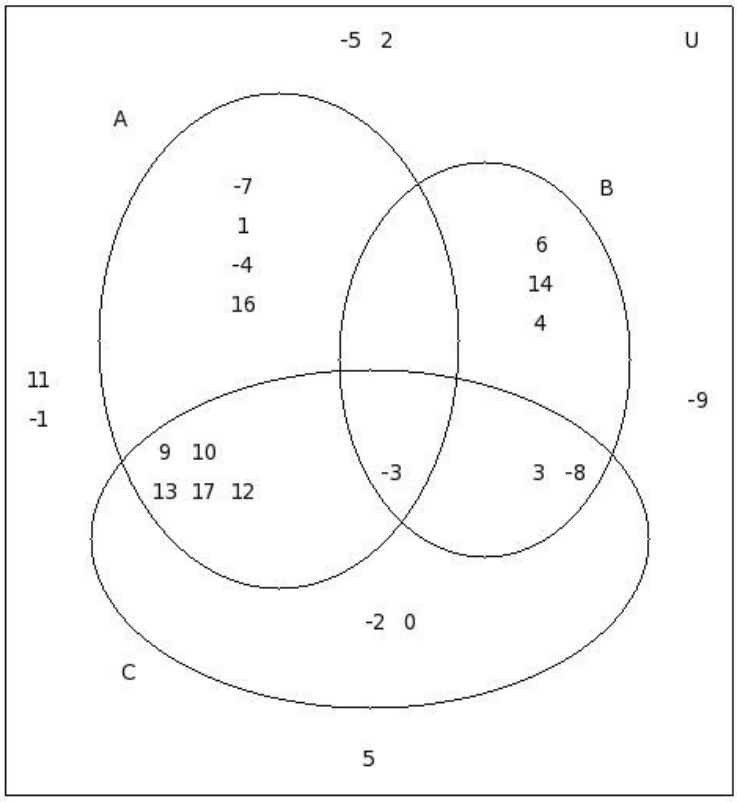
(i) (-1) (ii) 0 (iii) 2 (iv) (-3) (v) 1

23. Find (B − C) ∩ (B − A)



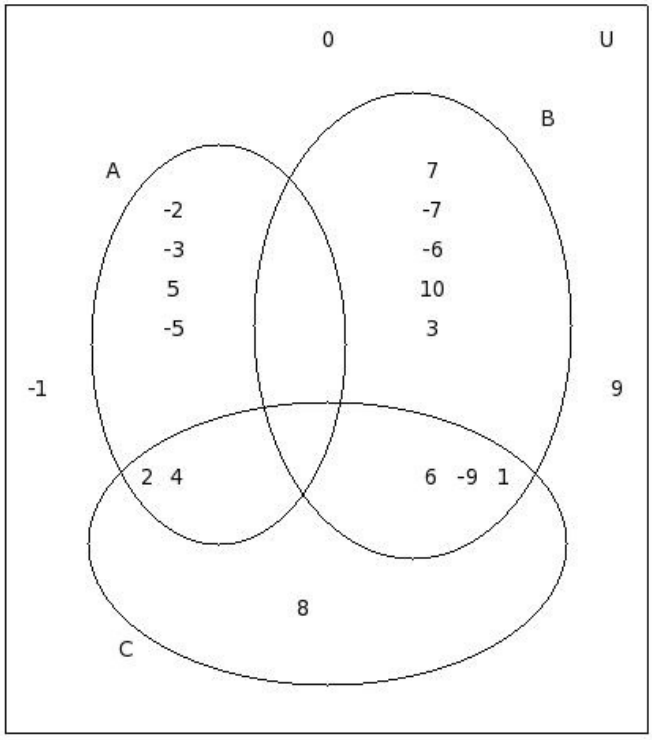
(i) {-6,12,9,-1} (ii) {-6,12,9} (iii) {-6,9,-1} (iv) {12,9,1} (v) {-6,9}

24. Find n((A ∩ B) ∩ C)



(i) (-2) (ii) 1 (iii) 4 (iv) 0 (v) 2

25. Find (C ∩ A) ∪ (C ∩ B)



(i) {6,-9,1,4,2} (ii) {6,-9,1,4,2,-5} (iii) {-9,1,4,2} (iv) {-9,1,4,2,-5} (v) {-9,1,4,2,-6}

Assignment Key

1) (i)	2) (iii)	3) (iv)	4) (i)	5) (iv)	6) (i)
7) (iv)	8) (i)	9) (ii)	10) (iv)	11) (iii)	12) (v)
13) (ii)	14) (ii)	15) (iii)	16) (iv)	17) (i)	18) (i)
19) (ii)	20) (iv)	21) (i)	22) (ii)	23) (ii)	24) (ii)
25) (i)					