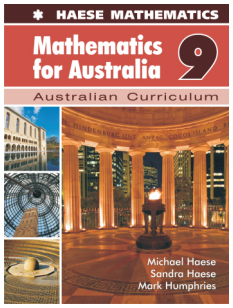


ERRATA

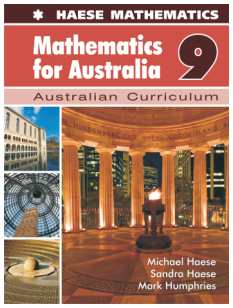
Mathematics for Australia 9

First edition - 2017 second reprint

The following erratum was made on 25/Jul/2017

page 471 **ANSWERS EXERCISE 10F.1,** Question **2** should have correct question labels:

2 **a** **i** **A** and **F** **ii** **B** and **D** **b** **E**



ERRATA

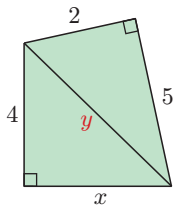
Mathematics for Australia 9

First edition - 2012 first print

The following errata were made on or before 24/May/2016

page 153 **CHAPTER 8 EXERCISE 6D,** Question **6 g** should have labelled unknown diagonal:

6 g



page 161 **CHAPTER 8 Section H CUBE ROOTS,** Explanation for finding the cube root of 27 should read:

To find the cube root of 27, we need to find the number which, when multiplied by itself twice, gives 27.

page 169 **CHAPTER 9 EXERCISE 9A,** Question **9** should clarify:

9 An office building has 12 floors above ground level. There are 18 steps between each floor, and each step is 17.8 cm high. How many metres does a worker climb if he walks up to the top floor?

page 209 **CHAPTER 10 EXERCISE 10E,** Question **6** should become **7** and have in its place:

6 Consider the line $y = 4 + x$.

a Find the y-coordinate of the point on the line with x-coordinate 0.

b Find the x-coordinate of the point on the line with y-coordinate 0.

c Hence state the axes intercepts of the line.

7 Find c given that:

a $(2, 9)$ lies on the line with equation $y = 4x + c$

b $(-3, 0)$ lies on the line with equation $y = 2x + c$

c $(-1, -8)$ lies on the line with equation $y = -3x + c$

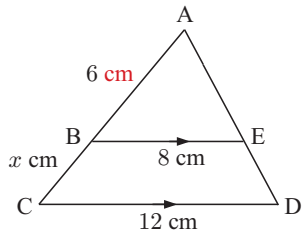
d $(6, -\frac{1}{2})$ lies on the line with equation $y = \frac{1}{2}x + c$.

CD **CHAPTER 14 PRACTICE TEST 14A,** Questions **8** and **9** should use the data:

Mark worked overtime every work day for 10 days. The number of minutes of overtime he worked each day were:

45 15 60 30 40 55 10 25 45 40

page 352 **CHAPTER 16 EXERCISE 16C.2,** Question **1 g** diagram should be:



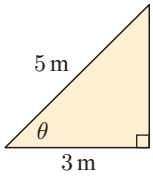
page 356 **CHAPTER 16 ACTIVITY Paper Folding,** Questions **8** should read:

8 Hence, determine the positions of X and Y on the vertical edges.
Compare your answers with your estimates in **4**.

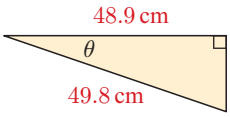
CD **CHAPTER 17 PRACTICE TEST 17A,** Question **4** diagram should be:

4 Which of the following is not a valid triangle?

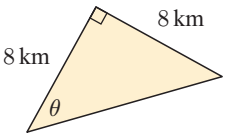
A



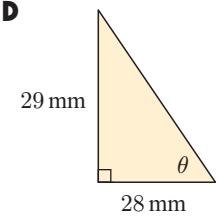
B



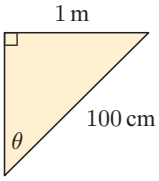
C



D



E



*The 1st edition set of triangles had 2 invalid triangles: **B** & **E**

page 440 **CHAPTER 21 EXERCISE 21A.2,** Question **4 d** should read:

4 **d** The point $F(n, 29)$ lies on $y = 2x^2 + 20x + 7$. Find n.

page 441 **CHAPTER 21 EXERCISE 21A.3,** Question **1 a** should read:

1 Suppose $y = x^2 + 2x + 3$. Find the value(s) of x for which:

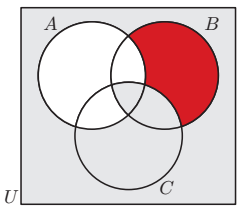
a $y = 3$ **b** $y = 2$ **c** $y = 18$

page 450 **CHAPTER 21 EXERCISE 21D,** Question **14** should read:

14 T is a mobile telephone tower in a remote country town. Its region of reception is defined by the inequality $(x-3)^2 + (y-2)^2 \leqslant 40$. David's car has broken down on the highway at grid reference $D(9, 5)$. Each grid unit is equivalent to 1 km.

page 462 **ANSWERS EXERCISE 4E.2,** Question **5 i** should also have shaded:

5 **i**



page 466 **ANSWERS REVIEW SET 6,** Question **7 c** should read:

7 **c** 1 hour

page 466 **ANSWERS EXERCISE 7A.1,** Question **2 g** should read:

2 **g** $x = \frac{17}{8}$

page 467 **ANSWERS EXERCISE 7B,** Questions **1 c** and **5 g** should read:

1 **a** $x = \frac{10}{9}$ **b** $x = 2$ **c** $x = -3$

5 **e** $x = -25$ **f** $x = \frac{4}{17}$

page 468 **ANSWERS EXERCISE 8D,** Question **6 g** should include y-value

6 **a** $x = \sqrt{5},\ y = \sqrt{6}$ **b** $x = 2,\ y = \sqrt{13}$
c $x = 5,\ y = \sqrt{26}$ **d** $x = 4,\ y = \sqrt{33}$
e $x = 2\sqrt{51}$ **f** $x = \sqrt{37}$ **g** $x = \sqrt{13},\ y = \sqrt{29}$
h $x = \sqrt{2},\ y = \sqrt{3},\ z = 2$ **i** $x = \sqrt{113}$

page 475 **ANSWERS EXERCISE 12B,** Questions **7 j** and **h** should be swapped:

7 **h** $(n-3)(24-7n)$
j $-2(x-14)(x+19)$

page 476 **ANSWERS EXERCISE 12F,** Question **2 h** should read:

2 **h** $d(d-3)(d-8)$

page 479 **ANSWERS EXERCISE 14D.1,** Question **13** should read:

13 **a** $M = \dfrac{30S + 31O + 30N}{91}$ **b** $\approx 26.5°\text{C}$

page 483 **ANSWERS EXERCISE 15C,** Question **7** should read:

7 Mavis ≈ 0.0402

page 483 **ANSWERS EXERCISE 15D,** Questions **1 c** and **d** should read:

1 **a** {BB, BG, GB, GG}

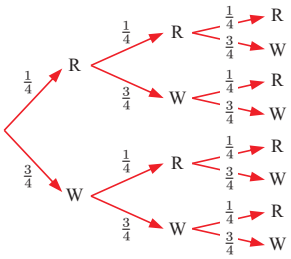
b {ABC, ACB, BAC, BCA, CAB, CBA}

c {HHHH, HHHT, HHTH, HTHH, THHH, HHTT, HTHT, THHT, HTTH, THTH, TTHH, HTTT, THTT, TTHT, TTTH, TTTT}

d {ABCD, ABDC, ACBD, ACDB, ADBC, ADCB, BACD, BADC, BCAD, BCDA, BDAC, BDCA, CABD, CADB, CBAD, CBDA, CDAB, CDBA, DABC, DACB, DBAC, DBCA, DCAB, DCBA}

page 485 **ANSWERS REVIEW SET 15,** Question **10 a** should read:

10 **a** 1st question 2nd question 3rd question



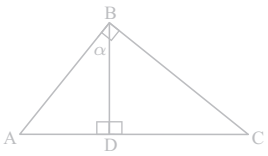
R = right answer
W = wrong answer

page 485 **ANSWERS PRACTICE TEST 15B,** Question **5 b** should read:

5 **a** ≈ 0.269 **b** ≈ 0.548

page 486 **ANSWERS EXERCISE 16C.1,** Question **2** should read:

2 $\triangle$ABD and $\triangle$ABC share angle A, and both have a right angle, $\therefore$ similar.
$\triangle$BCD and $\triangle$ABC share angle C, and both have a right angle, $\therefore$ similar.



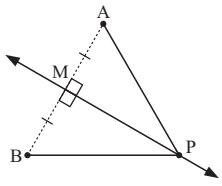
Let $\widehat{ABD}$ be α. $\therefore$ $\widehat{DBC} = 90 - \alpha$, and $\widehat{BAD} = 90 - \alpha$
$\therefore$ $\widehat{BAD} = \widehat{DBC}$ and $\widehat{ADB} = \widehat{BDC}$ so $\triangle$ABD and $\triangle$BCD are similar.

page 487 **ANSWERS EXERCISE 16G,** Questions **6 b** and **7** should read:

6 **a** BM = CN {given}, hypotenuse BC is common
$\therefore$ $\triangle$BCM $\cong$ $\triangle$CBN {RHS}

b From **a**, $\widehat{BCM} = \widehat{CBN}$
$\therefore$ $\widehat{BCA} = \widehat{CBA}$
$\therefore$ $\triangle$ABC is isosceles {equal base angles}

7 Let P be any point on the perpendicular bisector, and M be the midpoint of [AB].
In $\triangle$AMP and $\triangle$BMP, [MP] is common, $\widehat{AMP} = \widehat{BMP}$, and AM = BM {given}.
$\therefore$ $\triangle$AMP $\cong$ $\triangle$BMP {SAS}
$\therefore$ AP = BP {corresponding sides}



page 487 **ANSWERS PRACTICE TEST 16B,** Question **3** should read:

2 $x = 2.8$ **3** $\triangle$s QRS and TRP are similar, $x = 12$

page 492 **ANSWERS EXERCISE 19C.1,** Question **1 c**:

There should be no point marked at $(2, 42)$

page 494 **ANSWERS PRACTICE TEST 20C,** Question **5 c** should read:

5 **b** $x(x+2) = 2x^2 - 3$ **c** 3 and 5