

GENERAL COMMENTS

- 1 Candidates performed poorly this year. This is in spite of the fact that teachers and candidates knew beforehand that Ocean and Settlement Studies would be examined. It appears as if teachers do not know this section of the syllabus, or how to teach it.
- 2 Candidates lacked the basic knowledge needed to answer this paper. How to measure a beach profile must be taught. The practice of handing question papers and mark schemes to candidates must stop. Teach the knowledge first and then work through each paper with the candidates. We see every year the answers of the previous year's paper in the answers of the current year.
- 3 The key to this paper is that information the examiner gives must be applied. Candidates receive examples of the graph and they must apply the information given in the graph. Teachers must teach the candidates how to do so.
- 4 Most candidates struggle with the interpretation of graphs overall.

COMMENTS ON SPECIFIC QUESTIONS

- 1 (a) Fairly well answered. Many candidates provided at least two safety precautions.

Expected answers:

Consult tide tables/work at low tide/watch out for waves and currents
Watch out for slippery rocks/uneven groyne
Avoid working near foot of crumbling cliffs/wear hard hat
Wear protective clothing/clothing that is easily visible
Wear shoes to protect against sharp objects
Use sunblock
Take a cellphone in case of emergency/to call for assistance
Stay in groups/pairs

Not: work under teacher supervision/don't go into sea [3]

- (b) (i) Well answered as most candidates could draw the movement of pebbles by longshore drift correctly.

Expected answers:

1 mark for arrows linking pebble positions, i.e.
Direction of swash
Direction of backwash

1 mark max. if no arrow heads [2]

- (ii) Well answered. Most candidates labelled the directions correctly.

Expected answers:

Left box: direction of prevailing wind
Right box: direction of longshore drift

Both correct = 1 mark [1]

- (iii) Fairly well answered. A few candidates scored full marks. Many had some idea of how the process of longshore drift works.

Expected answers:

Wind drives waves/wave move in direction of wind
Waves come to the beach at an angle/oblique
Swash carries material up the beach
Backwash takes material back down the beach
Process is repeated with each wave

No credit for swash/backwash by themselves [3]

- (c) (i) Fairly well answered. A few candidates stated why the pebbles were painted.
Expected answers:
 Make them easy to see
 See how far or in what direction pebbles had moved Any 1 [1]
- (ii) Well answered. Most candidates completed the missing bar on the graph correctly.
Expected answers:
 1 mark for plotting and shading bar graph: 8
 Ignore shading
 1 mark for accurate pebble size: 4cm (4 squares) [2]
- (iii) Poorly answered. Most candidates could not interpret the data given in the graph.
Expected answers:
 Longshore drift moves pebbles along the beach (not down beach)
 Most pebbles/specific number of pebbles moved between 20-40 metres
 Accept any two groups between 10-50 m
 Smaller pebbles moved further than larger pebbles
 Mode is 20-30 m [3]
- (d) (i) Well answered as most candidates measured correctly.
Expected answers:
 1.5 (m) [1]
- (ii) Fairly well answered. Many candidates could use the data to draw in the bar on the graph.
Expected answers:
 1 mark for each bar
 5 m = 1.2; 10 m = 1.5
 1 mark max. if lines drawn on bars [2]
- (iii) Fairly well answered. Many candidates came to the correct conclusion. Some, however, struggled to prove their answer with the use of data.
Expected answers:
 Hypothesis is proven/groynes do reduce movement of material – Res. 1
 North side of groyne has bigger build up of material
 Distance from top of groyne to beach material is less on north side
 Groyne has less influence towards sea/more than 25-30 m away from point X
 Credit comparative data for N & S of groyne to 1 mark max. (not reserve)
 E.g. average measurement from top of groyne to beach = 1.1 to north 1.5 to south Res. 2

No credit for explanation, e.g. trapping material 1 + 2 [3]
- (e) (i) Poorly answered. Candidates did not know how a beach profile could be measured.
Expected answers:
 Establish eye level height on each pole and mark it with a piece of visible tape/top of pole
 Use tape measure to measure 10 m/distance between poles
 Put the two ranging poles at 20 m intervals across beach
 Hold the clinometer at arm's length and sight the visible marker
 Read the angle of deviation from the horizontal/measure the angle with the clinometer
 Record the angle on a recording sheet
 Repeat every 10 m along/up/down/across beach
 Take measurements on north and south sides of groyne [4]
- (ii) Poorly answered. Most candidates did not know how to make the comparison between the two beach profiles.
Expected answers:
 Steeper profile on the north side of groyne/gentler profile on the south side
 More uneven profile on the north side of the groyne/more even profile on the south
 North side of groyne is higher/south side lower

Answers must be comparative
Not more material on north side of groyne [2]

(iii) Poorly answered. Most candidates struggled to reach a conclusion about the hypothesis.

Expected answers:

Hypothesis is proven/groynes did/do affect the beach profile
Accept proven + hypothesis

Not proven by itself

[1]

(f) Poorly answered. Many candidates found it difficult to explain how they can improve the accuracy and reliability of the results. Only when they have the knowledge of how the measurements can be obtained, can they comment on improving methods.

Expected answers:

Do more profile measurements either side of the groyne/every 5 m
Do more profile measurements at different sites along beach/at other groynes on this beach/at sites where there are no groynes on this beach
Not on other beaches
Test if the results would be the same at different times of the year/days/conditions
Check accuracy of measurements for angle of profile/distance between ranging poles/from top of groyne to beach (What)
Check accuracy of measurement by doing more often and calculating average/more people involved/more people do all measurements (How)

1 'fallback' mark for check accuracy of measuring/check if measuring done correctly – if no other detail

Not check pebbles data

[3]

2 (a) Fairly answered. The majority of candidates mentioned how the amount of traffic is a problem in the centres of towns but failed to explain why it is a problem.

Expected answers:

How – Noisy/noise pollution
Congested/slows traffic
Air pollution
Lack of parking space

Why – Employment
Services/offices/shops located in centre
Historically small/narrow roads
Meeting point of roads

Not pollution on its own

Res 1 mark for each

[3]

(b) (i) Fairly answered. Many candidates stated only one instead of two reasons why the tally system is a suitable recording method.

Expected answers:

Fast recording method
Quick to total/read
More accurate than writing numbers
Easy to use
Easy to total/read
Efficient

Not just accurate on own. Easy is same as simple

[2]

(ii) Very poorly answered. The majority of the candidates did not know how to use the scale of the map effectively.

Expected answers:

Correct construction of proportional squares
S = 12mm x 12mm
U = 9mm x 9mm

Max 3 if incorrect shading

[4]

- (iii) Poorly answered. Most candidates failed to use the data in Table 4 to describe the change in traffic flow.

Expected answers:

Comments to reflect that total traffic generally decreases but credit development of further description – no explanation required

1 mark = simple decrease

2nd mark for further comment or data to support

[2]

- (c) (i) Poorly answered. Most candidates struggled to make a comparison between sites U and V. Many did not make use of the data to support the comparison successfully.

Expected answers:

That Site V always has more traffic than U

Comments should identify that both sites have more traffic flowing towards the centre at 08.30 than other times but then it decreases and at 16.30 the flow is greatest away from the centre

Max 1 mark if no comparative data

Max 3 if no V or U

[4]

- (ii) Poorly answered. Most candidates struggled to determine the width in millimetres for both towards and away from the centre.

Expected answers:

Site Q – Towards = 14 so 7mm

Away = 44 so 22mm

1 mark need both correct

[1]

- (iii) Poorly answered. Most candidates failed to calculate the percentage of traffic recorded as a proportion of the total.

Expected answers:

Percentage at R flowing towards at 08.30 is 26 vehicles out of 64 total therefore 40%/41% (actual = 40.625%)

Also accept 78%/79% as total of day i.e. R is 26/33

[1]

- (d) (i) Poorly answered. The majority of candidates did not know how traffic flow may be linked to land use in a town.

Expected answers:

Key is land use and changing traffic flow

E.g. Residential – traffic flow away in am and to in pm

E.g. Education – to in morning and away in afternoon

E.g. Stadium – event day traffic flow

[2]

- (ii) Poorly answered. Most candidates failed to describe a method the students could use to collect data about the land use of the town.

Expected answers:

Must be land use related

Ideas such as

Observe/ survey buildings

Organise in groups/divide town

Classify/function of buildings

Transect/systematic survey

Record/mapping

Land values

Etc.

Not people count or questionnaires = 0

[4]

- (e) Very poorly answered. The majority of candidates did not know how to come to a conclusion for the investigation. They did not provide data evidence and the critical evaluation of the data collection methods used was completely omitted.

Expected answers:

Hypothesis 1 = Proven; but depends on the route/direction

Hypothesis 2 = proven; but depends on location as the extent of the change

Credit data to support statements

Data collection evaluation include

Only one day

Only for 5 minutes

Single student may not be accurate

Depends on the location chosen

Evaluation comments can be positive too

Max 4 if no data used

[6]

POSITIVE SUGGESTIONS TO TEACHERS

- 1 There is a huge difference between Alternative to Practical (Geography) and Research (Development Studies). Answers that apply to Development Studies do not apply in Geography. Only with a concerted effort from both teachers and candidates, can the correct methodology be taught and mastered in Geography.
- 2 Teachers must teach the knowledge needed for this section of the syllabus first, before giving questions and answers.
- 3 Teachers are advised to teach the completion and drawing of graphs regularly. Practice makes perfect.
- 4 Candidates must be taught how to make conclusions, do evaluations or make comparisons.
- 5 Candidates must be taught how to read and answer questions. Teachers need to help them to determine what each question requires as answers.