

ADDITIONAL NUMERICAL REASONING MENTAL ARITHMETIC EXAMINATION

Calculator Not Permitted

Answers at the bottom of the paper

20 questions / 25 minutes

1) What is $20 \div 0.8 = ?$

- a) 25
- b) 18
- c) 4
- d) 0.4

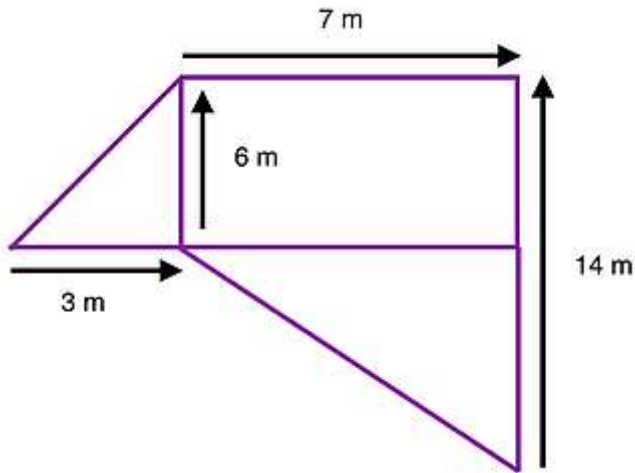
2) Calculate $179 \times 86 = ?$

- a) 15,284
- b) 15,394
- c) 15,356
- d) 15,424

3) If 5 apples cost 75p, how many can be bought for £2.70? (Assuming they can be bought singly).

- a) 16
- b) 22
- c) 18
- d) 20

4) Part of an aircraft's cargo hold consists of the following dimensions. Calculate the area of the wall in square meters.



- a) 87 meters squared
- b) 83 meters squared
- c) 85 meters squared
- d) 79 meters squared

5) A car left Cambridge at 07:18 and arrived at Gatwick, travelling a distance of 180 miles at 11:06 am. What was the average speed in miles per hour (pick the closest answer)?

- a) 43 mph
- b) 45 mph
- c) 49 mph
- d) 47 mph

6) A 737 flies 930 miles in 75 minutes. How many miles does it fly in 4 hours 45 minutes assuming as constant speed?

- a) 3534
- b) 3548
- c) 3368
- d) 3552

7) If you travel 1248 miles, how much fuel will you need if you burn 4500 kgs per hour and are travelling at 720 mph?

- a) 7800 kgs
- b) 6800 kgs
- c) 7200 kgs
- d) 7400 kgs

8) An airline is selling tickets for its A380 service. The airline sells 40% of the seats and still has 420 seats remaining. How many seats were being sold originally?

- a) 588
- b) 672
- c) 600
- d) 700

9) The average of 20 numbers is zero. Of them, at the most, how many may be greater than zero?

- a) 0
- b) 1
- c) 10
- d) 19

10) What is 65% of 380?

- a) 245
- b) 247
- c) 249
- d) 251

11) What is 7 cubed?

- a) 343
- b) 347
- c) 345
- d) 349

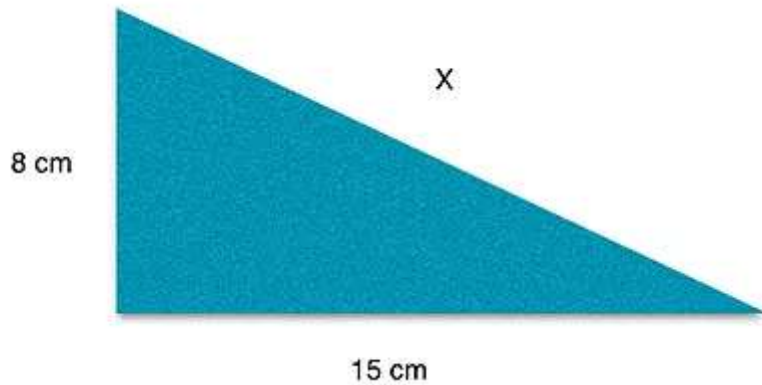
12) $X^2 = 289$ What is X?

- a) 13
- b) 19
- c) 17
- d) 15

13) A man exchanges 368 pounds for dollars at an exchange rate of 1 pound=1.72 dollars. How many dollars does he get in return? (answer to the nearest dollar)

- a) 626
- b) 633
- c) 619
- d) 623

14) What is the value of X?



- a) 14
- b) 17
- c) 19
- d) 13

15) If an aircraft was cruising at an altitude of 39,000 ft and descended to an altitude 11,000 ft in 20 minutes, what was its average rate of descent?

- a) 1250 fpm
- b) 1600 fpm
- c) 1650 fpm
- d) 1400 fpm

16) How many minutes is 2 days 17 hours and 46 minutes?

- a) 4246
- b) 3946
- c) 3928
- d) 3958

17) If it's 17:00 UTC and Dubai is UTC + 5 and 7 hours behind Sydney, what is the local time in Sydney?

- a) 03:00
- b) 15:00
- c) 04:00
- d) 05:00

18) If an aircraft departed an airfield and headed directly south for 16 miles and then turned onto a heading of 270 degrees for 12 minutes at an average speed of

80 miles per hour, how many miles is it (in a straight line) from its original destination?

- a) 16
- b) 23
- c) 18
- d) 26

19) How many nautical miles can an aircraft travel if it is carrying 2880 kgs of fuel and burns 240 kgs an hour averaging a speed of 375 knots?

- a) 4,250 NM
- b) 3,800 NM
- c) 4,450 NM
- d) 4,500 NM

20) Given that you had 25 minutes to answer 20 questions on this test paper, on average, how much time did you have per question?

- a) 1m 20s
- b) 1m 10s
- c) 1m 15s
- d) 1m 12s

END OF TEST

Numerical Reasoning Mental Arithmetic Examination Answers

1) A 2) B 3) C 4) D 5) D 6) A 7) A 8) D 9) A 10) B 11) A 12) C 13) B 14) B 15) D
16) B 17) C 18) B
19) D 20) C

NUMERICAL REASONING PILOT PRACTICE TEST 2

1) What is the missing number: 7, 10, 14, 19, ..., 32

- a) 25
- b) 24
- c) 26
- d) 27

2) A First Officer earns £52,000 a year. If she gets a wage increase of 3%, what will her new wage be?

- a) £53,240
- b) £53,560

c) £53,760

d) £53,440

3) What is 17% of 1112 rounded to the nearest whole number?

a) 173

b) 183

c) 179

d) 189

4) What is the average of these 4 numbers: 87, 92, 74, 19

a) 68

b) 72

c) 60

d) 56

5) If an aircraft is travelling at 300 knots, how many miles will it travel in 3 hours and 40 minutes?

a) 1,120 NM

b) 1,260 NM

c) 990 NM

d) 1,100 NM

6) If a right handed triangle's two shortest sides are both 17m each, what is the length of the longest side (to the nearest whole number)

a) 25m

b) 23m

c) 24m

d) 27m

7) What is $32 \times 78 - 143$?

a) 2375

b) 2373

c) 2353

d) 2355

8) What is the missing number?

$$\begin{array}{r} 24 \\ - \\ \hline 36 \end{array} = \begin{array}{r} ? \\ - \\ \hline 3 \end{array}$$

- a) 2
- b) 1
- c) 4
- d) 3

9) What is 20% of 120 plus 33.33% of 99?

- a) 57
- b) 55
- c) 53
- d) 51

10) What is $1987 - 379$?

- a) 1718
- b) 1708
- c) 1798
- d) 1608

Answers:

- 1) a
- 2) b – $52,000 \times 0.03 = 1560 + 52,000 = \text{£}53,560$
- 3) d
- 4) a – $87+92+74+19 / 4$
- 5) d – $300 \times 3 = 900$. 60 minutes / 20 minutes = 3. $300/3 = 100$. $100 \times 2 + 900 = 1100$
NM
- 6) c – A squared + B squared = C squared
- 7) c
- 8) a – 24/36 is 2 thirds
- 9) a
- 10) d

Related Pages: