Answer keys: MK 2016, Level 6 (Grades 11-12)

1. **D** The sum of the ages ...
2. **C** The sum \(\frac{1}{10} + \frac{1}{100} ...
3. **B** Maria wants to build a ...
4. **A** How many whole numbers are ...
5. **A** A scatter diagram on the ...
6. **B** What is the minimum number ...
7. **C** Diana wants to write whole ...
8. **E** The rectangles \(S_1\) and \(S_2\) ...
9. **E** If \(x^2\) − 4x + ...
10. **E** The diagram shows a circle ...
11. **D** a, b, c, d are ...
12. **D** In this number pyramid each ...
13. **C** Which value does \(x_4\) take ...
14. **E** In rectangle *ABCD* the side ...
15. **B** Diana cuts a rectangle of ...
16. **B** The square shown in the ...
17. **B** On the island of knights ...
18. **A** Three three-digit numbers are built ...
19. **A** Each of the ten points ...
20. **C** Bettina chooses five points *A*, ...
21. **C** How many different real solutions ...
22. **E** A quadrilateral has an inner ...
23. **D** How many quadratic functions *y* ...
24. **E** In the right-angled triangle *ABC* ...
25. **B** The equations \(x^2\) + ax ...
26. **C** In a solid cube P ...
27. **B** A rectangular piece of paper ...
28. **A** Anna chooses a positive whole ...
29. **A** We consider a 5 × ...
30. **C** The positive whole number *N* ...

Useful links

1. Math Kangaroo resources: https://boo9.com/resources/math-kangaroo
2. Practice online (automated grading) @ https://boo9.com/practice
3. View these questions online @ click here
4. Video solution (all problems this set): [coming soon ...]
5. Playlist (all videos this level): click here