

Exercise 16a

$$1. i) \frac{13}{20} \times 100 = 13 \times 5 = 65\%$$

$$ii) \frac{21}{30} \times 100 = 7 \times 10 = 70\%$$

$$2. i) \frac{3}{200} \times 100 = \frac{3}{2} = 1 \frac{1}{2} = 1.5\%$$

$$ii) \frac{5}{6} \times 100 = \frac{250}{3} = 83 \frac{1}{3}\%$$

$$iii) \frac{65}{80} \times 100 = \frac{65 \times 5}{4} = \frac{325}{4} = 81 \frac{1}{4}\% \text{ or } 81.25\%$$

$$iv) \frac{2}{3} \times 100 = \frac{200}{3} = 66 \frac{2}{3}\%$$

$$3. i) 0.10 = \frac{10}{100} \times 100 = 10\%$$

$$ii) 0.02 = \frac{2}{100} \times 100 = 2\%$$

$$iii) 0.7 = \frac{7}{10} \times 100 = 70\%$$

$$iv) 0.15 = \frac{15}{100} \times 100 = 15\%$$

$$v) 0.032 = \frac{32}{1000} \times 100 = 3.2\%$$

$$4. i) 8\% = \frac{8}{100} = \frac{2}{25}$$

$$ii) 20\% = \frac{20}{100} = \frac{1}{5}$$

$$iii) 85\% = \frac{85}{100} = \frac{17}{20}$$

$$iv) 250\% = \frac{250}{100} = \frac{10}{4} = \frac{5}{2} = 2 \frac{1}{2}$$

$$v) 12 \frac{1}{2}\% = \frac{25}{2}\% = \frac{25}{2 \times 100} = \frac{1}{8}$$

$$5 \cdot 1) 25\% = \frac{25}{100} = \frac{1}{4} = 0.25$$

$$ii) 108\% = \frac{108}{100} = \frac{54}{50} = 1.08$$

$$iii) 95\% = \frac{95}{100} = 0.95$$

$$iv) 4.5\% = \frac{45}{10 \times 100} = \frac{45}{1000} = 0.045$$

$$v) 29.2\% = \frac{29.2}{10 \times 100} = \frac{292}{1000} = 0.292$$

$$6 \cdot 1) 7 = 7 \times 100 = 700\%$$

$$ii) 2 = 2 \times 100 = 200\%$$

$$iii) 19.5 = \frac{19.5}{10} \times 100\% = 1950\%$$

$$iv) 5.37 = \frac{537}{100} \times 100\% = 537\%$$