



Oxford Cambridge and RSA

## AS Level Geography

H081/02 Geographical debates

Resource Booklet

**Thursday 24 May 2018 – Morning**

**Time allowed: 1 hour 30 minutes**



### INFORMATION FOR CANDIDATES

- The questions tell you which resources you need to use.
- This document consists of **8** pages.

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### INSTRUCTIONS TO EXAMS OFFICER/INVIGILATOR

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**Fig. 1 – Table showing carbon dioxide emissions in 2013 (metric tons per capita) and one stage of the standard deviation calculation**

Country	CO <sub>2</sub> emissions (metric tons per capita)	(x - $\bar{x}$ ) <sup>2</sup>
Argentina	4.5	6.0025
Brazil	2.5	19.8025
Italy	5.7	1.5625
Russia	12.5	30.8025
Saudi Arabia	17.9	119.9025
Sudan	0.3	44.2225
United Kingdom	7.1	0.0225
United States of America	16.4	89.3025
Vietnam	1.7	27.5625
Zimbabwe	0.9	36.6025

$$\text{Standard Deviation Formula} = \sqrt{\frac{\sum (x - \bar{x})^2}{n}}$$

**Fig. 2 – Table showing neonatal mortality\* rates per 1000 live births in 2013 and one stage of the standard deviation calculation**

Country	Neonatal mortality* rate	(x - $\bar{x}$ ) <sup>2</sup>
Afghanistan	36.8	201.0724
Brazil	10.3	151.7824
Chile	5.2	303.4564
Democratic Republic of the Congo	31.2	73.6164
India	29.5	47.3344
Mozambique	28.4	33.4084
Pakistan	47.4	614.0484
Sudan	30.9	68.5584
United Kingdom	2.7	396.8064
United States of America	3.8	354.1924

*\*Number of deaths during the first 28 days of life per 1000 live births*

$$\text{Standard Deviation Formula} = \sqrt{\frac{\sum (x - \bar{x})^2}{n}}$$

**Fig. 3 – Table showing amount of cargo imported via oceans (millions TEUs\*) in 2014 and one stage of the standard deviation calculation**

Country	Amount of cargo imported via oceans (millions TEUs)	$(x - \bar{x})^2$
Australia	2.5	13.8384
China	14.7	71.9104
Germany	3	10.3684
India	2.4	14.5924
Indonesia	3.2	9.1204
Japan	6.6	0.1444
South Korea	5.1	1.2544
United Kingdom	2.6	13.1044
United States of America	19.6	179.0244
Vietnam	2.5	13.8384

\*TEU = Twenty-foot Equivalent Unit – a standard shipping container

$$\text{Standard Deviation Formula} = \sqrt{\frac{\sum (x - \bar{x})^2}{n}}$$

**Fig. 4 – Table showing Global Food Security Index Score in 2016 and one stage of the standard deviation calculation**

Country	Global Food Security Index Score	$(x - \bar{x})^2$
Argentina	68.3	151.7824
Bangladesh	36.8	367.8724
Haiti	29.4	706.4964
Indonesia	50.6	28.9444
Qatar	77.5	463.1104
Sudan	34.7	452.8384
Tanzania	36.9	364.0464
United Kingdom	81.9	671.8464
United States of America	86.6	937.5844
Vietnam	57.1	1.2544

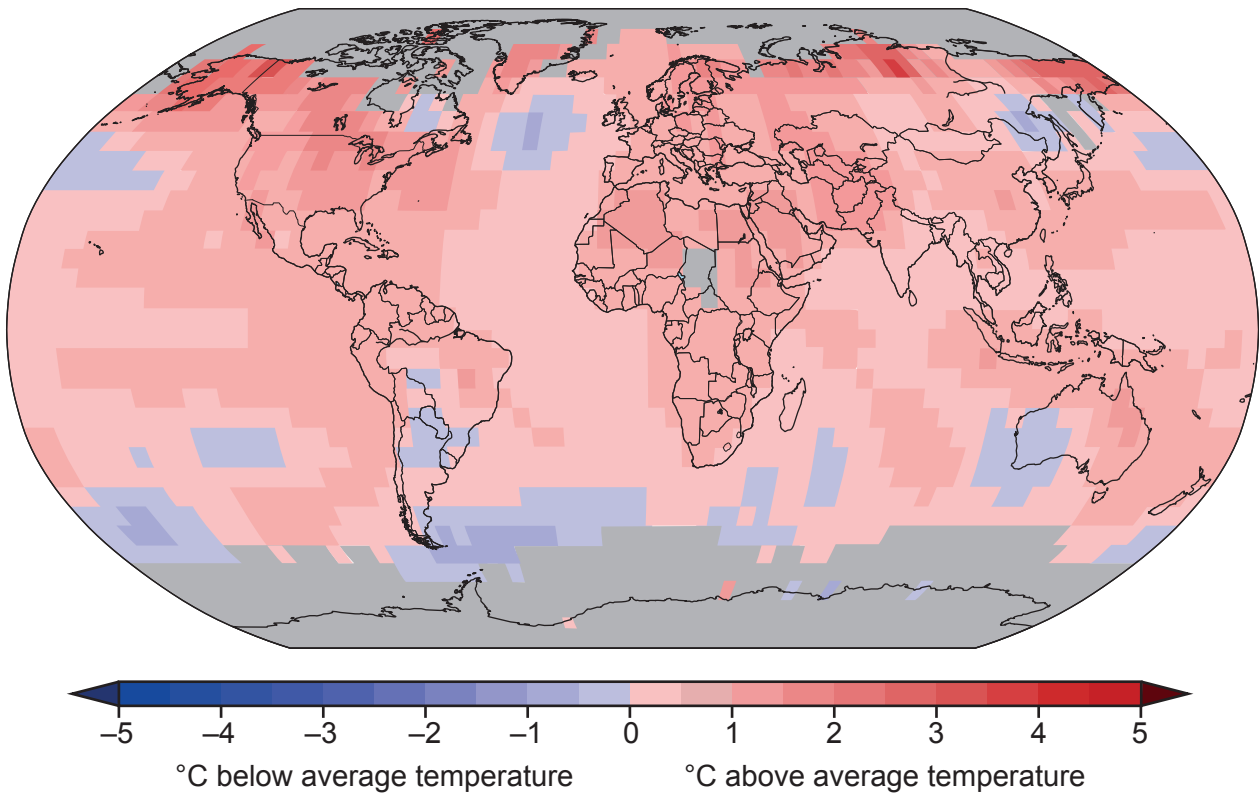
$$\text{Standard Deviation Formula} = \sqrt{\frac{\sum (x - \bar{x})^2}{n}}$$

**Fig. 5 – Table showing number of deaths from volcanoes in thousands from 1900 – 2014 and one stage of the standard deviation calculation**

Country	Deaths from volcanoes (in thousands)	$(x - \bar{x})^2$
Chile	0.01	2.709316
Costa Rica	0.09	2.452356
Democratic Republic of the Congo	0.4	1.577536
Indonesia	8.3	44.142736
Japan	0.3	1.838736
Mexico	3.5	3.400336
New Zealand	0.2	2.119936
Papua New Guinea	2.9	1.547536
Philippines	0.8	0.732736
United States of America	0.06	2.547216

$$\text{Standard Deviation Formula} = \sqrt{\frac{\sum (x - \bar{x})^2}{n}}$$

Fig. 6 – World map showing global surface temperature variation in 2016 from the average for 1981 – 2010



**Fig. 7 – Extract from a newspaper linking Federal funding through Obamacare to vaccination and disease**

**No Funding for Vaccinations?**

Health experts warn funding for vaccines may stop if Obamacare ends. Up to one million residents of Illinois stand to lose their health coverage. Concern is not just over the repeal of that section of the Affordable Care Act, say leaders of the Chicago Department of Public Health. They are also worried that the loss of funding will lead to a reduction in vaccination programmes and the ability to deal with outbreaks of disease. The city has spent \$12.8 million since 2012 on vaccinating thousands of Chicago residents and educating people on the threat of disease spreading. Without this money from the White House, experts believe that there will not be enough to help the people of the city.

25 January 2017

**Fig. 8 – Website extract for the Great Ocean Road**

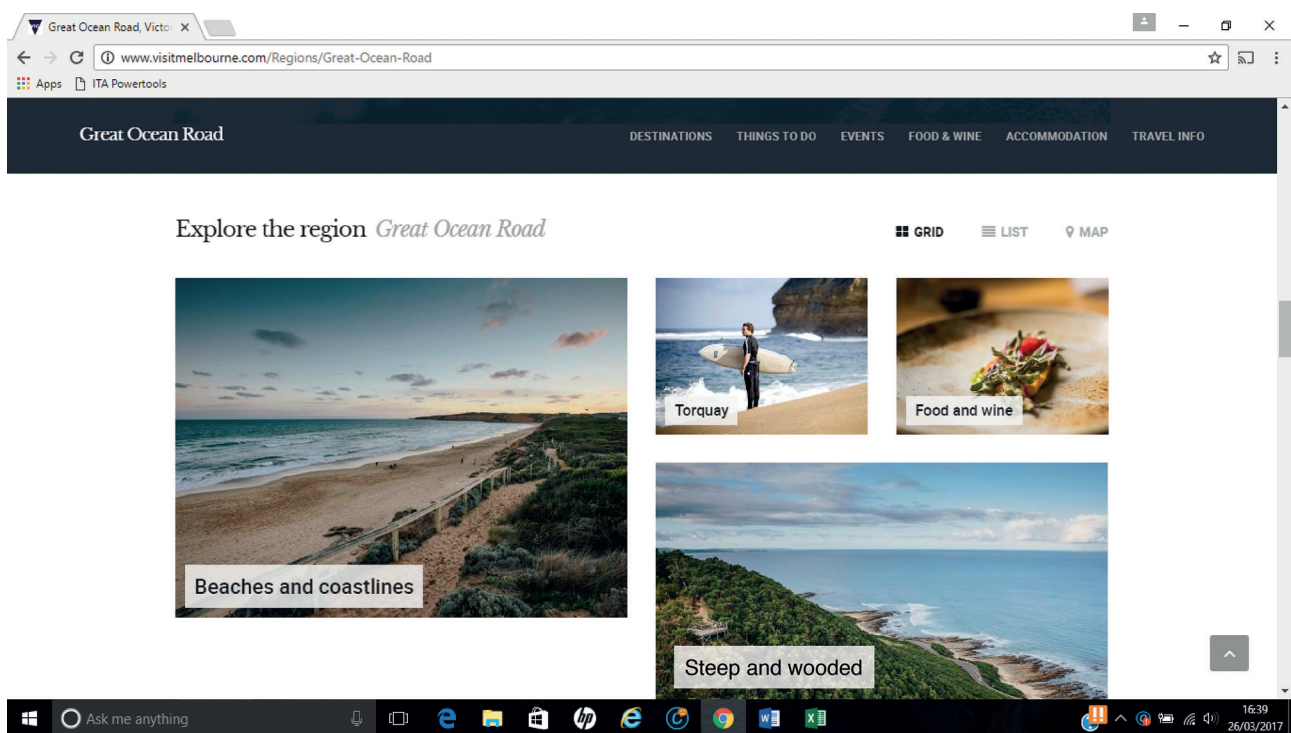


Fig. 9 – Infographic about Global Food Security





**Fig. 10 – A photograph showing the active Mount Agung, a volcano in Bali, Indonesia, with fertile land and coastal settlements in the foreground.**



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