Retrospective

2015 Queensland Core Skills Test

Short Response (SR) (Part 2 of 5)

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For all Queensland schools

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Short Response (SR)

This year's SR subtest comprised 16 items across nine units. As students worked through each unit, they interacted with stimulus material that was chosen to be challenging and engaging. Test developers paid careful attention to framing each item in a way that made it accessible to most students. The SR testpaper comprised units with stimulus material selected from fields such as mathematics, science, history, the social sciences and literature.

This year's paper was varied in its content, covering a broad range of CCEs. The different tasks included drawing and labelling a mud-map, calculating the value of a numerical expression, estimating area on a map, measuring carefully and locating features on a diagram, providing clear explanations and giving evidence to justify a point of view.

Model responses and commentaries on student performance

What follows is an item-by-item report that includes model responses and marking schemes, tables and graphs of the distributions of grades, and commentaries that discuss the tasks. At times, references to specific student responses are included to exemplify observations. As much as possible, model responses are actual student responses. Model responses are those that demonstrate a high level of performance and would have been awarded the highest grade.

For some items, especially the more open-ended items, responses were extremely varied. For these responses it is not possible to provide examples of the many ways students responded. The detailed, item-specific marking schemes indicate the scope of acceptable responses for different grades. Even for the more closed items the marking schemes demonstrate that different ways of perceiving 'the solution' were able to gain credit.

Marking schemes

The marking schemes used during the marking operation and included in this section of the *Retrospective* are not designed to be read in isolation. They are only one element of the marking prescription. During the marking operation markers undergo rigorous training in how to apply the marking schemes to student responses of one marking unit. The training involves careful consideration and application of the material presented by immersers.

All SR items are double marked. This means that a student's response booklet is marked by at least 10 different, independent markers. Referee marking also occurs when necessary.

For organisational purposes during the marking operation, the testpaper units were grouped into five marking units. In 2015, Marking Unit 1 contained testpaper units One and Five, Marking Unit 2 contained testpaper units Two and Three, Marking Unit 4 contained testpaper units Four and Nine, Marking Unit 6 contained testpaper units Six and Seven and Marking Unit 8 contained testpaper unit Eight.

Each marking scheme provides descriptors for up to five creditable grades, as well as the non-contributory grades N (where the response is unintelligible or does not satisfy the requirements of any other grade) and O (where no response has been given).

SR 2015 summary

Unit	Item	Basket	Common Curriculum Elements by unit
One *Perspectives*	1	α	4 *Interpreting the meaning of words …* 28 *Empathising*
Two *K-maps*	2	β	6 *Interpreting the meaning of … diagrams …* 29 *Comparing, contrasting* 30 *Classifying* 44 *Synthesising*
	3	θ	
Three *Water diviner*	4	θ	26 *Explaining to others* 43 *Analysing*
Four *Mud-map*	5	β	16 *Calculating with or without calculators* 50 *Visualising* 60 *Sketching/drawing*
Five *Agatha*	6	θ	5 *Interpreting the meaning of … illustrations* 26 *Explaining to others* 31 *Interrelating … ideas* 43 *Analysing* 44 *Synthesising* 46 *Creating/composing/devising* 50 *Visualising*
	7	θ	
Six *Engineer*	8	ϕ	16 *Calculating with or without calculators* 36 *Applying strategies to trial and test ideas and procedures* 38 *Generalising from information* 46 *Creating/composing/devising* 48 *Justifying*
	9	β	
Seven *Ant wall*	10	α	6 *Interpreting the meaning of … maps …* 7 *Translating from one form to another* 17 *Estimating numerical magnitude* 29 *Comparing, contrasting* 45 *Evaluating*
	11	β	
Eight *Liar*	12	α	10 *Using vocabulary appropriate to a context* 29 *Comparing, contrasting* 32 *Deducing* 33 *Reaching a conclusion which is consistent with a given set of assumptions* 42 *Criticising* 48 *Justifying* 52 *Searching and locating … information*
	13	π	
	14	θ	
Nine *Taking off*	15	ϕ	15 *Graphing* 16 *Calculating with or without calculators* 17 *Estimating numerical magnitude* 18 *Approximating a numerical value* 22 *Structuring … a mathematical argument* 44 *Synthesising* 48 *Justifying*
	16	ϕ	

Note: CCEs specific to an item are listed on the item's marking scheme.
The baskets into which CCEs are grouped are shown in Appendix 3.

Unit One

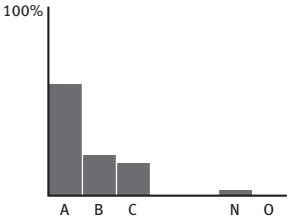
The item in this unit is about how a partly-filled glass of water is described by a person and what that says about their attitude to life.

The following table shows the percentage of responses awarded the various grades for the item in this unit.

	A	B	C	D	E	N	O
Item 1	58.8	21.1	17			2.8	0.3
A shaded box indicates that the grade was not available for that item.							

Item 1

Commentary



Item 1 is a two-star item that tested achievement in CCEs 28 *Empathising* and 4 *Interpreting the meaning of words*.

The item required students to consider five words that can be used for people with various perspectives on life. Next to each word are letters A–E. Students were required to match each word to the best associated comment, regarding the glass of water, by writing the appropriate letter in the box provided.

The cue directed students to use each letter once only.

An A-grade response needed to show the five correct matches.

Students should remember to follow cues carefully. Some students used the first letter of the words provided or used a letter more than once which impacted on their ability to achieve the highest grade. Particularly in closed items such as this one, students are encouraged not to leave blanks.

Model response

A.	OPTIMIST	The glass is half empty.	E
B.	IDEALIST	Break the glass.	C
C.	ANARCHIST	The glass should be full.	B
D.	PRAGMATIST	The glass is half full.	A
E.	PESSIMIST	The glass is too big.	D

UNIT ONE ITEM 1

Marking Scheme

PERFORMANCE DOMAIN	28 Empathising	4 Interpreting the meaning of words …

A	B	C	N
The response shows the five correct matches. **E** **C** **B** **A** **D**	**The response shows three correct matches.**	**The response shows one correct match.**	**Response is unintelligible or does not satisfy the requirements for any other grade.**

O
No response has been made at any time.

Model Response:

A.	OPTIMIST	The glass is half empty.	E
B.	IDEALIST	Break the glass.	C
C.	ANARCHIST	The glass should be full.	B
D.	PRAGMATIST	The glass is half full.	A
E.	PESSIMIST	The glass is too big.	D

Note:

1. **In the case of**
   - **other letters having been used**
   - **any letter having being used more than once**
   - **lines having being used rather than letters**
   - **both lines and letters having being used,**

   grade the response on the basis of the number of matches according to the marking scheme.

Unit Two

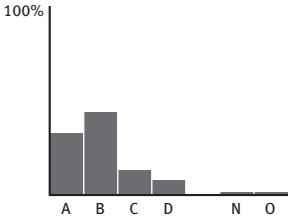
The items in this unit are based on information about using diagrams to indicate the splitting of a given group into sub-groups.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 2	32.9	43.6	13.3	7.6		1.5	1.1
Item 3	7.2	30.9	39.3	13.5		6.7	2.4
A shaded box indicates that the grade was not available for that item.							

Item 2

Commentary



Item 2 is a three-star item that tested achievement in CCEs 29 *Comparing, contrasting* and 6 *Interpreting the meaning of diagrams*.

A diagrammatic method of representing a group of people with sub-groups based on various attributes was presented. The example given considered whether people were under 14 years of age or aged 14 years and over and whether or not they owned an iPod. The same group of people was further subdivided according to whether they liked or did not like music and the diagram was adjusted to show this.

The item comprised two parts. In the first part students were required to provide a succinct definition of the people in the cell marked as *x*. In the second part, students had to compare the characteristics of the people in the cells marked as *y* and *z* and say in what ways they differed and how they were similar.

A cue for the second part instructed students to give details.

An A-grade response needed to provide the three required attributes for part I and correctly explain the shared attribute and the two different attributes for part II. The six points needed to be correct and complete with no incorrect or extraneous information included.

Students should remember that where the stimulus explains a new concept and gives examples/models to aid in comprehension they should spend time interrogating the examples/models and any given information to gain a full understanding before responding to the items.

Model response

I. Define succinctly the people who are represented by the cell ***x***.

Do not own an iPod, aged under 14, like music.

II. According to the diagram how do the people represented by the cell ***y*** and the cell ***z*** differ and how are they similar?

Give details. *Group y members own an iPod and are aged under 14 while group z do not own an iPod and are aged 14 and over.*

Those in groups y and z are similar in their dislike of music.

UNIT TWO ITEM 2

Marking Scheme

PERFORMANCE DOMAIN	29 Comparing, contrasting	6 Interpreting the meaning of … diagrams …

A

The response satisfies all SIX of the following points.

For part I
provides

- does not own an iPod
- aged under 14
- likes music.

For part II
clearly identifies that the groups are

- different — group *y* own an iPod but group *z* do not own an iPod
- different — group *y* are aged under 14 but group *z* are aged 14 and over
- similar — group *y* do not like music and group *z* do not like music.

No incorrect or extraneous information is included.

B

The response satisfies FIVE of the following points.

For part I
provides

- does not own an iPod
- aged under 14
- likes music.

For part II
clearly identifies that the groups are

- different — group *y* own an iPod but group *z* do not own an iPod
- different — group *y* are aged under 14 but group *z* are aged 14 and over / over 14
- similar — group *y* do not like music and group *z* do not like music.

No incorrect information is included in the creditable points.

C

The response satisfies FOUR of the following points.

For part I
provides

- does not own an iPod
- aged under 14
- likes music.

For part II
clearly identifies that the groups are

- different — group *y* own an iPod but group *z* do not own an iPod
- different — group *y* are aged under 14 but group *z* are aged 14 and over / over 14
- similar — group *y* do not like music and group *z* do not like music.

No incorrect information is included in the creditable points.

D

The response satisfies TWO of the following points.

For part I
provides

- does not own an iPod
- aged under 14
- likes music.

No incorrect information is included in the creditable points.

OR

The response satisfies ONE of the following points.

For part II
clearly identifies that the groups are

- different — group *y* own an iPod but group *z* do not own an iPod
- different — group *y* are aged under 14 but group *z* are aged 14 and over / over 14
- similar — group *y* do not like music and group *z* do not like music.

No incorrect information is included in the creditable point.

N

Response is unintelligible or does not satisfy the requirements for any other grade.

O

No response has been made at any time.

Model Response:

Part I.
Do not own an iPod, aged under 14, like music.

Part II.
Group *y* members own an iPod and are aged under 14 while group *z* do not own an iPod and are aged 14 and over.

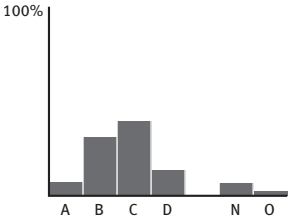
Those in groups *y* and *z* are similar in their dislike of music.

Notes:

1. For all grades accept iP*d as iPod regardless of the letter in the * position.
2. Within a response, a point cannot gain credit if whole or part of the point is omitted or whole or part of the point is incorrect.
3. For the B-, C- and D-grades ‘do not listen to music’ is acceptable for ‘do not like music’. Similarly, ‘listen to music’ is acceptable for ‘like music’.
4. Extraneous information is unacceptable at the A-grade. Extraneous information attributes a characteristic that is not identifiable from the diagram. This applies to both parts I and II. An example of extraneous information is ‘only geeky guys own an iPod so group *x* are geeky males’.

Item 3

Commentary



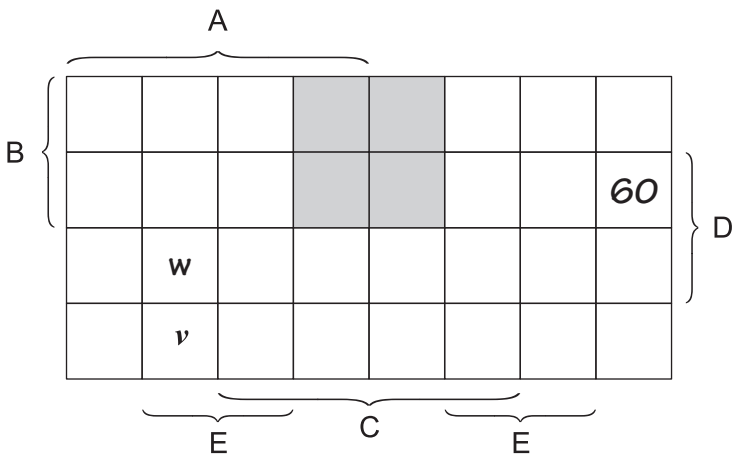
Item 3 is a three-star item that tested achievement in CCEs 44 *Synthesising* and 30 *Classifying*.

The stimulus material provided a rectangular grid representing the whole numbers from 1 to 99. Five sub-groups were specified in the legend and labelled on the diagram. The stimulus explained that for each specified sub-group there was an opposite sub-group that had to be inferred. For example the cells labelled 'odd numbers' left other cells unlabelled and so by inference these contained even numbers.

The item comprised four parts. An A-grade response needed to provide correct answers to all four parts. Part I could not include incorrect surplus information and part III could provide only one number.

Students should remember not to add non-required information. Examples particular to this item are: giving incorrect surplus information for part I such as 'half are odd numbers and half are even numbers' when in fact the distribution of odd and even numbers in the shaded cells is not half and half; providing all six possible answers for part III when the requirement was for an example of a number.

Model response



I. Complete the sentence below:

The numbers in the shaded cells can be defined as .....

less than 50, divisible by 3, does not contain 7

.....

II. Write the number 60 in the cell to which it belongs.

III. Give an example of a number that belongs in the cell ***v***. ....97.....

IV. Determine the cell representing numbers in sub-groups A, D and E but not in sub-group B or sub-group C. Identify the appropriate cell by writing ***w*** in it.

UNIT TWO ITEM 3

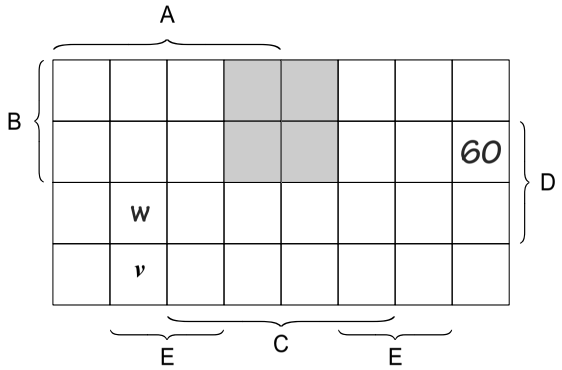
Marking Scheme

PERFORMANCE DOMAIN	44 Synthesising	30 Classifying

A	B	C	D
The response provides correct answers to all FOUR parts: **I. less than 50, divisible by 3, does not contain 7 (no incorrect surplus information is included)** **II. '60' correctly positioned in the diagram** **III. only one of 67, 71, 73, 77, 79, 97** **IV. '*w*' correctly positioned in the diagram.**	**The response provides correct answers to all FOUR parts:** **I. less than 50, divisible by 3, does not contain 7 (no incorrect surplus information is included)** **II. '60' correctly positioned in the diagram** **III. one of 67, 71, 73, 77, 79, 97** **IV. '*w*' correctly positioned in the diagram.**	**The response provides correct answers to TWO parts:** **I. less than 50, divisible by 3, does not contain 7** **II. '60' correctly positioned in the diagram** **III. one of 67, 71, 73, 77, 79, 97** **IV. '*w*' correctly positioned in the diagram.**	**The response provides the correct answer to ONE part:** **I. less than 50, divisible by 3, does not contain 7** **II. '60' correctly positioned in the diagram** **III. one of 67, 71, 73, 77, 79, 97** **IV. '*w*' correctly positioned in the diagram.**

N	O
Response is unintelligible or does not satisfy the requirements for any other grade.	**No response has been made at any time.**

Model Response:



part I — less than 50, divisible by 3, does not contain 7
part II — on diagram
part III — 97
part IV — on diagram

Notes:

1. **For part I, responses MUST include ALL three statements. Failure to have all three means this part is not creditable.**
2. **If there is surplus information provided in part I, determine whether the information is correct or incorrect in considering the A- and B-grades. There are additional statements students MAY include in part I — statements that are correct but do not define.**
   Examples of CORRECT statements are: 'numbers can be both even and odd' or 'numbers may or may not be divisible by 5'.
   Examples of INCORRECT statements are: 'half of the numbers are odd and half even' or 'two of them are divisible by 5'.
3. **If there are multiple entries for part II or for part IV, that part does not gain credit.**
4. **If there are multiple entries for part III, that part will not gain credit towards an A-grade; consider the first entry only to determine whether the part may contribute to the award of a B-, C- or D-grade.**
5. **Cell *w* is a null set.**

Unit Three

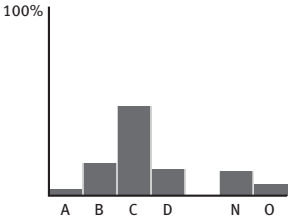
The item in this unit is based on a poem titled *The Diviner* which describes a water diviner going about the business of finding water without using any scientific apparatus.

The following table shows the percentage of responses awarded the various grades for the item in this unit.

	A	B	C	D	E	N	O
Item 4	3.3	17.1	47	13.8		12.9	5.9
A shaded box indicates that the grade was not available for that item.							

Item 4

Commentary



Item 4 is a three-star item that tested achievement in CCEs 43 *Analysing* and 26 *Explaining to others*.

The item required students to investigate the poet's use of language to establish the sense that the water diviner has mastery over his craft. Students were required to cite a specific instance of this deliberate use of language from each stanza and make clear how this sense of mastery is established. At all creditable grades the response needed to be consistent with a reasonable reading of the poem.

An A-grade response needed to be consistent with a reasonable reading of the poem; cite three instances (one from each stanza) and explain how the use of language in each instance clearly established the diviner's mastery over his craft.

The majority of responses cited three relevant instances of the deliberate selection of language. However some did not provide a clear explanation of how the language establishes the diviner's mastery.

Students should remember to unpack all aspects of the stem and ensure that they address each and every aspect, e.g. citing a deliberate use of language and then making clear how this establishes the idea of mastery over his craft.

Model response

In this poem the use of carefully selected language has built up the sense that the water diviner has mastery over his craft.

From each stanza, cite a specific instance of this deliberate use of language and make clear how they establish the sense that the water diviner has mastery over his craft.

In stanza one 'nervous, but professionally' says that, despite the pressure of being watched, the diviner remains composed and focused on doing his job. His nervousness shows he is psyched up, a bit like a professional before a performance.

The diviner is a master at his job, expertly working under pressure even when nervous.

The second stanza features the words, 'suddenly broadcasting through a green aerial its secret stations'. The use of the word 'secret' makes it seem that the water diviner is privy to something that others are not. He is unique.

In stanza three 'the hazel stirred' refers to the diviner's tool, basically a dead stick. Stirred is often used to describe a person waking up. Here 'stirred' tells us that this simple tool becomes alive even when not in direct contact with the diviner's hands.

Describing a simple dead stick as stirring and turning it into a useful living tool adds to the idea that the diviner has power and mastery over his craft.

UNIT THREE ITEM 4

Marking Scheme

PERFORMANCE DOMAIN	43 Analysing	26 Explaining to others

A	B	C	D	N
The response is consistent with a reasonable reading of the poem and • cites THREE instances with one from each stanza • explains how the use of language in each instance clearly establishes the diviner's mastery over his craft.	The response is consistent with a reasonable reading of the poem and • cites TWO instances each from a different stanza • explains how the use of language in each instance clearly establishes the diviner's mastery over his craft.	The response is consistent with a reasonable reading of the poem and • cites ONE instance • explains how the use of language in this instance clearly establishes the diviner's mastery over his craft. OR The response is consistent with a reasonable reading of the poem and • provides TWO examples of relevant phrases/words from different stanzas • for each example, gives an account that points to the diviner's mastery over his craft.	The response is consistent with a reasonable reading of the poem and • provides ONE example of a relevant phrase/words from the poem • for this example, gives an account that points to the diviner's mastery over his craft.	Response is unintelligible or does not satisfy the requirements for any other grade.

O
No response has been made at any time.

Model Response:

In stanza one 'nervous, but professionally' says that, despite the pressure of being watched, the diviner remains composed and focused on doing his job. His nervousness shows he is psyched up, a bit like a professional before a performance. The diviner is a master at his job, expertly working under pressure even when nervous.
The second stanza features the words, 'suddenly broadcasting through a green aerial its secret stations'. The use of the word 'secret' makes it seem that the water diviner is privy to something that others are not. He is unique.
In stanza three 'the hazel stirred' refers to the diviner's tool, basically a dead stick. Stirred is often used to describe a person waking up. Here 'stirred' tells us that this simple tool becomes alive even when not in direct contact with the diviner's hands. Describing a simple dead stick as stirring and turning it into a useful living tool adds to the idea that the diviner has power and mastery over his craft.

Notes:

1. The stanzas from which instances/examples are cited do not need to be stated.
2. The use of 'but professionally ... Unfussed.' can be attributed to EITHER stanza 1 OR stanza 2 but not to both. Another example from either stanza 1 or stanza 2 must then be used. The third example must come from stanza 3.

Unit Four

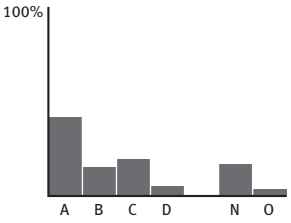
The item in this unit is based on information about the highway between Meekatharra and Newman in Western Australia.

The following table shows the percentage of responses awarded the various grades for the item in this unit.

	A	B	C	D	E	N	O
Item 5	41.5	15	19	5		16.4	3.2
A shaded box indicates that the grade was not available for that item.							

Item 5

Commentary



Item 5 is a three-star item that tested achievement in CCEs 50 *Visualising*, 60 *Sketching/drawing* and 16 *Calculating with or without calculators*.

The item comprised two parts. In part I, students were required to draw a simple sketch or mud-map of a section of highway between the towns Meekatharra and Newman. They needed to draw two side roads which meet this highway, label their destinations and then indicate, with a cross, the location of a given sign. Part II of the item required students to complete a blank sign as it would appear to a person turning onto the highway from the intersection that did not have the given sign at it. The map did not need to be drawn to scale.

An A-grade response needed to provide a diagram which correctly showed the six pieces of data described in the stimulus material and correctly complete the blank sign. All creditable grades required the representation of the highway on the diagram to be oriented in a north-south direction.

Some responses indicated that locating east to show the side road that 'comes in from the east' caused some difficulty. A good many students, incorrectly, placed a cross at both intersections. This was presumably a result of misreading 'this sign's position' as 'signs'.

Students should be instructed to read the stem carefully and not to do more than what is required, e.g. only one sign's position was to be marked on the diagram not the positions of two signs as some responses showed. Where more than one response or part of a response is provided and it is not clear which is to be marked or which is the first response, credit cannot be given.

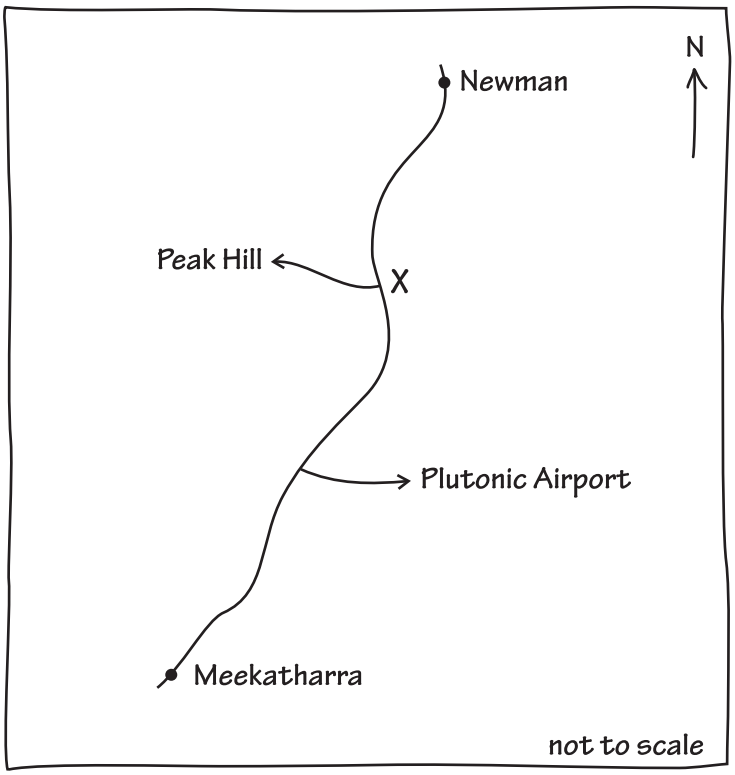
Model response

I. In the frame below, draw a mud-map (simple sketch) of the Great Northern Highway between Meekatharra and Newman. The mud-map does not have to be drawn to scale.

On the mud-map, clearly mark:

- the positions of Meekatharra and Newman
- the two side roads, and the destinations to which they lead
- the position of the sign shown above. Use a cross (X) to indicate this sign's position.

Use pencil when working on the map.



II. The two T-intersections are 48 km apart. If you were intending to turn onto the Great Northern Highway at the **other** T-intersection, you would see a sign, similar to the one on the opposite page, when you looked across the highway.

Using the sign on the opposite page as a model (colour not required), complete the sign below to show what this **other** sign looks like. Include the names of the towns and their distances from this T-intersection.

UNIT FOUR ITEM 5

Marking Scheme

PERFORMANCE DOMAIN	50 Visualising	60 Sketching/drawing	16 Calculating with or without calculators

A

The response

for part I
shows a diagram on which the highway is oriented correctly and

- **Meekatharra and Newman are marked correctly**
- **two side roads and no other roads are shown**
- **one side road is shown on the right of the highway and is marked Plutonic Airport**
- **one side road is shown on the left of the highway and is marked Peak Hill**
- **the Plutonic Airport road is positioned lower than the other side road**
- **the sign is positioned correctly**

AND

for part II
provides a sign which shows

- **Meekatharra on the left and Newman on the right**
- **181 on the left and 241 on the right.**

B

The response

for part I
shows a diagram on which the highway is oriented correctly and provides FIVE of

- **Meekatharra and Newman are marked correctly**
- **two side roads and no other roads are shown**
- **one side road is shown on the right of the highway and is marked Plutonic Airport**
- **one side road is shown on the left of the highway and is marked Peak Hill**
- **the Plutonic Airport road is positioned lower than the other side road**
- **the sign is positioned consistent with the rest of the diagram**

AND

for part II
provides a sign which shows

- **Meekatharra and Newman consistent with the diagram in part I.**

C

The response

for part I
shows a diagram on which the highway is oriented correctly and

- **two side roads and no other roads are shown**
- **one side road is marked Plutonic Airport**
- **one side road is marked Peak Hill.**

OR

The response

for part II
provides a sign which shows

- **Meekatharra on the left and Newman on the right**
- **181 on the left and 241 on the right.**

D

The response

for part I
shows a diagram on which the highway is oriented correctly and provides ONE of

- **only two side roads are shown**
- **a side road is marked Plutonic Airport**
- **a side road is marked Peak Hill.**

N

Response is unintelligible or does not satisfy the requirements for any other grade.

O

No response has been made at any time.

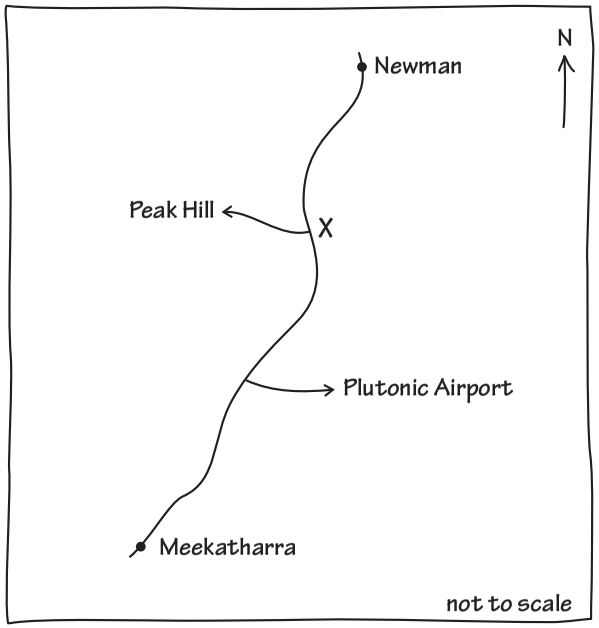
Notes:

1. **The highway is oriented correctly if it is running basically north-south.**
2. **In the absence of a labelled highway, the highway goes between Meekatharra and Newman.**
3. **Meekatharra and Newman are marked correctly if Meekatharra is shown below Newman on the highway.**
4. **Side roads are roads that meet the highway but do not cross the highway.**
5. **Where a name or sign is marked in more than one position, none can gain credit.**
6. **For the B-grade**
   - **if Meekatharra and/or Newman are not marked, then treat the response as having them in the correct position/s for the remaining dot points**
   - **if the position of the sign in part I is omitted or is at both side roads, then treat the response as having it in the correct position when marking part II.**

UNIT FOUR ITEM 5

Model Response:

I.



Marking Scheme

II.

Unit Five

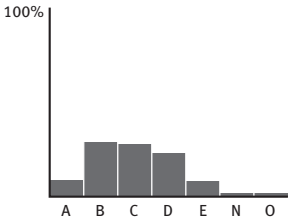
The items of this unit are based on two pages from a comic book version of a novel set in Paris in 1928.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 6	8.8	28.8	28.1	22.7	8.4	1.5	1.7
Item 7	21.8	24.8	41	5.4		1.5	5.5
A shaded box indicates that the grade was not available for that item.							

Item 6

Commentary



Item 6 is a four-star item that tested achievement in CCEs 43 *Analysing*, 31 *Interrelating ideas*, 5 *Interpreting the meaning of illustrations* and 26 *Explaining to others*.

The item required students to describe the atmosphere created across the two pages of the comic book and discuss how this atmosphere was developed and conveyed.

The cue instructed students to refer to features such as characters, setting and lighting.

An A-grade response needed to identify an atmosphere, explain how two observable features within the panels conveyed this atmosphere and to reveal how a feature in the final panel contributed to the atmosphere.

Some responses merely explained the progress of the story across the panels instead of explaining how the atmosphere is conveyed. This was not what the stem required.

Students should remember to consider all the stimulus provided and to give clear and detailed explanations. An error sometimes made is that only cursory links or references are provided which do not give enough information and depend on the reader to infer meaning. Identifying specific details of features (e.g. dim, yellow lighting) rather than just the feature itself (lighting) can help with a detailed explanation.

Model response

Describe the atmosphere created across pages 1 and 2. Discuss how it has been developed and conveyed.

Refer to features such as characters, setting and lighting.

There is a tangible sense of fear and foreboding across the comic panels. The night time setting, derelict buildings, shadowy figures and dim lighting adds to this atmosphere. The first panel establishes the cold, alienating street scene. It is clear this is not a place where you would feel safe at night. The street lights, lit windows and car headlights offer some comfort from the darkness but this does nothing to ease the atmosphere of fear and foreboding when the shadowed figure in panels 2, 3, 5 is seen following the first man. The cloaked man's mysterious presence, furtive actions and concealed appearance all contribute to this tension as we sense his motivations are sinister. The organisation of the panels and the artist's ability to conceal elements (faces) and reveal details (mist in panel 3, cracked walls in all panels) adds to the fear, as a clear picture of what is going on or about to happen isn't apparent. The relief as the pursued man finds safety in the building is temporary as panel 6 reveals the masked man staring up at the window. The sharp, skeleton-like features of the mask and even the shirt adds fear as they look sinister and also conceal the character's face and identity. This causes suspicion in the viewer about the masked man. We can assume by all these elements that the masked man is intent on something untoward in the room above the cold, dark, disquieting street.

UNIT FIVE ITEM 6

Marking Scheme

PERFORMANCE DOMAIN		
	43 Analysing	31 Interrelating ideas …
	5 Interpreting the meaning of … illustrations	26 Explaining to others

A	B	C	D	E
The response • identifies an atmosphere • explains <u>how</u> TWO observable features within the panels convey this atmosphere • in addition, also reveals <u>how</u> a feature in the final panel contributes to this atmosphere.	The response • identifies an atmosphere • explains <u>how</u> ONE observable feature within the panels conveys this atmosphere • in addition, also refers to a feature in the final panel that contributes to this atmosphere.	The response • identifies an atmosphere • links TWO observable features within the panels to this atmosphere • in addition, also refers to a feature in the final panel that contributes to this atmosphere.	The response • identifies an atmosphere • links TWO observable features within the panels to this atmosphere.	The response includes • a word or phrase that is indicative of an atmosphere • a link between an observable feature within the panels and this indicative word or phrase.

N	O
Response is unintelligible or does not satisfy the requirements for any other grade.	No response has been made at any time.

Model Response:

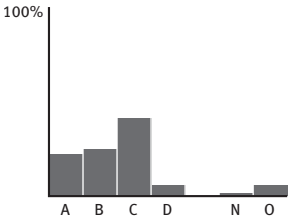
There is a tangible sense of fear and foreboding across the comic panels. The night time setting, derelict buildings, shadowy figures and dim lighting adds to this atmosphere. The first panel establishes the cold, alienating street scene. It is clear this is not a place where you would feel safe at night. The street lights, lit windows and car headlights offer some comfort from the darkness but this does nothing to ease the atmosphere of fear and foreboding when the shadowed figure in panels 2, 3, 5 is seen following the first man. The cloaked man's mysterious presence, furtive actions and concealed appearance all contribute to this tension as we sense his motivations are sinister. The organisation of the panels and the artist's ability to conceal elements (faces) and reveal details (mist in panel 3, cracked walls in all panels) adds to the fear, as a clear picture of what is going on or about to happen isn't apparent. The relief as the pursued man finds safety in the building is temporary as panel 6 reveals the masked man staring up at the window. The sharp, skeleton-like features of the mask and even the shirt adds fear as they look sinister and also conceal the character's face and identity. This causes suspicion in the viewer about the masked man. We can assume by all these elements that the masked man is intent on something untoward in the room above the cold, dark, disquieting street.

Notes:

1. Atmosphere refers to the mood, tone or feeling.
2. More than one atmosphere may be identified in a creditable response as long as there is no contradiction. Examples of contradiction include romantic and scary, foreboding and happy…

Item 7

Commentary



Item 7 is a three-star item that tested achievement in CCEs 44 *Synthesising*, 50 *Visualising* and 46 *Creating, composing, devising*.

The item required students to imagine and then to explain what they would draw in the newly created panel 7 of the comic book.

Students were told the new panel had to be in keeping with the panels already presented and progress the story without introducing new characters. They had to explain what they would draw and why, with respect to consistency of style, what the established characters are doing and where they are.

An A-grade response needed to give a detailed description of what is to be drawn that is supported by an explanation. The explanation and description of the new single panel had to progress the story logically, introduce no new characters, use a setting that connected to the previous panels, account for both characters and consider how lighting is to be used. The response had to be consistent with the existing panels.

Some responses did not provide enough explanation or detail for the description of the drawing to be envisaged or understood. Responses that did not say how lighting was to be used in the new panel did not account for consistency of style (panels 1–6 each used yellow lighting) and so did not fully attend to the task.

Students should remember to follow all instructions in the stem carefully and use available planning space to help formulate their response.

Model response

Page 2 of the comic book is to be altered to contain two panels, positioned as shown on the opposite page. Imagine what you could draw in the newly created panel 7. It must be in keeping with the panels already presented and progress the story. No new characters are to be introduced.

Explain what you would draw in panel 7 and why, with respect to consistency of style, what the established characters are doing and where they are.

The drawing would be of the same apartment at night, still seen from the outside but with the apartment window as the main feature in the new panel. The window would have the yellow light spilling out of it to show, as do the previous panels, comfort and warmth. In the bottom right corner of the window the face of the man from panel 2 would be looking out down to the street as he knew he was being followed but now looks out as he feels safe inside. On the bottom right of the new panel the cloaked and masked man is seen walking away with only his back shown as he disappears into the gloomy night. The masked man knows it is a waste of time to continue to chase his victim who is now safe inside his apartment.

UNIT FIVE ITEM 7

Marking Scheme

PERFORMANCE DOMAIN	44 Synthesising	50 Visualising	46 Creating/**composing** /devising

A

The response gives a detailed description of what is to be drawn that is supported by an explanation.

It is evident from the explanation and the description that the new single panel to be drawn

- **progresses the story logically**
- **introduces no new characters**
- **uses a setting that connects to the previous panels**
- **accounts for both characters**
- **considers how lighting is to be used.**

The response is consistent with the existing comic book panels.

B

The response gives a description of what is to be drawn that is supported by an explanation.

It is evident from the explanation and the description that the new single panel to be drawn

- **progresses the story logically**
- **introduces no new characters**
- **uses a setting that connects to the previous panels**
- **accounts for one character**
- **considers how lighting is to be used.**

The response is consistent with the existing comic book panels.

OR

The response gives a description of what is to be drawn that is supported by an explanation.

It is evident from the explanation and the description that the new single panel to be drawn

- **progresses the story logically**
- **introduces no new characters**
- **uses a setting that connects to the previous panels**
- **accounts for both characters.**

The response is consistent with the existing comic book panels.

C

The response gives a description of what is to be drawn.

The description

- **progresses the story logically**
- **uses a setting that connects to the previous panels**
- **accounts for one character.**

D

The written response and supplementary material

- **progress the story**
- **include features that connect to previous panels**
- **account for one character.**

N

Response is unintelligible or does not satisfy the requirements for any other grade.

O

No response has been made at any time.

Notes:

1. **To account for a character, the response must indicate what the character is doing or where the character is positioned.**
2. **Ignore material in the draft space at the A-, B- and C-grades.**
   At the D-grade, treat material in the draft space as supplementary material.

Model Response:

The drawing would be of the same apartment at night, still seen from the outside but with the apartment window as the main feature in the new panel. The window would have the yellow light spilling out of it to show, as do the previous panels, comfort and warmth. In the bottom right corner of the window the face of the man from panel 2 would be looking out down to the street as he knew he was being followed but now looks out as he feels safe inside. On the bottom right of the new panel the cloaked and masked man is seen walking away with only his back shown as he disappears into the gloomy night. The masked man knows it is a waste of time to continue to chase his victim who is now safe inside his apartment.

Unit Six

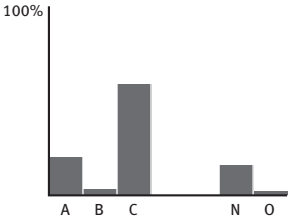
The items in this unit are based on an adapted copy of an advertisement used by a recruitment office. The advertisement was for the recruitment of engineers.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 8	20.3	3	58.7			16	1.9
Item 9	25.2	52.7	9.6			4.9	7.7
A shaded box indicates that the grade was not available for that item.							

Item 8

Commentary



Item 8 is a three-star item that tested achievement in CCEs 16 *Calculating with or without calculators*, 36 *Applying strategies to trial and test ideas and procedures* and 46 *Creating/composing/devising*.

The item comprised two parts. Part I of the item required students to calculate the first four terms of the expression given in the advertisement, resulting in the six-digit telephone number of the recruitment office.

Part II of the item required students to follow a set of guidelines to create a three-term expression that used whole numbers and had a value of 209871.

The cue instructed students not to use zero or one as either of the numbers.

An A-grade response needed to show the number 132901 for part I and provide an expression that correctly attended to each of the four guidelines for part II. There were a limited number of solutions to part II. These were based on the five factors of 52 (excluding 1). Their squares were the only numbers that could be correctly used beneath the square root sign. The use of addition (+) or subtraction (–) in the triangle determined the numbers able to be used in the rectangles.

Some responses to part I showed that there were errors with the calculation of the powers 2^{13} and 14^3. Some responses could not gain credit for part II as incorrect expressions were formed because the concept of order of operations was not applied correctly.

Students should revise basic mathematical concepts such as order of operations and know when to apply the concepts. In preparation for the test, students should practice using the approved calculator they will use in the test. For example, knowing how to make use of the necessary functions (such as the power function in this particular item) on their calculator is essential.

The six-digit telephone number of the recruitment office results from calculating the value of the first four terms of the expression:

$$\frac{9!}{3} + 2^{13} + 14^3 + 1005$$

Note that 9! = 9 x 8 x 7 x 6 x 5 x 4 x 3 x 2 x 1

I. Calculate the value of the expression and complete the sentence below.

The six-digit telephone number for the recruitment office is 132901 .

II. Follow the guidelines given and, in the response area below, create a three-term expression that uses whole numbers and has the value 209871.

Guidelines:

- the value of the expression is to be 209871
- the positions of the number '52', the division sign (÷) and the square root sign ($\sqrt{\ }$) cannot be changed
- use one of either an addition sign (+) or a subtraction sign (–) in the position shown by the triangle
- determine appropriate whole numbers (other than 0 (zero) or 1 (one)) for the positions shown by the two rectangles.

Working space.

Do **not** use 0 or 1 as either of the numbers.

209884 △ 52 ÷ $\sqrt{\ }$ 16 = 209871

UNIT SIX ITEM 8

Marking Scheme

PERFORMANCE DOMAIN	16 Calculating with or without calculators 36 Applying strategies to trial and test ideas and procedures 46 Creating/composing/devising

A	B	C	N
The response **for part I** • **shows 132901** ***AND*** **for part II** • **provides an expression that correctly attends to each of the four guidelines.**	**The response** **for part II** • **provides an expression that correctly attends to each of the four guidelines.**	**The response** **for part I** • **shows 132901.**	**Response is unintelligible or does not satisfy the requirements for any other grade.**

O
No response has been made at any time.

Notes:

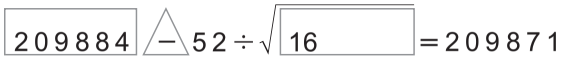
1. **In summary, the guidelines are:**
   – **the value of the expression is 209871**
   – **positions of '52', ÷, $\sqrt{}$ cannot be changed**
   – **use either + or - in the triangle**
   – **whole numbers only to be used in rectangles. Not 0 or 1.**
2. **List of all possible responses for part II:**

$209845 + 52 \div \sqrt{4}$	$209897 - 52 \div \sqrt{4}$
$209858 + 52 \div \sqrt{16}$	$209884 - 52 \div \sqrt{16}$
$209867 + 52 \div \sqrt{169}$	$209875 - 52 \div \sqrt{169}$
$209869 + 52 \div \sqrt{676}$	$209873 - 52 \div \sqrt{676}$
$209870 + 52 \div \sqrt{2704}$	$209872 - 52 \div \sqrt{2704}$

Model Response:

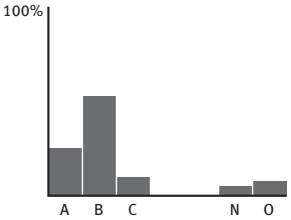
Part I
The six-digit telephone number for the recruitment office is 132901.

Part II



Item 9

Commentary



Item 9 is a two-star item that tested achievement in CCEs 38 *Generalising from information* and 48 *Justifying*.

The item required students to suggest two qualities in applicants that the recruitment office appeared to be targeting with the advertisement. The two qualities had to be completely different. For each quality, the students were asked to explain the relationship between the quality and the advertisement.

An A-grade response needed to show two clearly different qualities and then convincingly explain the relationship of each quality to the advertisement. Two common qualities that were cited included 'mathematical ability' and 'perseverance'.

Some responses had the same quality used twice and merely expressed in different ways. Only one of the qualities could gain credit as the stem explicitly stated that they had to be completely different. Responses that used job titles instead of qualities, e.g. engineer or mathematician could also gain no credit.

Students need to pay careful attention to the explicit directions given in the stems of items and ensure they are responding as directed.

Model response

With their use of the advertisement shown on the opposite page, the recruitment office appears to be targeting applicants with certain qualities.

Suggest two of these qualities. The two qualities must be **completely different**. For each quality, explain the relationship between the quality and the advertisement.

Quality: Mathematical ability

Relationship to advertisement: A person would need good maths ability to be able to complete the expressions in the advertisement to find the phone number.

Quality: Perseverance

Relationship to advertisement: A person would need to be prepared to persevere as they worked through all the calculations in the advertisement.

UNIT SIX ITEM 9

Marking Scheme

PERFORMANCE DOMAIN	38 Generalising from information	48 Justifying

A	B	C	N
The response • **gives two clearly different qualities that the recruitment office would be seeking** • **for each quality, convincingly explains the relationship to the advertisement.**	**The response** • **gives one quality that the recruitment office would be seeking** • **for that quality, convincingly explains the relationship to the advertisement.** **OR** **The response** • **gives two clearly different qualities that the recruitment office would be seeking.**	**The response** • **gives one quality that the recruitment office would be seeking.** **OR** **The response** • **explains a quality that the recruitment office would be seeking.**	**Response is unintelligible or does not satisfy the requirements for any other grade.**

O
No response has been made at any time.

Notes:

1. **For an explanation to be convincing there must be an explicit link to the advertisement.**
2. **A qualification or job title is not a quality.**

Model Response:

Quality: Mathematical ability

A person would need good maths ability to be able to complete the expressions in the advertisement to find the phone number.

Quality: Perseverance

A person would need to be prepared to persevere as they worked through all the calculations in the advertisement.

Unit Seven

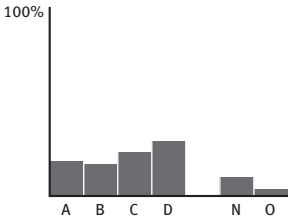
The items in this unit are based on a map showing the position of the Antonine Wall as well as diagrams and information about the Antonine Wall.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 10	18.4	16.9	22.7	28.7		9.7	3.7
Item 11	5.6	21.3	21	24.4	11.6	11.4	4.7
A shaded box indicates that the grade was not available for that item.							

Item 10

Commentary



Item 10 is a three-star item that tested achievement in CCEs 6 *Interpreting the meaning of maps* and 17 *Estimating numerical magnitude*.

The item required students to use Figure 1 (a map) to help estimate the area of the mainland between Hadrian's Wall and the Antonine Wall. They were instructed to clearly indicate the method they used.

The cues instructed students to show all steps, use pencil if working on Figure 1 and to round their estimate to the nearest 100 km^2.

An A-grade response needed to involve only the relevant area, i.e. the area between the two walls on the mainland, indicate that an appropriate strategy was used, explicitly apply the scale correctly and give an estimate of the area between 22400 and 24000 rounded to the nearest 100 km^2. No incorrect working could be used to obtain the area. Units did not need to be shown, but for the A-grade, if units were shown, they had to be the correct units.

Responses indicated that the two most commonly used strategies were using an overlay of rectangles to fit the required area and then finding the area of the rectangles and summing the existing whole squares and the number of 'whole' squares formed by combining fractions of squares. Some responses showed incorrect use of the scale, using the linear scale factor of 20 rather than the area scale factor of 400 per square.

Students should check the reasonableness of their answers. A revision of scale factors especially as applied to areas and volumes would benefit students preparing for the test.

Model response

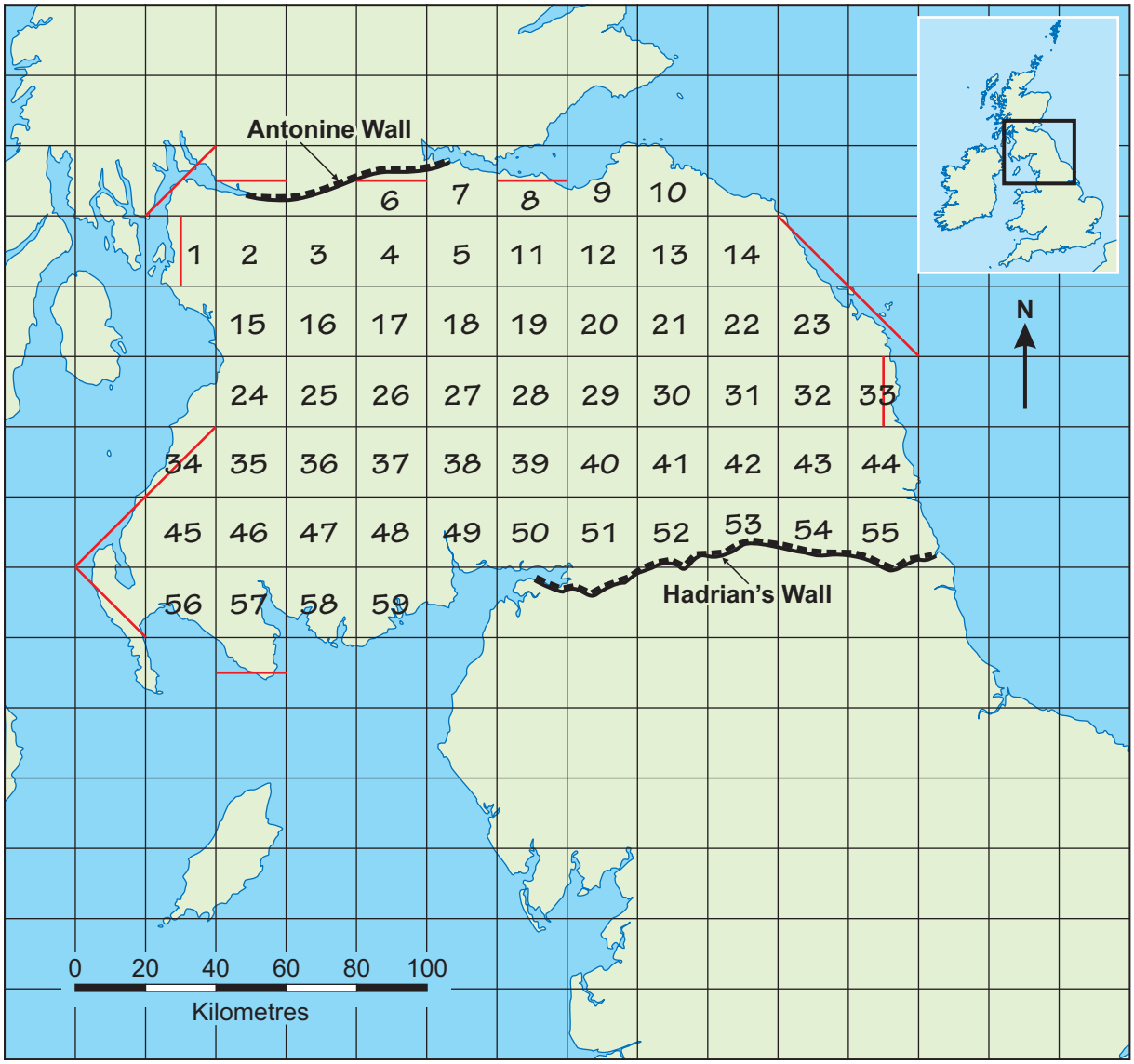


Figure 1: Hadrian's Wall and the Antonine Wall

Use Figure 1 to help estimate the area of mainland enclosed between Hadrian's Wall and the Antonine Wall. Clearly indicate your method. Consider Figure 1 as part of the response area.

Show all steps.

Use pencil if working on Figure 1.

Round your estimate to the nearest 100 km^2.

The numbers show the squares counted.

Any square more than half-covered has been counted.

Area is 59 squares x 400 = 23 600 km^2

UNIT SEVEN ITEM 10

Marking Scheme

PERFORMANCE DOMAIN	6 Interpreting the meaning of … maps …	17 Estimating numerical magnitude

A	B	C	D	N
The response • involves only the relevant area • indicates that an appropriate strategy is used • explicitly applies the scale correctly • gives an estimate of the area between 22400 and 24000, rounded to the nearest 100 km^2. **No incorrect working is used to obtain the area.**	**The response** • involves only the relevant area • indicates that an appropriate strategy is used • explicitly applies the scale correctly • allowing for at most one observable minor error, gives a consequentially correct estimate of the area.	**The response** • gives an estimate between 22000 and 24800. **OR** **The response** • gives the number of squares for the relevant area as between 56 and 60. **OR** **The response** • explicitly applies the scale correctly to give an area.	**The response** • gives an estimate between 21600 and 25200. **OR** **The response** • indicates that an appropriate strategy is used. **OR** **The response** • attends to the scale correctly.	**Response is unintelligible or does not satisfy the requirements for any other grade.**

O
No response has been made at any time.

Notes:

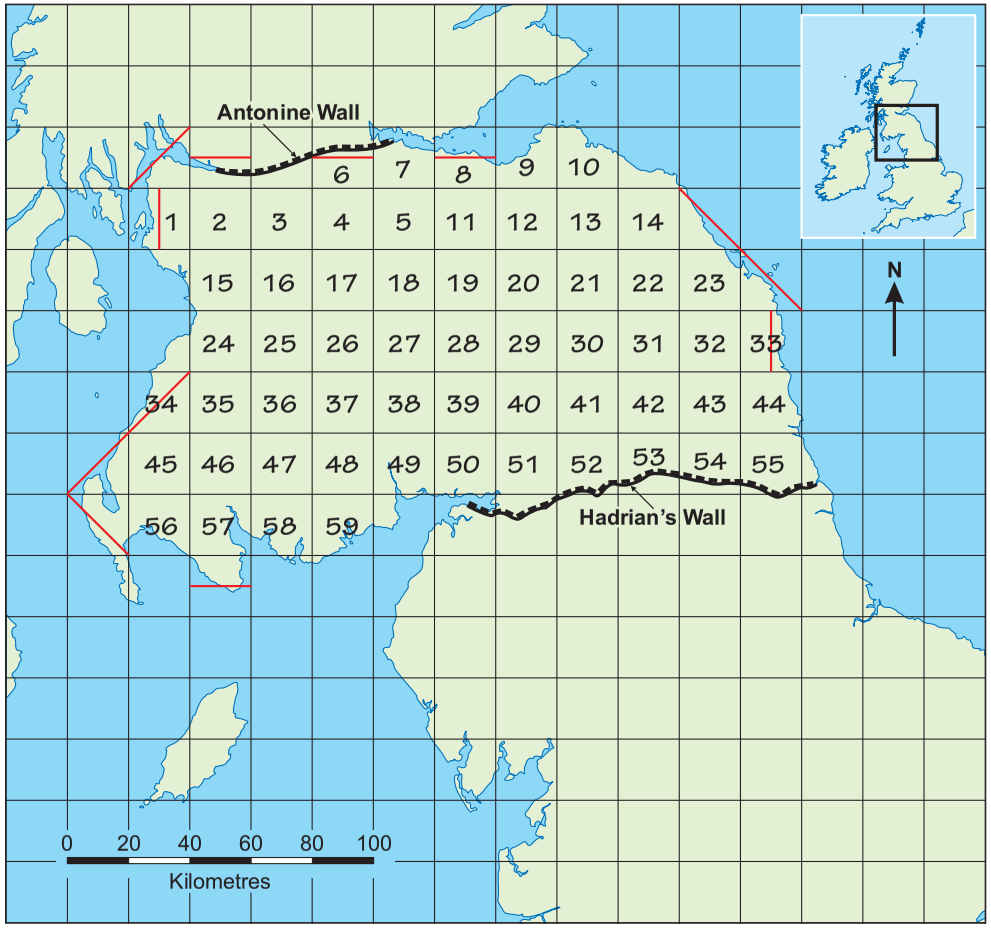
1. **The relevant area is for the mainland between Hadrian's Wall and the Antonine Wall.**
2. **All ranges stipulated are inclusive.**
3. **Rounding to the nearest 100 km^2 is only a requirement at the A-grade.**
4. **Showing units for the area is not a requirement. However for the A-grade only, if units are given in the answer they must be correct.**
5. **A minor error may include a single transcription error or an incorrect result to a correctly stated operation.**

UNIT SEVEN ITEM 10

Marking Scheme

Model Response:

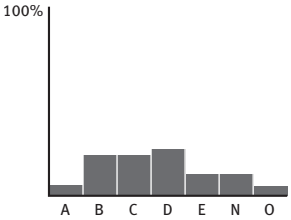
The numbers show the squares counted. Any square more than half-covered has been counted.
Area is 59 squares x 400 = 23600 km^2



Marking Unit 6 4 of 6

Item 11

Commentary



Item 11 is a four-star item that tested achievement in CCEs 29 *Comparing, contrasting*, 7 *Translating from one form to another* and 45 *Judging*.

This item comprised two parts. Part I required students to annotate a cross-sectional diagram of the Antonine Wall with the five features and five measurements printed in bold in the given description of the wall and its defences. Part II of the item required students to label a reproduction of the diagram with two positions, A and B. The positions had to be ones that the Romans may have contemplated for a field of lilia. Position A was to be the better of the two. Students had to compare the two positions and explain why position A would be a better placement than position B.

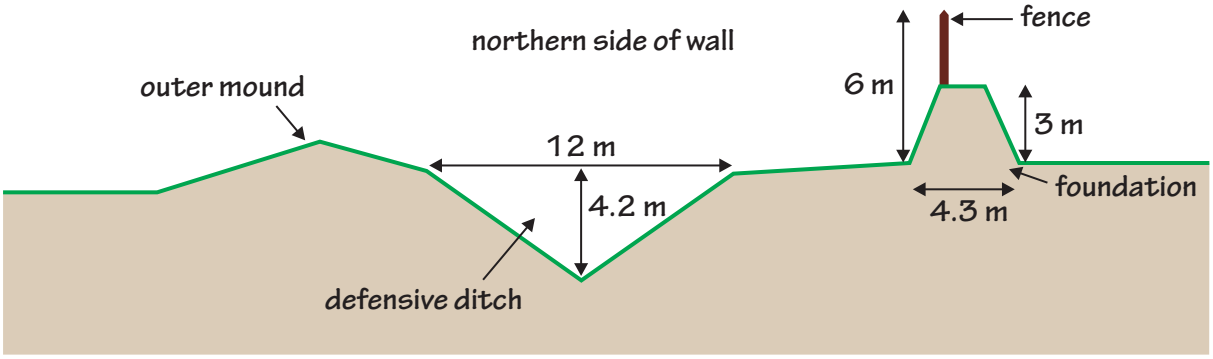
An A-grade response needed to show the ten notations correctly marked on the diagram, have positions A and B marked on the north side of the wall within the diagram and for each position establish a valid reason why it would assist in the defence of the wall. The response also had to provide a comparison to show position A is better than position B.

Some responses to part I showed that the nature of a cross-section had not been understood correctly (the width of the cross-section was interpreted as the length of the wall). Other responses indicated carelessness in terms of making sure all ten of the annotations were accounted for. Some responses in part II did not give a valid reason why each position would have been considered for the placement of a field of lilia or did not provide a comparison between the two positions.

Students need to remember that, when annotating a diagram with information provided in text, a systematic approach would reduce the likelihood of omitting relevant information. When asked to compare two positions, students need to be able to identify significant features of each and to identify similarities and differences, or strengths and weaknesses. They could then use these to make a statement as to why one position is preferred.

Model response

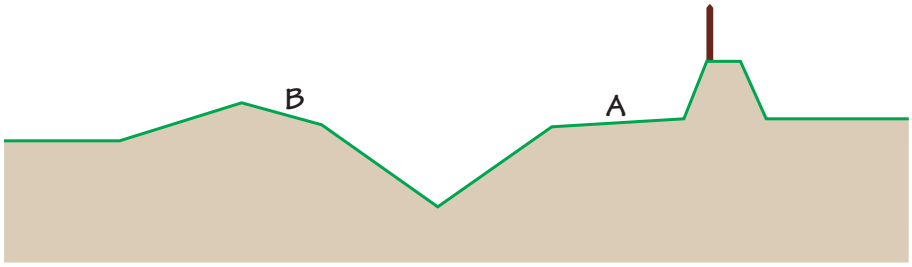
I. Indicate on Figure 2 where the features shown in **bold** in the description above are located. Also mark in the measurements. Use arrows if necessary to show the positions and measurements accurately.



not to scale

II. The Romans would position a field of lilia so that its deterrent effect would be maximised. Consider two potential positions for a field of lilia that the Romans may have contemplated.

On the Antonine Wall diagram (reproduced below), label as A the position you consider to be the better of the two. Label the other position as B. By comparing the two positions explain why position A would be a better placement for a field of lilia than position B.



not to scale

The best location for the lilia would be position A. The attackers would be within range of the spears of the Romans and would have just emerged from climbing the ditch. They would probably be breaking into a run on what they assumed would be open flat ground and would be likely to either stumble into the lilia or be slowed down by having to avoid them making them easy close-range targets. Position B is further from the wall, probably just within range of spears. It is exposed and within sight of the defenders. Invaders would not see the lilia until the last moment and would find it hard to safely negotiate a field of lilia. But position A is preferred because of its proximity to the defenders.

UNIT SEVEN ITEM 11

Marking Scheme

PERFORMANCE DOMAIN	29 Comparing, contrasting	7 Translating from one form to another	45 Evaluating

A	B	C	D	E
The response **for part I** • **shows the ten annotations correctly marked on the diagram** **AND** **for part II** • **has positions A and B marked on the north side of the wall within the diagram** • **for each position, establishes a valid reason why it would assist in the defence of the wall** • **provides a comparison to show position A is better than position B.** **No incorrect information is included.**	**The response** **for part I** • **shows eight annotations correctly marked on the diagram** **AND** **for part II** • **has positions A and B marked on the north side of the wall within the diagram** • **for a position, establishes a valid reason why it would assist in the defence of the wall** • **provides a comparison to show position A is better than position B.**	**The response** **for part I** • **shows the ten annotations correctly marked on the diagram.** **OR** **The response** **for part II** • **has positions A and B marked on the north side of the wall within the diagram** • **for each position, establishes a valid reason why it would assist in the defence of the wall.**	**The response** **for part I** • **shows eight annotations correctly marked on the diagram.** **OR** **The response** **for part II** • **has positions A and B marked on the north side of the wall within the diagram** • **for a position, establishes a valid reason why it would assist in the defence of the wall.**	**The response** **for part I** • **shows six annotations correctly marked on the diagram.** **OR** **The response** **for part II** • **has a position marked on the north side of the wall within the diagram** • **suggests why this position would assist the Romans.**

N	O
Response is unintelligible or does not satisfy the requirements for any other grade.	**No response has been made at any time.**

Notes:

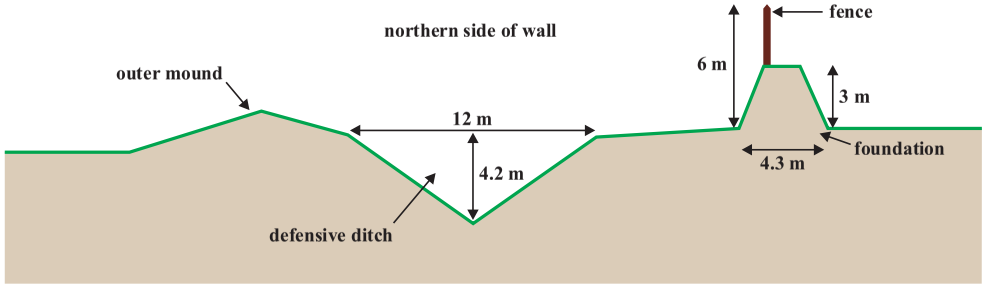
1. **The annotations refer to the features and measurements given in bold.**
2. **A valid reason is based on the intended deterrent effect of the lilia.**

UNIT SEVEN ITEM 11

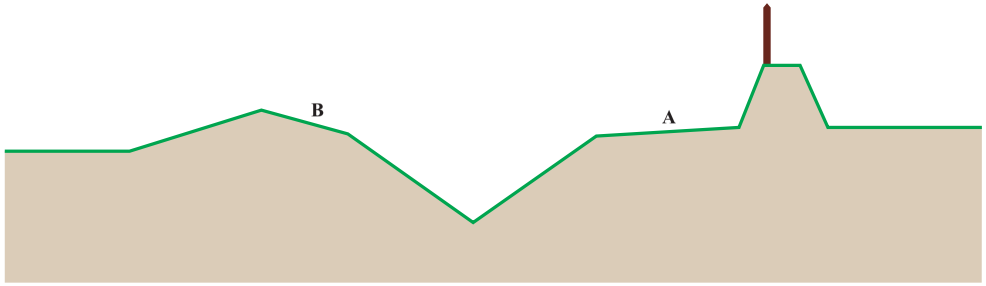
Marking Scheme

Model Response:

I.



II.



The best location for the lilia would be position A.
The attackers would be within range of the spears of the Romans and would have just emerged from climbing the ditch.
They would probably be breaking into a run on what they assumed would be open flat ground and would be likely to either stumble into the lilia or be slowed down by having to avoid them making them easy close-range targets.
Position B is further from the wall, probably just within range of spears. It is exposed and within sight of the defenders.
Invaders would not see the lilia until the last moment and would find it hard to safely negotiate a field of lilia.
But position A is preferred because of its proximity to the defenders.

Marking Unit 6 6 of 6

Unit Eight

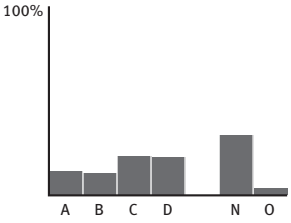
The items in this unit are based on an extract from a film script about a defence lawyer's representation of his client.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 12	12.9	11.5	20.9	19.8		31.5	3.4
Item 13	6.6	8.3	20.8	27.3	19.4	11.3	6.4
Item 14	12.8	27.6	26.4	12.2	7.2	5.8	8
A shaded box indicates that the grade was not available for that item.							

Item 12

Commentary



Item 12 is a three-star item that tested achievement in CCEs 52 *Searching and locating information* and 32 *Deducing*.

The item required students to outline the particular points the prosecuting lawyer would have put forward in the 'open-and-shut' case against the defence lawyer's client.

The cue directed students to respond in point form.

An A-grade response needed to provide a strong case for the four aspects of the prosecutor's case: serious assault, theft of the money, theft of the wallet and unlawful possession of the car. No incorrect information could be included.

Some responses provided a weaker case by using descriptions such as 'he hurt the victim' rather than indicating the seriousness of the assault or by being less than definite about the defendant's clear intention to steal the wallet or money by describing it as 'he picked up the money'. These types of responses did not attend to the part of the stem that said the prosecutor presented an 'open-and-shut' case, i.e. one in which there would be little doubt about the outcome.

Students should remember that careful reading of the stem is always a requirement if the best response is to be made. A cue to use point form indicates that the response does not need to be in sentences and should include the pertinent points in a very direct form.

Model response

Outline the particular points the prosecuting lawyer would have put forward in the 'open-and-shut case' against Fletcher's client.

Use point form.

- the man's arm and collar bone was shattered
- the man's money is stolen
- his wallet is taken
- the defendant tried to steal the man's car.

UNIT EIGHT ITEM 12

Marking Scheme

PERFORMANCE DOMAIN	52 Searching and locating … information	32 Deducing

A	B	C	D	N
The response provides a strong case for all four of • serious assault • theft of money • theft of wallet • unlawful possession of car. **No incorrect information is included.** **[4 is 4 strong]**	**The response provides a strong case for three of** • serious assault • theft of money • theft of wallet • unlawful possession of car. ***AND*** • a weak case for the other point. **No incorrect information is included.** **[4 is 3 strong + 1 weak]**	**The response provides a strong case for two of** • serious assault • theft of money • theft of wallet • unlawful possession of car. ***AND*** • a weak case for one other point. **[3 can be 2 strong + 1 weak or can be 3 strong]**	**The response provides a weak case for two of** • serious assault • theft of money • theft of wallet • unlawful possession of car. **[2 can be 1 strong + 1 weak] or can be 2 strong or can be 2 weak]**	**Response is unintelligible or does not satisfy the requirements for any other grade.**

O
No response has been made at any time.

Notes:

1. A *strong* case for the serious assault mentions the specifics of shattered arm and collarbone or uses a word meaning assault/ed, attack/ed, mugged, accompanied by a qualifier about the seriousness of the assault, e.g. vicious attack, badly beaten, severely injured, comprehensive mugging …
   A *weak* case for the serious assault uses a word meaning assault/ed, attack/ed, mugged without a qualifier or a comment such as 'he was hurt'.
2. A *strong* case for the theft of money mentions taking / stealing / thieving money (or cash or bills).
   A *weak* case for the theft of money is a comment on wanting / picking up / collecting money (or cash or bills) or taking personal belongings.
3. A *strong* case for the theft of wallet mentions taking / stealing / thieving wallet (or identification or ID).
   A *weak* case for the theft of wallet is a comment on wanting / picking up wallet (or identification or ID) or taking personal belongings.

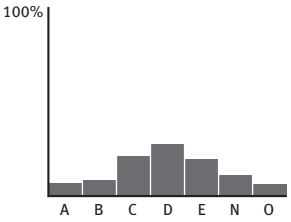
   NB 'Taking personal belongings' can only be used as being a weak case for one of the wallet or the money not both.
4. A *strong* case for the unlawful possession of car mentions that police came across 'brute' in the car or makes clear the 'brute' was in the other man's car.
   Taking / taking off in / stealing / thieving the car is also creditable as a strong case.
   A *weak* case for the unlawful possession of car is a comment connecting 'brute' and other man's car, e.g. he had the car keys …
5. 'Incorrect' information can include statements that
   — cannot be substantiated from a reading of the extract
   — are inconsistent with the extract
   — arise from a misreading of the situation as given in the introduction, i.e. that the prosecutor speaks first so does not rebut what Fletcher later says.

Model Response:

- the man's arm and collar bone was shattered
- the man's money is stolen
- his wallet is taken
- the defendant tried to steal the man's car.

Item 13

Commentary



Item 13 is a three-star item that tested achievement in CCEs 10 *Using vocabulary appropriate to a context* and 48 *Justifying*.

The item required students to give an appropriate adjective to describe each of four different characteristics that Fletcher attributes to his client in the extract and to provide evidence to justify their choice of adjectives.

The cue instructed students to avoid using adjectives from the extract, or made from words given in the extract. 'Avoid' means to keep away from.

An A-grade response needed to provide four acceptable adjectives none of which was derived from words in the extract and to provide pertinent evidence for each adjective.

Some responses gave nouns, verbs or adverbs instead of providing adjectives. These responses did not meet a requirement in the stem and so could not be considered for a creditable grade. Responses that gave adjectives which described negative characteristics of Fletcher's client did not consider the fact that Fletcher would have been trying to 'talk-up' the innocence of his client and so would only attribute positive characteristics to him.

Students should remember to attend to all parts of the stem and to follow instructions in the cues.

Model response

Give an appropriate adjective to describe each of four different characteristics that Fletcher **attributes** to his client in the extract. Provide evidence to justify your choice of adjectives.

Avoid using adjectives already in the extract, or made from words in the extract.

My client is … (adjective)	Evidence from the extract (use words and line numbers)
• innocent	'true victim is my client' (6)
• vulnerable	'walking home from church alone, in a frightening part of the suburbs' (8–9)
• honourable	'do what any respectable citizen would do' (15)
• caring	'your heart goes out to him' (20–21)

UNIT EIGHT ITEM 13

Marking Scheme

PERFORMANCE DOMAIN	10 Using vocabulary appropriate to a context	48 Justifying

A	B	C	D	E	N
The response provides • four acceptable adjectives — none is a derived adjective • pertinent evidence for each adjective.	The response provides • four acceptable adjectives — at most one is a derived adjective • pertinent evidence for each adjective.	The response provides • three acceptable adjectives — at most one is a derived adjective • a relevant connection for each adjective.	The response provides • two acceptable adjectives — each may be a derived adjective • a relevant connection for each adjective.	The response provides • an acceptable adjective — it may be a derived adjective • a relevant connection for that adjective.	Response is unintelligible or does not satisfy the requirements for any other grade.

O
No response has been made at any time.

Notes:

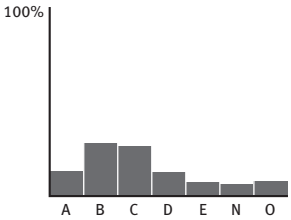
1. An acceptable *adjective*
   - is a word that is not already used in the extract
   - describes a quality Fletcher would have attributed to his client in order to make him appear as the victim. It would be a quality that would make the jury members more sympathetic towards him, e.g. the adjective 'imposing' (evidence: 'a 250-pound brute in a suit') would not be suitable as it would not help convince the jury that he could be the victim.
   - can be paired words, e.g. overly cautious, good willed, falsely arrested.
2. Pertinent evidence (requirement at A- and B-grades) comes from the extract and clearly explains the meaning of the adjective. It is not inconsistent with its contextual use in the extract.
3. Pertinent evidence looks like:
   - direct quote with or without line number/s
   - line number/s with clarifying paraphrase of the situation
   - line number/s only. The entire line/s must be the supporting evidence not merely a section of the line/s that the reader has to discern is the pertinent part.
4. A derived adjective is an adjective made from a word used in the extract, e.g. helpful is derived from help (word in extract), afraid is derived from fear (word in extract), kind-hearted is derived from heart (word in extract), frightened is derived from frightening (word in extract).
5. A derived adjective cannot be supported by either
   - a direct quote that contains the word it is derived from, e.g. helpful cannot use 'he went to get help'
   - line number/s only that contains the word it is derived from, e.g. afraid cannot use 'line 12'.
6. Relevant connection (requirement at C-, D- and E-grades) looks like:
   - a paraphrase of the situation that explains the meaning of the adjective without line number/s
   - line number/s only. Within the identified line/s there is a situation that explains the meaning of the adjective.
7. 'Pertinent evidence' meets the requirement for 'relevant connection'.
8. Where the same evidence is used for two or more adjectives, credit the use that would give the best outcome for the response. The other use/s of that evidence cannot be credited.
9. Where more than one entry is provided in a single cell, grade the first entry only.

Model Response:

My client is	Evidence from the extract
• innocent	'true victim is my client' (6)
• vulnerable	'walking home from church alone, in a frightening part of the suburbs' (8–9)
• honourable	'do what any respectable citizen would do' (15)
• caring	'your heart goes out to him' (20–21)

Item 14

Commentary



Item 14 is a four-star item that tested achievement in CCEs 42 *Criticising*, 33 *Reaching a conclusion which is consistent with a given set of assumptions* and 29 *Comparing and contrasting*.

The item required students to use information from the stimulus (a description of a court scene) as well as the additional information supplied to provide an effective argument about how well Fletcher conformed to three pieces of advice on ethics for defence lawyers.

The cue directed students to present their analysis effectively and logically and refer to the extract and the next scene.

An A-grade response needed to argue whether the pieces of advice were followed or not. The arguments presented had to be clear and unambiguous. An A-grade response also contained no inconsistencies.

Responses that gained creditable grades provided arguments that were well supported by details from the stimulus material. A range of arguments was acceptable: some responses stated that Fletcher conformed to all three pieces of advice; some claimed he did not; some argued that he conformed to some and not to others. While others stated an ambivalent view on the degree to which the lawyer conformed. If the arguments were presented logically and were not ambiguous all could be considered for the higher grades.

Some responses depended on a reader being able to guess at what the basis of the argument was and these responses could only be considered for a lower grade and then only if links were made to information from the extract and next scene.

Students should remember to give enough detail so the response is able to be understood without a reader having to refer to the stimulus material.

Model response

The outcome of the court scene is that Fletcher wins the case. The next scene in the movie shows Fletcher's client offering to return the suit that Fletcher had lent him for his court appearance. Fletcher tells his client to keep the suit as he will no doubt be needing it again.

Read the following pieces of advice on ethics for defence lawyers.

1. Never knowingly lie to the court.
2. Put your client's case forward as well as you can.
3. If you win the case and you then discover your client did commit the crime, never represent that person again.

Judging from the extract and the information supplied about the next scene, how well does Fletcher's behaviour conform to the three pieces of advice on ethics for defence lawyers?

Present your analysis effectively and logically.

Refer to the extract and the next scene.

Fletcher did not knowingly 'lie' to the court but he presented a different view of the incident. Fletcher does not deny that his client was involved in the incidents. When he suggests to the court that his client jumped into the man's Lexus to get help he is shaping the truth to suit his purposes, not lying.

The same can be said for him presenting his client's case to the best of his abilities.

He created an image of an innocent man to present to the court with statements that give reasonable motives for bad deeds, e.g. 'You want to help … you gather up the many bills he dropped.' He also created a physical image by dressing his client up in a suit to make him look respectable. Therefore he has put the client's case forward as well as he could.

When he tells his client to keep the suit after the court case it suggests that he has discovered that his client was guilty and he tells him he will be needing it again.

This indicates Fletcher won't represent him again. Therefore he has conformed to the third piece of advice.

UNIT EIGHT ITEM 14

Marking Scheme

PERFORMANCE DOMAIN	42 Criticising 33 Reaching a conclusion which is consistent with a given set of assumptions 29 Comparing, contrasting

A	B	C	D	E	N
For the three pieces of advice the response • argues effectively whether the advice is followed or not • supports the arguments with details from the extract and the next scene. No inconsistencies are evident.	For two of the pieces of advice the response • argues effectively whether the advice is followed or not • supports the arguments with details from the extract or the next scene.	For one of the pieces of advice the response • argues effectively whether the advice is followed or not • supports the argument/s with detail/s from the extract or the next scene.	For two of the pieces of advice the response • allows an ethical position to be inferred • makes reasonable links with the extract or the next scene.	For one of the pieces of advice the response • allows an ethical position to be inferred • makes reasonable links with the extract or the next scene.	Response is unintelligible or does not satisfy the requirements for any other grade.

O
No response has been made at any time.

Notes:

1. To argue effectively an argument is presented logically and is not ambiguous.
2. 'Detail' provides direct reference to a specific situation with explicit interpretation. The reader does not need to 'fill in any gaps'.
3. The arguments and links are based on the court scene, the acquittal or what is presented as happening in the next scene regarding the suit. The arguments are based on Fletcher's behaviour not on statements about lawyers in general.

Model Response:

Fletcher did not knowingly 'lie' to the court but he presented a different view of the incident. Fletcher does not deny that his client was involved in the incidents. When he suggests to the court that his client jumped into the man's Lexus to get help he is shaping the truth to suit his purposes, not lying.
The same can be said for him presenting his client's case to the best of his abilities. He created an image of an innocent man to present to the court with statements that give reasonable motives for bad deeds, e.g. 'You want to help … you gather up the many bills he dropped.' He also created a physical image by dressing his client up in a suit to make him look respectable. Therefore he has put the client's case forward as well as he could.
When he tells his client to keep the suit after the court case it suggests that he has discovered that his client was guilty and he tells him he will be needing it again. This indicates Fletcher won't represent him again. Therefore he has conformed to the third piece of advice.

Unit Nine

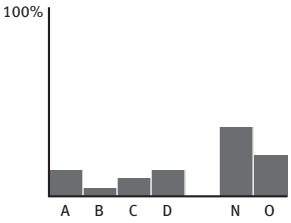
The items in this unit are based on information about take-off distances of planes and the factors that can affect them.

The following table shows the percentage of responses awarded the various grades for the items in this unit.

	A	B	C	D	E	N	O
Item 15	13.4	4.3	9.7	14		36.5	22
item 16	4.7	13.7	21.1	14	5.5	16.2	24.6
A shaded box indicates that the grade was not available for that item.							

Item 15

Commentary



Item 15 is a three-star item that tested achievement in CCEs 18 *Approximating a numerical value*, 15 *Graphing* and 16 *Calculating with or without calculators*.

The item required students to calculate an adjusted standard distance for take-off. This included finding a ratio, plotting the ratio onto the graph and determining the percentage adjustment required.

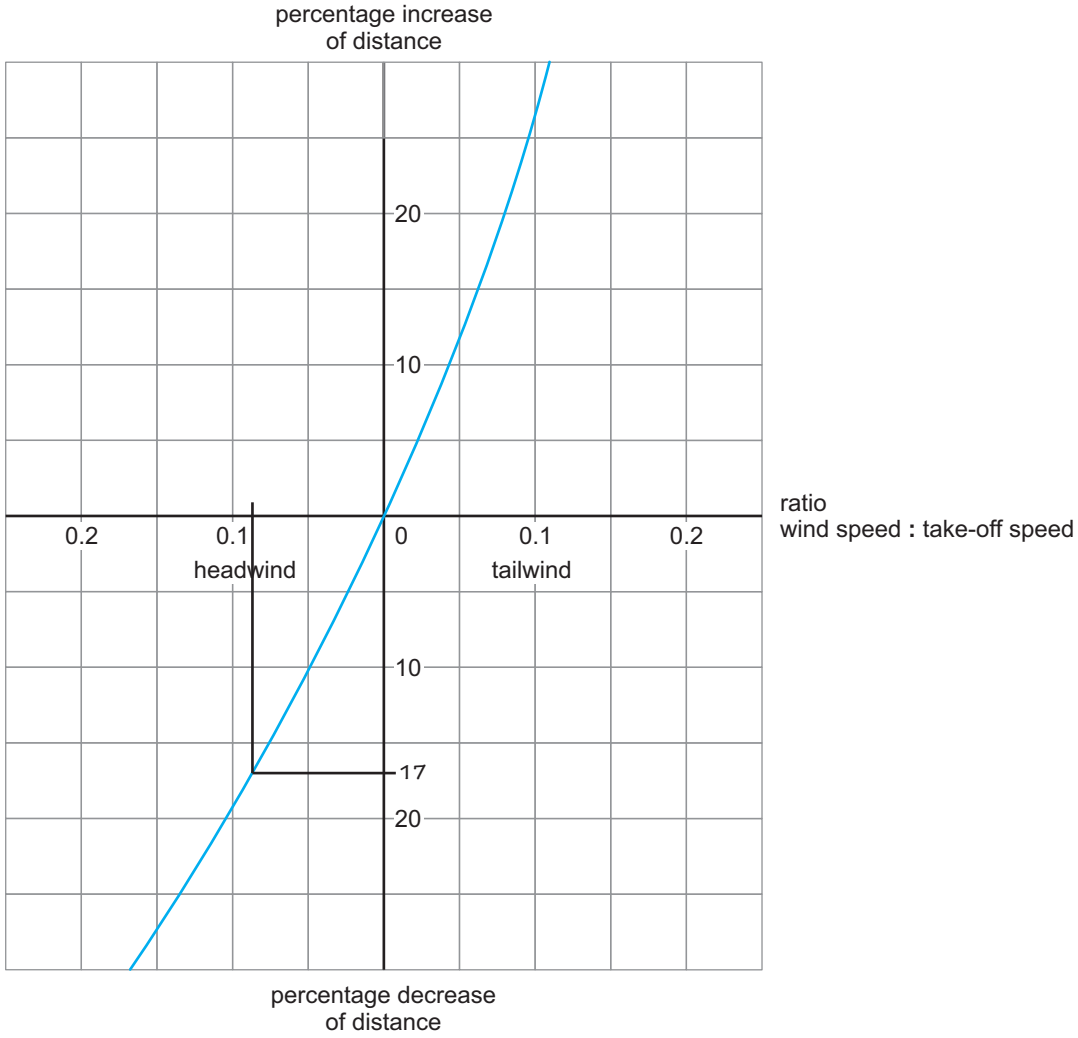
The cue instructed students to show all steps.

An A-grade response needed to show: correct wind speed to take-off speed ratio; correct use of the graph to read the percentage adjustment and use of the percentage to correctly adjust the standard take-off distance. All steps in the process had to be consistent with each other.

Some responses used a ratio that was the reciprocal of the correct ratio. The first mentioned part of a ratio is always the numerator when a ratio is written as a fraction. Some responses showed a poor estimate of the percentage adjustment read from the graph. This was the result of inaccurate plotting in most cases.

Students should remember that the cue 'show all steps' indicates that detail is required about how numbers, different from those given in the stimulus material appear in the solution. To this end all operations should be shown, not just the result of an operation. A sharp pencil and a ruler should be used when working on graphs to allow accurate drawing and reading from the graph.

Model response



ITEM 15 [***]

A plane whose standard take-off speed is 150 km/h will be taking off into a headwind of 13 km/h.

Calculate the distance required by this plane if, when there is no wind, it needs to cover 1600 m on a runway before taking off. Show all relevant markings on the graph.

Show all steps.

Use pencil when marking the graph.

Ratio of wind velocity to take-off speed = $\frac{13}{150}$ = 0.087

From graph this means percentage decrease in take-off distance is 17%.

Adjusted take-off distance is 83% of 1600 m = 0.83 × 1600 = 1328 m.

UNIT NINE ITEM 15

Marking Scheme

PERFORMANCE DOMAIN	18 Approximating a numerical value 16 Calculating with or without calculators	15 Graphing

A	B	C	D	N	O
The response provides • the correct wind speed to take-off speed ratio • correct use of the graph • correct appropriate working which leads to a take-off distance between 1312 and 1344 (inclusive). The calculation of ratio, markings on graph, percentage used, distance obtained must be consistent.	The response, allowing for at most one mechanical error and any consequentially correct working, provides • a wind speed to take-off speed ratio • use of the graph • appropriate working which leads to a decreased take-off distance. The calculation of ratio, markings on graph, percentage used, distance obtained must be consistent.	The response provides TWO of • the correct wind speed to take-off speed ratio • correct use of the graph consistent with a ratio given • appropriate working which leads to a percentage adjustment of the take-off distance.	The response provides ONE of • the correct wind speed to take-off speed ratio • correct use of the graph consistent with a ratio given • appropriate working which leads to a percentage adjustment of the take-off distance.	Response is unintelligible or does not satisfy the requirements for any other grade.	No response has been made at any time.

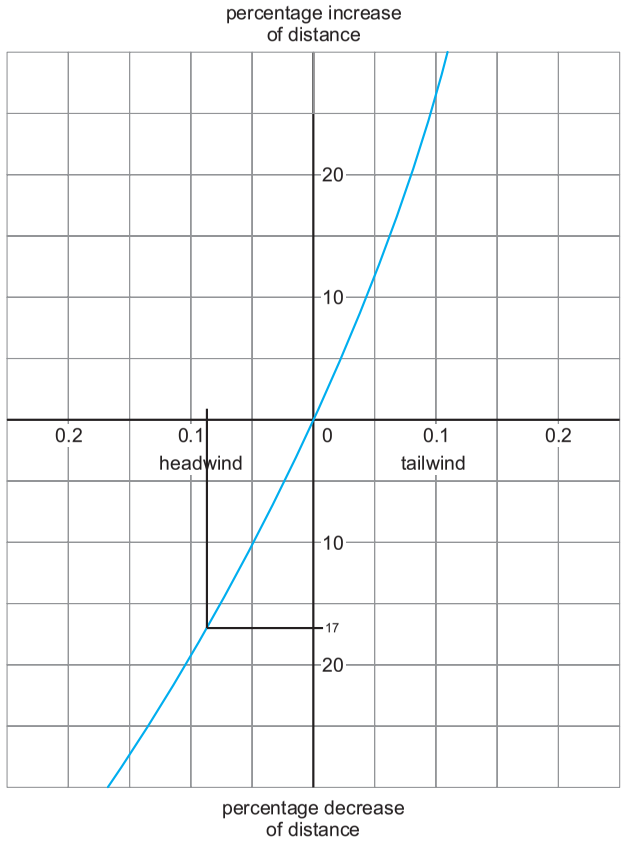
Notes:

1. Use of the graph involves marking/s on the graph (headwind side) that reveal an x-axis value has been used to obtain a percentage on the y-axis.
2. Correct use of the graph shows:
   - for the correct ratio (0.0867)
     — marking/s on the graph that reveal an x-axis value between 0.08 and 0.09 (inclusive) which is used to obtain a percentage between 16% and 18% (inclusive)
   - for other ratios given in the response
     — marking/s on the graph that reveal an x-axis value (one millimetre either side) which is used to obtain a percentage that is within 1% of the expected value
   - where lines are used from an axis to the graph they must be vertical or horizontal.
3. An error is mechanical if it is:
   - a transcription error
   - an incorrect result to a correctly stated operation
   - inappropriate rounding that changes the answer at the expected accuracy
   - inaccurate marking/s on the graph (headwind side) that reveal an x-axis value between 0.075 and 0.1 (inclusive) which is used to obtain a percentage between 15% and 19% (inclusive).

UNIT NINE ITEM 15

Marking Scheme

Model Response:



ratio
wind speed : take-off speed

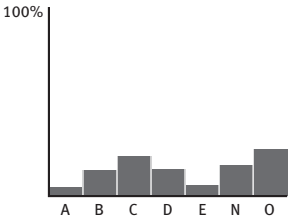
Ratio of wind velocity to take-off speed = $\frac{13}{150} = 0.087$

From graph this means percentage decrease in take-off distance is 17%.
Adjusted take-off distance is 83% of 1600 m = 0.83 × 1600 = 1328 m.

Marking Unit 4 4 of 5

Item 16

Commentary



Item 16 is a four-star item that tested achievement in CCEs 17 *Estimating numerical magnitude*, 48 *Justifying*, 44 *Synthesising*, 16 *Calculating with or without calculators* and 22 *Structuring a mathematical argument*.

The item comprised two parts. Part I required students to use the given method to demonstrate that the plane described would be unable to take off at the Mt Hotham airfield.

The cues instructed students to show all steps and to justify fully.

In part II, students were required to determine the temperature that must be reached for the plane from part I to just be able to take off from Mt Hotham airfield.

The cues instructed students to show all steps, give a clear explanation of their reasoning and to give the temperature to one decimal place.

An A-grade response, for part I, needed to provide correct mathematical justification to confirm that the plane would not be allowed to take off. A statement indicating the comparison the result was based on was required. For part II, the response needed to show a fully justified method used correctly to obtain the temperature which needed to be reached for the plane to just take off. The temperature had to be given to one decimal place.

For part I the most common comparisons used were the take-off distance compared to the runway length and the percentage of the runway required compared to the percentage permitted.

For part II, an error that occurred occasionally was that a temperature that had the correct numbers was given as a positive not a negative temperature as required.

Students should remember that a fully justified mathematical response requires written conclusions supported by correct mathematical calculations. They should attend to any cue given, so for this particular item, the final temperature should have been given correct to one decimal place. Trial and error methods showing details of the trials considered are acceptable but it should be noted that they can sometimes be very time consuming and may be unable to give an answer to the required degree of accuracy.

Model response

I. The Mt Hotham airfield is 1298 m above sea level and its runway is 1460 m long. For a plane to be permitted to take off from an airfield the take-off distance must not exceed 85% of the length of the runway. At sea level a particular plane's standard take-off distance is 910 m.

Clearly demonstrate that this plane would **not** be permitted to take off using the runway at Mt Hotham airfield. Assume there is no wind and the temperature is 0 °C.

Show all steps.
Justify fully.

Altitude adjustment for 1298 m above sea level

$= \frac{1298}{300} \times 10\% = 43.3\%$ increase to the standard take-off distance

Adjusted take-off distance $= 1.433 \times 910$ m $= 1304.03$ m

Permitted take-off distance = 85% of runway

$= 0.85 \times 1460$ m $= 1241$ m

As adjusted take-off distance of 1304.03 m exceeds the permitted take-off distance of 1241 m the plane cannot take off.

II. Assume that at Mt Hotham airfield there is no wind and the temperature is 0 °C. Find the temperature that would have to be reached so the plane from part I would **just** be permitted to take off using the runway at Mt Hotham airfield.

Show all steps.
Give a clear explanation of your reasoning.
Give the temperature to one decimal place.

The plane's take-off distance of 1304.03 m must be reduced to 1241 m so the temperature must be reduced such that 1% decrease comes from 1° C decrease.

Percentage decrease required $= \frac{(1304.03 - 1241)}{1304.03} \times 100\%$

$= 4.8\%$

If the temperature drops to −4.8° C the plane will be permitted to take off.

UNIT NINE ITEM 16

Marking Scheme

PERFORMANCE DOMAIN			
	17 Estimating numerical magnitude	48 Justifying	44 Synthesising
	16 Calculating with or without calculators	22 Structuring … a mathematical argument	

A	B	C	D	E	N
The response provides for part I • an argument with correct mathematical justification that confirms the conjecture • a comparative statement for part II • a fully justified suitable method • correct temperature to the nearest one decimal place.	The response, allowing for at most one designated error in each of parts I and II and consequentially correct calculations and working, provides for part I • an argument with mathematical justification that confirms the conjecture for part II • a suitable method • a temperature at the airfield.	The response, allowing for at most one designated error and consequentially correct calculations and working, provides for part I • an argument with correct mathematical justification that confirms the conjecture. OR The response provides, allowing for at most one designated error, consequentially correct calculations and working and for part II • a suitable method • a temperature at the airfield.	The response shows three pieces of the data from the stimulus used meaningfully.	The response provides for part I • two identified quantities that are used in a meaningful comparison that confirms the conjecture. OR The response provides for part II • recognition that the temperature must get colder to allow the plane to take off.	Response is unintelligible or does not satisfy the requirements for any other grade.

O
No response has been made at any time.

Model Response:

I. Altitude adjustment for 1298 m above sea level

$= \frac{1298}{300}$ x 10% = 43.3% increase to the standard take-off distance

Adjusted take-off distance = 1.433 x 910 m = 1304.03 m
Permitted take-off distance = 85% of runway
= 0.85 x 1460 m = 1241 m
As adjusted take-off distance of 1304.03 m exceeds the permitted take-off distance of 1241 m the plane cannot take off.

II. The plane's take-off distance of 1304.03 m must be reduced to 1241 m so the temperature must be reduced such that 1% decrease comes from 1° C decrease

Percentage decrease required $= \frac{(1304.03 - 1241)}{1304.03}$ x 100%
= 4.8%
If the temperature drops to -4.8° C the plane will be permitted to take off.

Notes:

1. The designated errors are:
   - transcription errors
   - an incorrect result to a correctly stated operation
   - inappropriate rounding that changes the answer at the expected accuracy
   - using a non-linear model in part I
   - using 40% increase of standard take-off distance (1274 m) from part I as the take-off distance of the plane for part II
   - in part II, working that reduces the take-off distance but quotes the derived temperature as a positive.
2. A suitable method in part II finds the percentage decrease of the altitude-adjusted take-off distance required for the plane to just take off.

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