
MATHCOUNTS®

2014
■ **State Competition** ■
Answer Key

The appropriate units (or their abbreviations) are provided in the answer blanks.

Note to coordinators: Answers to the Tiebreaker Round problems appear in the Tiebreaker Round Booklet.

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Sprint Round

1. 200

2. -7

3. $\frac{1}{16}$

4. $\frac{1}{3}$

5. 896

6. 5

7. 13 polygons

8. 343

9. 0 terms

10. $\frac{1}{3}$

11. 490 in²

12. $5\frac{1}{2}$ units²

13. 176

14. 264

15. 8

Sprint Round

16. $\frac{7}{27}$

17. $\frac{2}{9}$

18. 20 codes

19. 7 students

20. 33033 base 5

21. $\sqrt{5}$

22. 6 marbles

23. $8\sqrt{2}$ units

24. 10 digits

25. 504 cm²

26. 1806 ways

27. $\frac{7}{4}$

28. 1

29. 7 integers

30. $10\sqrt{3}$ units

Target Round

1. $\underline{\$ 89.99}$

3. $\underline{4050 \text{ ft}^2}$

5. $\underline{45}$

7. $\underline{\frac{9}{64}}$

2. $\underline{5 \text{ pounds}}$

4. $\underline{22}$

6. $\underline{\frac{1}{5}}$

8. $\underline{176 \text{ m}^2}$

Team Round

1. 14

2. $\frac{1}{4}$

3. $-\frac{1}{2}$

4. 25 cm

5. 8 integers

6. 82.5 miles

7. 8 solids

8. (4 , -2)

9. 51

10. $\frac{3}{4}$

Countdown Round

1. 5

2. 20 (even integers)

3. $\sqrt{3}$ (units²)

4. 16 (workers)

5. 20 (classes)

6. $\sqrt{3}$ (feet)

7. -1

8. 4029 (integers)

9. -3

10. 99

11. 12

12. -5

13. 4π (units²)

14. 198

15. 6 (values)

16. 7 (units)

17. 11 (digits)

18. 5 (packages)

19. 91 (combinations)

20. 288

21. 18 (units²)

22. 8 (minutes)

23. $2\sqrt{6}$

24. 15 (permutations)

25. 12 (meters)

26. 380 (in²)

27. $\frac{m}{m-1}$ or $\frac{-m}{1-m}$

28. 8192

29. 75

30. 1996

31. 720

32. 1

33. 5

34. 31

35. 441

36. 0

37. 4 (people)

38. 50

39. 5

40. 720 (ways)

Countdown Round

41. $\frac{y^4 z}{x}$

42. 14 (dollars)

43. 15

44. 14

45. 24 (students)

46. -10

47. 968

48. $\frac{12}{1}$

49. $\frac{1}{7}$

50. $\frac{11}{2}$

51. 216

52. 36 (degrees)

53. 84 (ways)

54. 9

55. 144 (reports)

56. 55

57. 15 (miles)

58. 22

59. 18 (units)

60. 3 (ways)

61. 22 (problems)

62. $\frac{-12}{21}$

63. $\frac{100}{100}$

64. 23

65. 45 (cents)

66. 6

67. 7

68. 1 (integers)

69. 7 (ordered pairs)

70. 41 (percent)

71. 15

72. $4\frac{8}{15}$ (miles)

73. 20

74. 5 (digits)

75. 53

76. 15 (units)

77. 720 (arrangements)

78. 32 (ways)

79. 2613 (votes)

80. $\frac{1}{2}$

