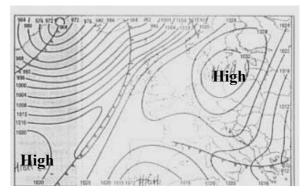
# Marking Scheme – Geography – Junior Certificate Higher Level 2004

# **Section 1 Folder Question**

20 Questions @ 3 marks each = 60 marks

- 1. 3 @ 1mark
  - 1,2,4 = 3 marks
- 2. 3 @ 1mark
  - (i) Location = I mark



- (ii) strong = 1 mk + rainfall and lower temperatures = 1 mk.
- 3A. 3 @ 1mark

Epicentre	С
Colliding Plates	A
Focus	В

Or

3B. 1 @ 3 mks

Chemical Weathering = 3 mks

- 4. 3 @ 1mark each
  - U.K, Ireland and Sweden
- 5. 3 @ 1 mark each

Trim	Defensive site near river
Limerick	Bridging point
Navan	Nodal point

6.A

1 correct = 2mks/2correct = 3mks Basalt in North East Limestone in Midlands <u>OR</u>

6.B 1 correct = 2mks/2correct = 3mks Market Hse/Diamond Castle (in ruins)

- 7. 3 @ 1 mark
  - (i) Age Sex/population pyramid = 1 mk
  - (ii)
    - □ Developing country = 1 mk
    - $\Box$  10% = 1mk
- 8. 1 @ 3 marks

1,2,4 = 3 mks

9. 3 @ 1 mark

Tax incentives/Educated workforce/Access to EU/Industrial peace

10 3 @ 1 mark each

Top line = Humus = 1 mk

Bottom line = Hardpan = 1 mk

Podzol = 1mk

11A. 3 @ 1 mark each

Corrie	C
Hanging Valley	A
Pyramidal Peak	В

Or

11B 3 @ 1 mark each

A	Sea Arch
В	Sea Cave/Notch
С	Sea Stack

12 1 @ 3marks

Frontal Rainfall = 3 mks.

13. 31@ 3marks

X is at the equator / Y is at the Arctic circle

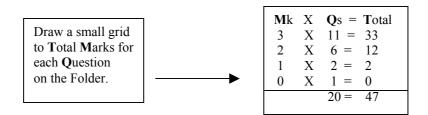
- 14. 3 @ 1mark each
  - (i)  $0.6^{\circ}$ C = 1 mk
  - (ii)  $1.4^{\circ}\text{C} 5.8^{\circ}\text{C} = 1 \text{ mk}$
  - (iii)  $CO_2$  emissions = 1 mk
- 15. 3 @ 1mark

3 (W) THIAIR	Organic		
Mineral matter	Water	Air	

- 16. 1 @ 3 mark.
  - 1,3,5 = 3 mks
- 17. 1 @ 3marks
  - (iii) = 3 mks
- 18. 1 @ 3mark
  - 5.8 6.2 kms = 3 mks
- 19. 3 @ 1 mark each

В	3
С	4
D	2

- 20. 3 @ 1 mark each
  - (i) Old age = 1 mk
  - (ii)
- □ Meander at Knocknagun Lough = 1 mk
- □ Silting /Deposition north of Ballina = 1mk



Please enter the folder total mark on the top right corner of the first page of the candidate's script. When entering the mark on the front grid enter it as F = 47 as per example above.

# Marking Scheme – Geography – Junior Certificate Higher Level 2004 Section 2

# **Question 1. URBAN GEOGRAPHY**

- **A.** Examine the table of Ireland's Fastest Growing Urban Centres (excluding Dublin). Figs. show % change in population between 1981 and 1996.
  - (i) Put in rank order the four fastest growing urban centres. (4)

Four centres @ 1 mark each

### Suggested answer.

1. Celbridge, 2. Maynooth, 3. Ashbourne, 4. Swords.

(ii) With reference to one Irish urban centre you have studied explain the factors, which lead to its development.

In your answer refer to:

- □ Economic Factors
- □ Social Factors
- □ Administrative Factors (12)

Three factors @ 4 marks each. (St 2mks + Dev 2mks)

#### Suggested answer.

#### **Economic Factors**

Dublin- Main focus of transport routes by road and rail to rest of country.

Irelands busiest sea port/airport located in Dublin- importing raw materials and exporting finished goods.

Irelands leading centre of manufacturing.

Chief commercial city- busiest shopping centres, dept stores, headquarters of many banks and commercial firms,

#### **Social Factors**

Migration of people from rural Ireland into Dublin since 1960's in search of jobs. Movement of inner city people to be re-housed in suburbs- led to growth of Dublin outwards

#### **Administrative Factors**

Dublin is the capital and chief civil service centre in the country, i.e. all the chief National Government Departments- Finance, Education. Agriculture arc housed there.

- **B.** Examine the diagram showing urban development and answer the questions that follow:
  - (i) What evidence is there that the local council has seen traffic management as an important element in the planning of this town centre? (4)

**Two pieces of evidence** @ 2 marks (St 1mk + Dev 1mk)

# Suggested answer.

Pedestrianised Streets/Areas, New car parks, Town center ring road, one way system and Bus Station

(ii) Suggest two reasons why the area marked B appears to be developing while the area marked A appears to be in decline. (4)

**Two reasons** @ 2 marks each – one for A and one for B.

### Suggested answer.

- A: Concentration of Charity shops/vacant premises- features of urban decline.
- B; Concentration of new pubs, wine bars, bistros, restaurants, specialist shops.
- (iii) In any town, which you have studied, explain one recent development, which helped to solve the problems of Urban Sprawl or Urban Renewal/Re-development.

(6)

Name of town @ 2 marks

#### Suggested answer.

Dublin/Cork/Galway/Limerick/etc.

**One Explanation** @ 4 marks (St 2mks + Dev 2mks)

(30 marks)

#### Suggested answer.

Local Authorities draw up development plans to control Urban Sprawl. This ensures the best use of available land and infrastructure.

Planning sets out to achieve balanced development- residential, services, and industrial estates that each are provided with essential services.

# **Question2.** WORLD POPULATION DISTRIBUTION

# A. "The population of the world is distributed unevenly across the earth's surface."

Examine the 0.5. map and answer the following questions.

- (i) Suggest one reason for the low population density in grid square G 25 15.
- (ii) Suggest one reason for the higher population density in grid square G 27 16.

(4)

Two reasons @ 2 marks each. (St 1mk + 1mk) (One for low and one for high)

#### Suggested answer.

- (i) Lowlying land near meandering river liable to flood.
- (ii) Land is higher in altitude (30 40 metres) and less liable to flooding. Residents prefer a rural site for peace and quietness. Houses are cheaper to build than in suburbs of Ballina.

**B.** With reference to a country that you have studied:

(i)

- □ *Name one region with a high population density.*
- □ Name one region with a low population density.

**(4)** 

**Two names** @ 2 marks each. (<u>One</u> for low and <u>one</u> for high) **Note:** If regions come from different countries give half marks 2<sup>nd</sup> region. e.g Name = 1mk.

#### Suggested answer.

Ireland- Dublin Region Ireland- West of Ireland

# **Question 2. (Continued)**

(ii)

- □ Describe and explain one reason for the high population density.
- $\Box$  Describe and explain one reason for the low population density. (12)

Two reasons @ 6 marks each. (St 2 mks +Dev 2mks + Dev 2mks)

(One for low and one for high)

**Note:** If reasons come from different countries give half marks for 2<sup>nd</sup> region. e.g. (Des 1mk + exp 1mk + Dev 1mk)

#### Suggested answer.

### Low Population Density

In West of Ireland most of the rural areas are mountainous with blanket bog. The land is poor for farming. This leads in time to fewer employment opportunities or social facilities. In turn this leads to migration of young adults from the area, leads to low marriage, low birth rates and very low population density.

#### **High Population Density**

Dublin is the Capital and attracts young people for employment opportunity in tertiary services, banking, insurance, and public service jobs.

Young people go there for education in 3<sup>rd</sup> Level Colleges like Trinity, UCD and DCU.

# C. "The density of population in an area has effects on the social and economic geography of that area."

Discuss two problems that might arise in an area of high population density or an area of low population density. (10)

Two problems @ 5marks each. (St 2mks + Dev 2mks + Dev 1mk)

(30 marks)

#### Suggested answer.

#### **High Population Density**

Bustee Dwellers live in temporary huts made from pieces of timber, canvas, plastic sheeting. Huts are shared, Pavement people, half million, no dwellings.

Shortage of clean water- pumps breaks down leaving dwellers without water for long periods. Pollution- Noise pollution, Visual pollution-garbage, Litter, sewerage.

#### Low Population Density

Abandonment of Agricultural Land- fewer people left to work the land and it thus falls into neglect. People who migrate are the energetic and the young and many farms are left in the care of older people who have not got the initiative to work it.

EU favours the reduction of farming in poor regions and the use of it for recreational purposes.

# **Question 3. GEOGRAPHICAL MIX**

## Answer three of the following A, B, C, D

# A. Physical Geography: Rocks

(i) Examine the diagram of a Volcano and name the parts A, B and C (3)

Three names @ 1 mark each.

#### Suggested answer.

- A. Magma Chamber
- B. Vent/Pipe
- C. Layers of Ash/Lava

# (ii) "Volcanoes result in the formation of Igneous Rocks." (3)

Select one Igneous Rock and explain how it was formed.

Name @ 1 mark

**Explanation** @ 2 marks

#### Suggested answer.

Granite: It formed when magma cooled deep within the earths crust.

Basalt: It formed when lava cooled on the surface.

### (iii) "Rocks are useful for economic activities."

Name and explain **two** ways rocks may be used in economic activities. (4)

Two ways @ 2 marks. (Name 1mk + Exp 1mk)

Rock type need not be named

### Suggested answer.

Limestone: Builders use blocks of limestone in the construction of buildings, Farmers use

ground up limestone as a fertilizer. Used to make cement

Granite: Used as a. building stone for buildings and monuments.

Marble: To make headstone and ornaments.

# B. Energy

(i)

Name two areas off the Irish Coast where natural gas has been found.

Two areas @ 1mark each

#### Suggested answer.

Old Head of Kinsale/Celtic Sea/Cork coast Corrib Field off Mayo coast.

□ Name a major source of natural gas elsewhere in Europe.

Name @ 1 mark

### Suggested answer.

Groningen in the Netherlands/North Sea

 $\Box$  A gas interconnector links Ireland to which other country? (4)

Name @ 1 mark

### Suggested answer.

Britain / England / Scotland

(ii) "The discovery of natural gas in an area has positive and negative effects."

Describe and explain one positive and one negative effect of a gas discovery on an area. (6)

Two effects @ 3 marks each. (St 2mks + Dev 1mk)

#### Suggested answer.

Positive
Natural Gas can be used to provide.
Domestic heating – reduce need for oil
Generate electricity

New industries might damage beauty of area. Demand for housing will cause rise in prices Rise in cost of living

### C. Fishing

(i) Describe the trend shown by the figures in the table.

One description @ 2 marks. (St 1mk + ref to fig. 1mk)

#### Suggested answer.

The tonnes of both cod and herring caught has decreased from 1997 to 2000.

Eg. Cod catch decreased by 2778 tonnes.

Herring decreased by 15041 tonnes.

(ii) Explain two reasons why over-fishing has occurred in Irish waters. (4) **Two Explanation** @ 2 marks. (St 1mk + Dev 1mk)

### Suggested answer.

In the 1960/70's as boats became larger and with the improvements in technology, catches became bigger~ led to over fishing and stocks were wiped out increased numbers of foreign factory ships.

- (iii) "The Irish Box is a method of conserving fish stocks."
  - □ Apart from Ireland and the UK, name **one other** country whose vessels fish in the Celtic Sea. (2)

Name @ 2 marks

### Suggested answer.

Spain/France

□ Name and describe **one** other method, which might be used to conserve fish stocks.

(2)

(2)

Name and Description @ 1 mark each.(N 1mk + Des 1mk)

#### Suggested answer.

The EU sets quotas limiting the amount of fish each of its members may catch.

Waters within 10km of the Irish coast may be fished by Irish boats only.

10-20km of our coast is fished by boats from Ireland and other EU countries.

Net mesh sizes must be large enough to allow young fish to escape.

#### D. Weather

Examine the diagram of the weather station.

(i) Name any four of the weather instruments labelled as follows: A, B, C, D, E, F (4)

Four names @ 1 mark each.

#### Suggested answer.

A- Anemometer B-Wind vane

 $C\text{-}Barograph \, / \, Barometer$ 

D-Campbell Stokes Recorder

E-Rain Gauge

F-Stevenson Screen

(ii) Explain how you would use any two of the instruments to record the weather. (4)

Two explanations @ 2 marks each.( St 1mk + Dev 1mk)

### Suggested answer.

Anemometer- measures the speed of wind; the number of rotations indicates wind speed, which is recorded on a speedometer.

A wind vane shows wind direction, if the arrow end points north- northerly wind.

A barometer is used to measure atmospheric pressure. The barograph records changes in atmospheric pressure over a span of one week

A rain gauge is used to measure precipitation each day and measurement is taken in millimetres and the results recorded.

(iii)	Explain why accurate weather forecasts are important for any two of the following:		
			(2)
		Farmer	
		Long Distance Lorry Driver	
		Airline Pilot	
		Crew of a Trawler	(30 marks)

Two explanations @ 1 marks each.

# Suggested answer.

Farmer needs to know that the weather will be dry in late summer/ autumn before he begins to harvest crops.

Long distance lorry driver. Needs to know what type of weather to expect, ie. rain, frost, snow, sunshine over his long journey.

#### Airline Pilot

An airline pilot likes to know the weather forecast in case flights have to be delayed, postponed due to bad weather, which may threaten take off/ landing at a particular airport.

#### Crew of a Trawler

May not put out to sea if dangerous gales are forecast.

# **Question 4. ORDNANCE SURVEY AND AERIAL PHOTOGRAPH**

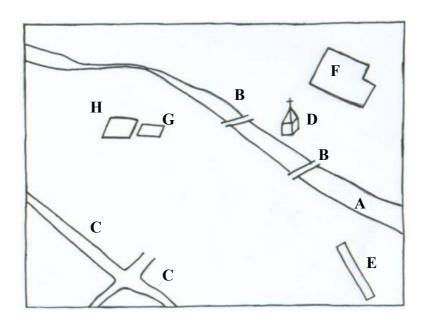
Study the O.S. map, legend (key) provided and the Aerial Photograph.

(note: location on the photograph should be given using right foreground, left background, etc.)

- **A.** Draw a sketch map of the area shown on **the Aerial Photograph**. Show and name the following:
  - □ *The river Moy and two bridges.*
  - □ Two connecting streets.
  - □ *Church with a spire.*
  - □ An Industrial Estate.
  - □ *An area of terraced housing.*
  - □ *A shopping centre and car park.*

(12)

#### Suggested answer.



A = River Moy =	1 mk
B = 2  bridges =	1mk + 1mk
C = 2 connecting roads =	1mk + 1mk
D = Church with spire =	1 mk
E = Terraced housing =	1mk
F = Industrial estate =	1mk
G = Shopping centre =	1mk
H = Car park =	1mk
Shape of sketch =	1mk
Orientation of sketch	1mk
Total =	12 marks

# B. The town of Ballina provides a variety of services.

With reference to the O.S. map only describe three of these services.

(12)

Three description @ 4 marks each. (St 2mks + Dev 1mk + Evid 1mk)

#### Suggested answer.

Educational- Schools — G.238 194
Fire Station~ Prevents fire spreading — G24S 192
Religious - Priory- G248188
Railway Station — G241183
Tourist information — G250190
Garda Station — G246189

# **Question 4 (continued)**

- C. It is proposed to re-develop the areas of derelict land on both sides of the river in the right centre of the photograph.
  - (i) Suggest a suitable use for this land.

Use @ 2marks

### Suggested answer.

Leisure centre

Riverside apartments and shops.

(ii) Explain two reasons for your choice.

(6)

Two Reasons @ 2marks

# Suggested answer.

Flat land- large enough for centre and for car park. Good nearby roads- which customers can use to get to centre.

# **Question 5. WORLD INEQUALITIES**

# Population statistics for selected countries.

A.

(i) Name two Developing Countries in the list above.

(2)

Two names @ 1 mark each

# Suggested answer.

Malawi, India, Morocco, Peru, Argentina

(ii) Explain two reasons for your choice.

(6)

**Two reasons** @ 3 marks each. (St 2mks + Dev 1mk.) (ref to figures for full marks.)

### Suggested answer.

Malawi- high birth rate 54 per thousand India- high birth rate 31 per thousand Whereas Ireland has a birth rate of 16 per thousand.

GNP per capita is low Malawi-180 dollars India —340 dollars

- **B** Many factors are responsible for preventing economic development, these include:
  - Climatic Change
  - Population Growth
  - □ Arms Expenditure
  - □ War
  - Colonisation

Explain how any **three** of the above factors prevented economic development in a country you have studied. (12)

Three explanations @ 4 marks each. (St 2mks + Dev 2mks)

### Suggested answer.

Ethiopia

Climate Change

Suffers from long periods of drought, crops fail, and farm animals died. Resources diverted from development projects to feed hungry.

#### Population Growth

Population growing each year. Rapid population growth causes some areas to be over populated- i.e. have too many people for the limited resources available.

## Arms Expenditure

War torn country. Government fighting against rebel groups, particularly in Tigray and Eritrea.

#### War

Young Ethiopians forced to fight die during war. There is damage to crops, roads, bridges, and towns. No money left for development. To buy arms- governments go into debt.

#### Colonisation

In the past, colonists controlled the best land and provided cash crop for export rather than basic food to feed natives. Land now under the control of local Elite who spend money on their armed forces.

- **C.** Examine the advertisement for GOAL seeking aid for Ethiopia.
  - (i) Describe the type of aid the people of Ethiopia need immediately.

One Description @ 5 marks. (St. of type 2mks + Dev2mks + Dev 1mk)

# Suggested answer.

Emergency Aid

This aid is given in times of crisis such as an earthquake, Famine to prevent people from dying and is usually in the form of rescue personnel, food, medicine and tents for housing.

(ii) Describe the type of aid, which will be needed for future development. (10)

One Description @ 5 marks. (St. of type 2mks + Dev2mks + Dev 1mk)

#### Suggested answer.

Development Aid / Bilateral / Multilateral

This is aid, which is donated over a long period of time for improving Agriculture, Health services, Education facilities, Communications and Energy supplies. The donor can give money or send skilled people such as teachers, doctors to train native people.

# **Summary Marking Scheme**

Ques	stion 1.	URBAN GEOGRAPHY	
<b>A.</b>	(i) Four cent	res @ 1mark each	(4)
	(ii) Three fac	etors @ 4 marks each.(St. 2mks + Dev 2mks)	(12)
В.	(i) Two piece	es of evidence @ 2 marks each. (St 1mk + Dev 1mk)	(4)
	(ii) Two reas	ons @ 2 marks each (St 2mks)	(4)
	, ,	town @ 2 marks	· /
	(ii) One expla	anation @ 4 marks (St 2mks + Dev 2mks)	(6)
Ques	stion 2.	WORLD POPULATION DISTRIBUTION	
A.	Two reasons	@ 2 marks each.(St 1mk+Dev 1mk)(one for low and one for high)	(4)
B.		es @ 2 marks each. (one for low and one for high)	(4)
	` '	ons @ 6 marks each. (St 2mks + Dev 2mks + Dev 2mks)	(12)
<b>C.</b>		<b>blems</b> @ 5 marks each (St 2mks + Dev 2mks + Dev 1mk)	(10)
Oues	stion 3.	GEOGRAPHICAL MIX	
<b>C</b>		REE of the following A, B, C, D	
Mark		by candidates, but credit marks for the best <b>three</b> only. Square brac	ket the
	is question	of canadates, out erealt mains for the east three only. Equals of the	
F	1		
A.	(i) Three nan	mes @ 1 mark each	(3)
1.4	· /	1 marks + <b>Explanation</b> @ 2marks	(3)
	(11)1 (111111 (11)	2 <b>p</b>	(0)
B.	(i) Two areas	s @ 1mark each + Two names @ 1 mark each	(4)
	* *	ts @ 3 marks.(St 2mk + Dev 1mk).	(6)
			( )
C.	(i) One descr	ription @ 2 marks. (St 1mk + ref to fig. 1mk)	(2)
		anations @ 2 marks each. (St 1mk + Dev 1mk)	(4)
	(iii) Name @	· · · · · · · · · · · · · · · · · · ·	(2)
	` '	<b>Description</b> @ 1mk + 1mk	(2)
D.		nes @ 1 mark each	(4)
2.	* *	anations 2marks each (St 1mk + Dev 1mk)	(4)
	` '	lanations @ 1 mark each	(2)
	(m) I wo exp	ianations (a) I mark each	(2)
Que	stion 4.	ORDNANCE SURVEY AND AERIAL PHOTOGRA	PH
<b>A.</b>	Twelve items	s @ 1 mark each	(12)
В.	Three descrip	ptions @ 4 marks each. (St 2mks + Dev 1mk + Evid 1mk)	(12)
<b>C.</b>	(i) One use @	0 2 marks	
	(ii) Two reas	ons @ 2 marks	(6)
Ques	` '	WORLD INEQUALITIES	
A.		s @ 1 mark each.	(2)
-	` '	ons @ 3 marks each(St 2mks + Dev 1mk)	(6)
B.	` '	nations @ 4 marks each (St 2mks + Dev 2mks).	(12)
<b>С</b> .	-	ription @ 5 marks. (St. 2mks + Dev 2mks + 1mk)	(+ <b>~</b> )
•	` '	ription @ 5 marks. (St. 2mks + Dev 2mks + 1mk)	(10)
	(-) 40001	-r (-) (-)	()