Pearson
Edexcel

## Mark Scheme (Results)

January 2021
Pearson Edexcel Award
In Number and Measure (ANM10)
Paper 1A

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## NOTES ON MARKING PRINCIPLES

## 1 Types of mark

M marks: method marks
A marks: accuracy marks
B marks: unconditional accuracy marks (independent of M marks)

Abbreviations
cao - correct answer only
isw - ignore subsequent working
ft - follow through
oe - or equivalent (and appropriate)
SC: special case
indep - independent
3 No working
If no working is shown then correct answers normally score full marks
If no working is shown then incorrect (even though nearly correct) answers score no marks.
With working
If there is a wrong answer indicated on the answer line always check the working in the body of the script (and on any diagrams), and award any marks appropriate from the mark scheme.
If working is crossed out and still legible, then it should be given any appropriate marks, as long as it has not been replaced by alternative work.
If it is clear from the working that the "correct" answer has been obtained from incorrect working, award 0 marks. Send the response to review, and discuss each of these situations with your Team Leader.
If there is no answer on the answer line then check the working for an obvious answer.
Any case of suspected misread loses A (and B) marks on that part, but can gain the M marks. Discuss each of these situations with your Team Leader.
If there is a choice of methods shown, then no marks should be awarded, unless the answer on the answer line makes clear the method that has been used.

## Follow through marks

Follow through marks which involve a single stage calculation can be awarded without working since you can check the answer yourself, but if ambiguous do not award.
Follow through marks which involve more than one stage of calculation can only be awarded on sight of the relevant working, even if it appears obvious that there is only one way you could get the answer given.

## Ignoring subsequent work

It is appropriate to ignore subsequent work when the additional work does not change the answer in a way that is inappropriate for the question: e.g. incorrect cancelling of a fraction that would otherwise be correct
It is not appropriate to ignore subsequent work when the additional work essentially makes the answer incorrect e.g. algebra.
Transcription errors occur when candidates present a correct answer in working, and write it incorrectly on the answer line; mark the correct answer.

## $7 \quad$ Parts of questions

Unless allowed by the mark scheme, the marks allocated to one part of the question CANNOT be awarded in another.

## Use of ranges for answers

If an answer is within a range this is inclusive, unless otherwise stated.

| PAPER: ANM10_1A |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
| Question | Working | Answer | Mark | Notes |
| 1 (a) <br> (b) <br> (c) |  | Betoast | 1 |  |
|  |  | $26(.00)$ | 1 | B1 cao |
|  |  | Grillo | 1 | B1 cao |
| 2 | $\text { eg } \frac{2}{100} \times 650,2 \times 6.5$ | 13 | 2 | M1 for $0.02 \times 650$ oe or for an answer of 663 or 637 A1 |
| 3 (a) <br> (b) <br> (c) |  | $14.78$ | 1 | $\text { B1 allow } \frac{739}{50}$ |
|  |  | 97.3 | 1 | B1 allow $\frac{973}{10}$ |
|  |  | 3.52 | 1 | $\text { B1 allow } \frac{88}{25}$ |
| 4 (a) <br> (b) <br> (c) |  | 9 | 1 | B1 cao |
|  |  | 700 | 1 | B1 cao |
|  |  | 4 tenths | 1 | B1 $\frac{4}{10}$ or tenths |


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| :---: | :---: | :---: | :---: | :---: |
| Question | Working | Answer | Mark | Notes |
| 5 (a) <br> (b) |  | $937$ <br> Arrow at correct value | 1 | B1 cao <br> B1 cao arrow pointing at 268 (the notch before 270) |
| (b) <br> (c) |  | Any multiple of 8 <br> 1 or 2 or 4 <br> Any prime number greater than 14 | 1 <br> 1 <br> 1 | B1 eg 8, 16, 24 etc (if more than one number, all must be correct) <br> B1 for one or more common factor <br> B1 eg 17, 19, 23 etc |
| 7 |  | 9.20 pm or 2120 | 2 | B2 for a fully correct time that incorporates pm, eg 9.20 pm or 2120 or twenty past nine in the evening <br> (B1 for 9.20 am or twenty past nine in the morning or a correct time with no reference to evening) |
| 8 | $(3+2) \times 60+(48+20) \mathrm{oe}$ | 368 | 3 | M1 for $3+2(=5)$ and $48+20(=68)$ or $3 \times 60+48(=228)$ or $2 \times 60+20(=140)$ oe or for 5 minutes 68 (seconds) or 6 minutes 8 (seconds) [NB: zero for 5.68 or 568] M1 for $(3+2) \times 60+(48+20)$ oe or $228+140$ A1 |


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| :---: | :---: | :---: | :---: | :---: |
| Question | Working | Answer | Mark | Notes |
| 9 (a) |  | 0.2 | 1 | B1 0.2(000...) |
| (b) |  | $\frac{39}{100}$ | 1 | B1 or equivalent fraction eg $\frac{78}{200}$ |
| (c) |  | $\frac{15}{19}$ | 1 | B1 or equivalent fraction eg $\frac{30}{38}$ |
| (d) |  | 100 | 2 | M1 for $\frac{2}{9} \times 450$ or $2 \times 450(=900)$ or $450 \div 9(=50)$ A1 cao |
| 10 |  | 236 | 2 | M1 for $(76 \times 2)+(42 \times 2)$ oe or for $42+76(=118)$ Alcao |
| 11 (a) <br> (b) |  | Wednesday <br> 9th October | 1 <br> 2 | B1 for W, Wed, Wednesday oe <br> B2 for (Friday) 9th October (2020) or 09/10/(20) <br> (B1 for filling in spaces or showing a counting on method to get to 30th September (and no 31st) or for an answer of 8th October or 9th September) |
| 12 |  | 31 | 2 | M1 for $2.47 \div 8(=0.30(875))$ or $247 \div 8(=30 .(875))$ or for an answer of $0.31(\mathrm{p})$ <br> A1 cao |


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| :---: | :---: | :---: | :---: | :---: |
| Question | Working | Answer | Mark | Notes |
| 13 |  | 2673 | 2 | M1 for $27 \times 11 \times 9$ oe A1 cao |
| 14 | $\begin{array}{rr} 3 \mathrm{~km} \mathrm{251m} & 8 \mathrm{~km} 874 \mathrm{~m} \\ +5 \mathrm{~km} \mathrm{623m} & -\underline{\mathrm{km} \mathrm{202m}} \\ \hline 8 \mathrm{~km} 874 \mathrm{~m} & 6 \mathrm{~km} 672 \mathrm{~m} \end{array}$ | $\begin{aligned} & \hline 6 \mathrm{~km} 672 \mathrm{~m} \\ & \text { or } 6.672 \mathrm{~km} \\ & \text { or } 6 \frac{672}{1000} \mathrm{~km} \\ & \text { or } 6672 \mathrm{~m} \end{aligned}$ | 2 | M1 for showing $3+5-2$ or $251+623-202$ or a total including 672 m or showing a subtraction of 2 km 202 m from their total or for an answer of 6672 <br> or <br> M1 for writing all measurements in km and showing the addition of 3.251 and 5.623 or showing subtraction of 2.202 from their total or for an answer of 6.672 (or $6 \frac{672}{1000}$ oe) or <br> M1 for writing all measurements in $m$ and showing the addition of 3251 and 5623 or showing subtraction of 2202 from their total or for an answer of 6672 <br> A1 for 6 km 672 m or 6.672 km or $6 \frac{672}{1000} \mathrm{~km}$ or 6672 m <br> SCB1 for 11 km 76 m or 11.076 km or 11076 m |
| 15 | $\begin{gathered} 4 \times 1.70=6.80 \\ 1 \times 1.50=1.50 \\ 3 \times 0.95=\underline{2.85} \\ \underline{11.15} \\ 20-11.15=8.85 \end{gathered}$ | 8.85 | 4 | M1 $4 \times 1.70(=6.8(0))$ or $3 \times 95 \mathrm{p}(=285(\mathrm{p}))$ or $(£) 2.85$ or 20 - (one of $1.50,4 \times 1.70,3 \times 0.95$ ) oe <br> M1 for adding all 3 items or a total of 11.15 (with compatible units) or 20 - (two of $1.85,4 \times 1.70,3 \times 0.95$ ) oe <br> M1 for subtracting their total from 20 (with compatible units) dep on M1 A1 cao <br> SCB2 for 15.85 (SCB1 for 4.15) |
| 16 | e.g. $4 \times 5+3 \times 12$ | 56 | 3 | M1 for finding one correct area eg $4 \times 5(=20)$ or $3 \times 12(=36)$ or $12 \times 8(=96)$ or $5 \times 8(=40)$ <br> M1 for a fully correct method to find the area of the shape A1 cao |


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| :---: | :---: | :---: | :---: | :---: |
| Question | Working | Answer | Mark | Notes |
| 17 | $\begin{aligned} & 823-342 \text { or } 8.23-3.42 \\ & =481 \text { or } 4.81 \end{aligned}$ | $£ 4.81$ or 481p | 2 | M1 for $823-342$ or $8.23-3.42$ or 4.81 or 481 A1 for $£ 4.81$ or 481 p |
| 18 | $\begin{aligned} &(145-90) \times 0.11= 6.05 \\ &(623-400) \times 0.05= 11.15+ \\ & \underline{18.75} \\ & 35.95 \end{aligned}$ | 35.95 | 4 | $\begin{aligned} & \text { M1 for }(145-90) \times 0.11(=6.05) \text { or } \\ & (623-400) \times 0.05(=11.15) \\ & \text { M1 for }(145-90) \times 0.11+(623-400) \times 0.05(=17.2(0)) \text { or } \\ & (145-90) \times 0.11+18.75(=24.8(0)) \text { or }(623-400) \times 0.05+18.7(=29.9(0)) \\ & \text { M1 for " } 6.05 "+" 11.15 "+18.75 \text { (units must be consistent) } \\ & \text { A1 } \\ & \text { SCB2 for } 65.85(\text { SCB1 for } 47.1(0)) \end{aligned}$ |

