SOUTH AFRICAN COMPREHENSIVE ASSESSMENT INSTITUTE
SUID-AFRIKAANSE KOMPREHENSIEWE ASSESSERINGSINSTITUUT

Adult Basic Education and Training (ABET)

Marking Guidelines

Mathematical Literacy: NQF level 1

Examination Session: June 2023

Total Marks: 100 Marks

Symbol	Explanation
A	Accuracy; answer must be exactly as given.
AO	Answer only: if correct, full marks.
CA	Consistent Accuracy. Continue marking, using the candidate's answer.
J	Justification
M	Method
MA	Method with accuracy
O	Opinion
P	Penalty, e.g. for no units, incorrect rounding off, etc.
R	Rounding off
RT/ RG/ RM/ RS	Reading from a table/ graph/ map/ scale
S	Simplification
SF	Substitution in the formula

ANSWERS

			Mark Allocation	Explanation
QUESTION 1				
1.1	(a)	B ✓	1	A
1.1	(b)	C ✓	1	A
1.1	(c)	D ✓	1	A
1.1	(d)	D ✓	1	A
1.1	(e)	C ✓	1	A
1.2	(a)	36,8 ✓	1	A
1.2	(b)	$9\frac{25}{1\,000} = 9\frac{1}{40}$ ✓	1	AO
1.2	(c)	$\square = 1 \div 1\frac{1}{2}$ $\square = \frac{2}{3}$ ✓	1	A
1.2	(d)	759 – 756 = 3 ✓ *No marks if they did long division.*	1	MA
1.3	(a)	Round off 29,9166… Answer = 30 ✓	1	AO
1.3	(b)	3,6 ÷ 0,1 = 36 ✓	1	R

1.3	(c)	B ✓		1	J

QUESTION 2

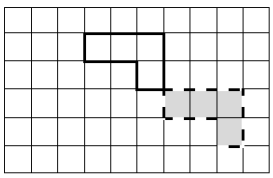
2.1	3^{1+5-2} ✓ $= 3^4$ ✓		2	A
2.2	VAT exclusive price $= \frac{372}{1,15} = 323,48$ ✓ VAT = 372 – 323,48 ✓ = R48,52 ✓	**OR:** 100% + 15% = 1,15 VAT exclusive price = 100% = $\frac{372}{1,15}$ ✓ 15% = $\frac{15}{100} \times \frac{372}{1,15}$ ✓ = R48,52 ✓	3	CA

QUESTION 3

3.1	One way: 4 x 13 km = 52 km ✓ Return: 2 x 52 km = 104 km ✓		2	CA
	OR: He must do 4 trips ✓ Total distance = 4 x 26 km = 104 km ✓	**OR:** He must do 4 trips ✓ One way: 4 x 13 km Total = 104 km ✓	2	CA
3.2	4 x 3 = 12 ✓ 12 ÷ 2 = 6 builders ✓	**OR:** $\frac{4 \times 3}{2}$ ✓ = 6 builders ✓	2	CA

3.3	(a)	8 : 12 ✓ = 2 : 3 ✓	2	A
3.3	(b)	4 + 8 + 12 = 24 parts concrete ✓ 4 parts cement to 24 parts concrete ∴ 1 part cement to 6 parts conrete. ✓ He needs 0,5 m^3 cement for 3 m^3 concrete. ✓	1 2	A CA
		OR: 4 + 8 + 12 = 24 parts concrete ✓ 4 parts cement to 24 parts concrete ∴ $\frac{4}{8}$ parts cement to $\frac{24}{8}$ parts conrete. ✓ He needs $\frac{1}{2}$ m^3 cement for 3 m^3 concrete. ✓	1 2	A CA

QUESTION 4

4.1	C ✓ (trapezium) B ✓ (kite) D ✓ (rhombus) A ✓ (rectangle)	4	A
4.2	C ✓ (Triangular pyramid)	1	A
4.3	 ✓ 3 spaces to right; ✓ spaces down	2	A
4.4	Rotation ✓	1	A

4.5	(a)	A ✓	1	A
4.5	(b)	B ✓	1	A
4.5	(c)	A ✓	1	J
4.5	(d)	$\frac{KN}{PR} = \frac{MN}{QR}$ ✓	1	A
		KN = $\frac{7,8}{1,35} \times 0,9$ ✓	1	S
		KN = 5,2 m ✓	1	CA
		Or:		
		$\frac{KN}{MN} = \frac{PR}{QR}$ ✓	1	A
		KN = $\frac{0,9}{1,35} \times 7,8$ ✓	1	S
		KN = 5,2 m ✓	1	CA

QUESTION 5

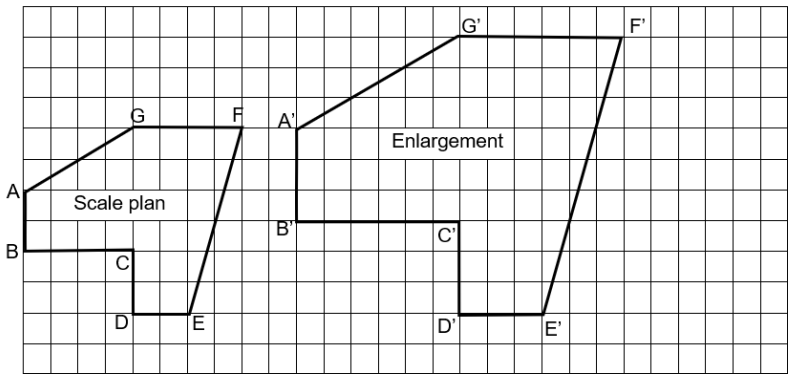
5.1	(a)	Hexagon ✓	1	A
5.1	(b)	$AE^2 = AF^2 + FE^2$ (Pythagoras) $AE^2 = 3^2 + 4^2$ ✓ AE = 5 m ✓	2	A
5.1	(c)	$\frac{1}{2}(3 \times 4)$ ✓ = 6 m^2 ✓ **OR:** $\frac{3 \times 4}{2}$ ✓ = 6 m^2 ✓	2	A

5.1	(d)	Area of rectangle = AE x 7 = 35 ✓ Area of 2 triangles + rectangle = 35 + 2(6) ✓ Area of ABCDEF = 47 m^2 ✓	3	CA
5.2	(a)	1 ✓ m	1	A
5.2	(b)	Area circle = $3{,}14(1)^2$ ✓ Area semicircle = $\frac{1}{2}(3{,}14)$ $= 1{,}57\ m^2$ ✓ **OR:** Area semicircle = $\frac{1}{2}(3{,}14)(1^2)$ ✓ $= 1{,}57\ m^2$ ✓	2	A
5.2	(c)	Area rectangle = 4 x 2 = 8 m^2 ✓	1	A
		Area semicircles = 4 x 1,57 = 6,28 m^2 ✓	1	CA
		Shaded area = 8 – 6,28 = 1,72 m^2 ✓	1	CA
		OR: There are 8 identical squares, each with one quarter of a circle unshaded. Are of 1 shaded portion = Area square – area $\frac{1}{4}$ circle = 1 – $\frac{1}{4} \times 3{,}14(1)^2$ ✓ = 0,125 ✓	2	A
		8 x 0,215 = 1,72 m^2 ✓	1	CA
		OR: There are 2 full circles of area = 2(3,14) (1^2) = 6,28 m^2 ✓	1	A
		Area rectangle = 4 x 2 = 8 m^2 ✓	1	CA
		Shaded area = 8 – 6,28 = 1,72 m^2 ✓	1	

QUESTION 6

6.1	B5 ✓	1	RM
6.2	North west ✓	1	RM
6.3	1,6 km (accept between 1,4 and 1,8) ✓	1	RM
6.4	Go west along Bele Rd, ✓ right (or north) into First St ✓ and left (or south west) into Konene Rd. ✓	3	A

QUESTION 7

7.1	(a)	143^{o} ✓	1	A
7.1	(b)	6 ✓ blocks	1	A
7.2		 ✓ D' and E' in correct position (*Labelling not essential)* ✓ G' and F' in correct position	1 1	RS A

7.3	(a)	Perimeter = 2H + 2W 6 = 2(2,2) + 2 W ✓ W = 0,8 m ✓	2	CA
7.3	(b)	Height: 2 200 + 5 = 2 205 cm ✓	1	A
		Width of hole = width of door + 2(5 cm) ✓	1	A
		= 800 + 10		
		= 810 cm ✓	1	CA
7.4		B ✓or $2\,000\pi\ \text{cm}^3$ ✓	1	A
7.5		$\frac{385}{110}$ ✓ = 3,5 hours or $3\frac{1}{2}$ hours or 3 hours 30 minutes. ✓	2	A

QUESTION 8

8.1 (a)

Task	Tally	Frequency
Carpentry	||||	4
Bricklaying	𝍸 |||	8
Painting	𝍸 |	6
Dumping	||||	4
Plastering	𝍸 |	6

✓ Two tallies correct ✓ other two tallies correct

✓ Frequencies match tallies

3 A

8.1	(b)	$\frac{4}{28}$ ✓(Mark forward from 8.1a) $=\frac{1}{7}$ ✓	2	1CA 1S

8.2 (a)

Males (kg)	Tens
9 8 7 7 5 3 2	7
9 5 5 2 1 1	6
5 4	5

✓ Numbers correct ✓ Order correct (decreasing) | 2 | RT

8.2 (b) 68 ✓ | 1 | A

8.2 (c) 89 – 50 ✓ | 1 | A

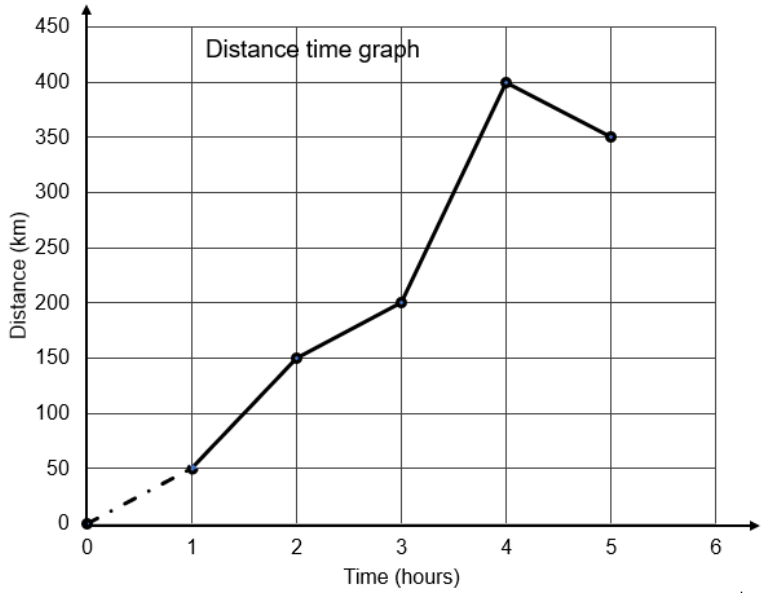
= 39 kg ✓ | 1 | CA

8.2 (d) 74 kg ✓ | 1 | A

8.2 (e) $\frac{79 + 78 + 77 + 77 + 75 + 73 + 72 + 69 + 65 + 65 + 62 + 61 + 61}{13}$✓ | 1 | RT

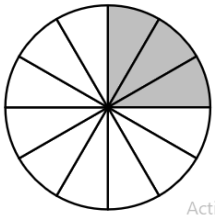
$= \frac{914}{13}$ ✓= 70,3 ✓ | 2 | CA

QUESTION 9

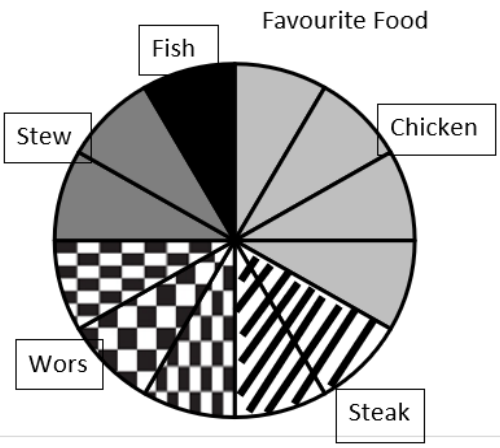
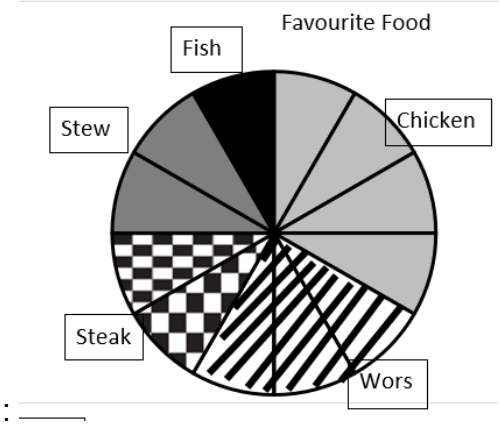
9.1	 2 dots correctly placed ✓. Other two dots correctly placed✓. Points joined in sequence ✓	3	A
9.2	1 150 km ✓	1	A
9.3	B ✓ or The trip of 350 km took a longer time than the trip of 400 km.✓	1	A
9.4	✓ Any reasonable opinion why it would take longer, e.g. traffic delays, stopped for a delivery, etc.	1	O

QUESTION 10

10.1	(a)	$\frac{1}{4} \times 12$ ✓$= 3$✓	2	A
		Or: shade in one quarter of small pie chart: 3 ✓sections	2	A



✓ Activ

10.1	(b)		Wors three sectors ✓ Steak two sectors ✓ Labels: ✓	3	A
		Or: 	Wors three sectors ✓ Steak two sectors ✓ Labels: ✓	3	A
10.2	(a)	A and C only ✓		1	A
	(b)	Percentage increase = $\frac{15}{60} \times 100\%$ ✓		1	A
		= 25% ✓		1	CA
			Grand Total:	**(100)**	