



1. $7\sqrt{9} \times 4\sqrt{9} =$

- (i) 255 (ii) 253 (iii) 250 (iv) 252 (v) 251

2. $(7\sqrt{8} - 3\sqrt{5}) \times (-\sqrt{4} - 6\sqrt{2}) =$

- (i) $(-28\sqrt{2} + 6\sqrt{5} - 168 + 18\sqrt{13})$ (ii) $(-28\sqrt{2} + 6\sqrt[4]{5} - 168 + 18\sqrt{10})$ (iii) $(-28\sqrt{-1} + 6\sqrt{5} - 168 + 18\sqrt{10})$
(iv) $(-28\sqrt{2} + 6\sqrt{5} - 167 + 18\sqrt{10})$ (v) $(-28\sqrt{2} + 6\sqrt{5} - 168 + 18\sqrt{10})$

3. $6\sqrt{2} \div (-8\sqrt{2}) =$

- (i) $(-\frac{1}{4})$ (ii) $(-\frac{5}{4})$ (iii) $(-\frac{3}{4})$ (iv) $(-\frac{3}{2})$ (v) $(-\frac{1}{2})$

4. $(-7\sqrt{6} + 2\sqrt{9}) \div (12 + \sqrt{3}) =$

- (i) $(-\frac{28}{47}\sqrt{6} + \frac{24}{47} + \frac{7}{141}\sqrt{18} - \frac{2}{47}\sqrt{5})$ (ii) $(-\frac{28}{47}\sqrt{4} + \frac{24}{47} + \frac{7}{141}\sqrt{18} - \frac{2}{47}\sqrt{3})$
(iii) $(-\frac{28}{47}\sqrt{6} + \frac{24}{47} + \frac{7}{141}\sqrt{18} - \frac{2}{47}\sqrt{3})$ (iv) $(-\frac{28}{47}\sqrt{6} + \frac{24}{49} + \frac{7}{141}\sqrt{18} - \frac{2}{47}\sqrt{3})$
(v) $(-\frac{28}{47}\sqrt{6} + \frac{24}{47} + \frac{7}{141}\sqrt[4]{18} - \frac{2}{47}\sqrt{3})$

5. $\sqrt[9]{9} \times \sqrt[9]{4} =$

- (i) $\sqrt[7]{36}$ (ii) $\sqrt[11]{36}$ (iii) $\sqrt[9]{39}$ (iv) $\sqrt[9]{33}$ (v) $\sqrt[9]{36}$

6. $\sqrt{6} \times 3\sqrt{2} =$

- (i) $\sqrt{108}$ (ii) $\sqrt{110}$ (iii) $\sqrt[4]{108}$ (iv) $\sqrt{106}$ (v) 108

$\frac{6}{\sqrt{2}}$

7. $\frac{6}{\sqrt{2}} =$

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

$$8. \frac{\sqrt[3]{6}}{5\sqrt{2}} =$$

- (i) $\sqrt[3]{\frac{1}{25}}$ (ii) $\sqrt[3]{\frac{3}{125}}$ (iii) $\sqrt[5]{\frac{3}{125}}$ (iv) $\frac{3}{125}$ (v) $\sqrt[3]{\frac{1}{125}}$

$$9. \frac{\sqrt[9]{18}}{\sqrt[9]{8}} =$$

- (i) $\sqrt[7]{\frac{9}{4}}$ (ii) $\sqrt[9]{\frac{11}{4}}$ (iii) $\sqrt[9]{\frac{9}{4}}$ (iv) $\sqrt[9]{\frac{7}{4}}$ (v) $\sqrt[11]{\frac{9}{4}}$

$$10. \frac{\sqrt{15}}{8\sqrt{9}} =$$

- (i) $\sqrt[4]{\frac{5}{192}}$ (ii) $\sqrt{\frac{1}{64}}$ (iii) $\frac{5}{192}$ (iv) $\sqrt{\frac{7}{192}}$ (v) $\sqrt{\frac{5}{192}}$

$$11. 3\sqrt{4} \times (-2\sqrt{8}) =$$

- (i) $(-24\sqrt[4]{2})$ (ii) $(-24\sqrt{5})$ (iii) (-48) (iv) $(-24\sqrt[4]{2})$ (v) $(-24\sqrt{2})$

$$12. (-2\sqrt{8} + 8\sqrt{4}) \times (8\sqrt{3} - \sqrt{7}) =$$

- (i) $(-32\sqrt{6} + 128\sqrt[4]{3} + 4\sqrt{14} - 16\sqrt{7})$ (ii) $(-32\sqrt{6} + 128\sqrt{3} + 4\sqrt{14} - 16\sqrt{7})$
 (iii) $(-32\sqrt{6} + 128\sqrt{3} + 4\sqrt[4]{14} - 16\sqrt{7})$ (iv) $(-32\sqrt{6} + 128\sqrt{3} + 4\sqrt{14} - 16\sqrt{10})$
 (v) $(-32\sqrt{4} + 128\sqrt{3} + 4\sqrt{14} - 16\sqrt{7})$

$$13. 6\sqrt{4} \div (-\sqrt{2}) =$$

- (i) $(-6\sqrt[4]{2})$ (ii) $(-6\sqrt[4]{2})$ (iii) $(-6\sqrt{2})$ (iv) (-12) (v) $(-6\sqrt{4})$

$$14. (-3\sqrt{5} + 2\sqrt{2}) \div (8\sqrt{4} - 2\sqrt{7}) =$$

- (i) $(-\frac{4}{19}\sqrt{2} + \frac{8}{57}\sqrt{2} - \frac{1}{38}\sqrt{35} + \frac{1}{57}\sqrt{14})$ (ii) $(-\frac{4}{19}\sqrt{5} + \frac{8}{57}\sqrt{2} - \frac{1}{38}\sqrt{35} + \frac{1}{57}\sqrt{14})$
 (iii) $(-\frac{4}{19}\sqrt{5} + \frac{8}{57}\sqrt[4]{2} - \frac{1}{38}\sqrt{35} + \frac{1}{57}\sqrt{14})$ (iv) $(-\frac{4}{19}\sqrt{5} + \frac{8}{57}\sqrt{2} - \frac{1}{38}\sqrt{35} + \frac{1}{57}\sqrt{17})$
 (v) $(-\frac{4}{19}\sqrt{5} + \frac{8}{57}\sqrt{2} - \frac{1}{38}\sqrt{35} + \frac{1}{57}\sqrt{14})$

15. $\sqrt[17]{9} \times \sqrt[17]{7} =$

- (i) $\sqrt[17]{66}$ (ii) $\sqrt[19]{63}$ (iii) $\sqrt[15]{63}$ (iv) $\sqrt[17]{63}$ (v) $\sqrt[17]{60}$

16. $2\sqrt{9} \times \sqrt{3} =$

- (i) $\sqrt{105}$ (ii) $\sqrt{108}$ (iii) $\sqrt{111}$ (iv) 108 (v) $\sqrt[4]{108}$

17. $\frac{4\sqrt{6}}{4\sqrt{5}} =$

- (i) $\sqrt[6]{5}$ (ii) $\sqrt[4]{5}$ (iii) $\sqrt[6]{5}$ (iv) $\sqrt[4]{5}$ (v) $\sqrt[4]{8}$

18. $\frac{9\sqrt{3}}{3\sqrt{9}} =$

- (i) $\sqrt[3]{12}$ (ii) 15 (iii) $\sqrt[5]{15}$ (iv) $\sqrt[3]{15}$ (v) $\sqrt[3]{18}$

19. $\frac{4\sqrt{16}}{4\sqrt{20}} =$

- (i) $\sqrt[4]{5}$ (ii) $\sqrt[4]{4}$ (iii) $\sqrt[4]{6}$ (iv) $\sqrt[6]{5}$ (v) $\sqrt[4]{5}$

20. $\frac{9\sqrt{2}}{5\sqrt{16}} =$

- (i) $\sqrt{\frac{83}{200}}$ (ii) $\sqrt[4]{\frac{81}{200}}$ (iii) $\frac{81}{200}$ (iv) $\sqrt{\frac{79}{200}}$ (v) $\sqrt{\frac{81}{200}}$

Assignment Key

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