Italy 2016 earthquake HIC

Q: Tectonic hazard. Levels of development. Impacts. Responses. Comparisons.

24.08.2016. 6.2 Richter scale, Shallow 5.1km.
Primary: 299 deaths, \$21.9 billion.
Secondary: landslides, psychological damage, looting.
Immediate: 58 tent camps, Facebook safety check.

Long-term: new schools, new building regulations.

Cumbria 2015, flooding caused by Storm Desmond.

Q: UK weather hazard.

December 2015, most extreme in 600 years, 341mm. Environmental: landslides, erosion, death of cattle. Economic: road and rail disruption, some businesses closed for over a year.

Social: 700 families out of homes for two years.

Brazil, Amazon rainforest.

Q: Value of the rainforest, sustainable management. Value: economic opportunities, goods and services the rainforest provides such as food, meat, fish, timber, energy from HEP, water, medicines, air purification, nutrient recycling, habitats.

Management: inter government deals, debt reduction, conservation, education, appropriate technology ecotourism, selective logging, agroforestry, replanting.

Dorset Coast, UK

Q: Typical features of a UK coastline

Known as the Jurassic coast, discordant coastline. Features: mixture of harder limestone and softer clay has allowed the formation of Durdle Door (arch), Lulworth (Bay), Kimmeridge (wave cut platform), Seacombe (cliffs), Durlston head (headland), Studland bay (sand dunes), Sandbanks (spit).

Nepal 2015 earthquake LIC

Q: Tectonic hazard, Levels of development. Impacts. Responses. Comparisons.

25.04.2015. 7.8 Richter Scale.

Primary: 8,841 dead, 26 hospitals lost, heritage lost.
Secondary: Avalanche on Mount Everest, 19 dead.
Immediate: international help, 225,000 people in tents.
Long-term: 23 areas to be rebuilt. \$6.7 billion needed.

Epping Forest

Q: Small scale UK ecosystem.

East London, last remains of a great forest, over 1000 years old, much loved native tree species (Oak, Ash, Elm and Beech). Consumers include Fox, rabbit, mouse, owl, 20 species of dragonfly. Seasonal climate with deciduous trees, large biomass store in nutrient cycle.

Western desert, USA

Q: Challenges and opportunities in a hot environment.

200,000sqkm, home to the Navajo people, home to Las Vegas.

Opportunities: farming vegetables, mineral extraction (Copper, Uranium, Coal), energy (solar) and tourism. Challenges: temperature (50°c plus), low carrying capacity of the land, accessibility issues, western desert water crisis - threat to water security.

Medmerry, West Sussex, UK

Q: Coastal management strategy

One of most at risk areas of UK from climate change. Current strategies costing £200,000/yr were unsustainable. 2011-2014 managed retreat completed. Positives: reduce risk of flooding, increased tourism to new salt marsh and species protection. Negatives: land sacrificed, other places more deserving, £28 million.

Typhoon Haiyan tropical storm HIC

Q: Weather hazard, levels of development. Impacts, Responses. Evaluation.

08.11.2013 Category 5, Philippines. 314km/hr top winds. Primary: 6,190 deaths, \$12 billion, 90% of Tacloban. Secondary: oil leak, looting, contaminated sea water. Immediate: TV warning, emergency supplies, curfew. Long-term: 'building back better', no build zone.

Brazil, Amazon Rainforest

Q: Deforestation causes and impacts.

Much clearance has been nearer to the main cities.

Indigenous people have been clearing for 1000's of years. Recent causes: logging, mining, energy,

years. Recent causes: logging, mining, energy, commercial farming, roads building, population.

Impacts: (Global) global warming, biodiversity loss.

(Local) soil erosion, fertility, river pollution.

River Severn, Rivers

Q: Typical UK River.

Longest river in the UK, 354 km long. Has examples of all major landforms expected in the upper, lower and middle course except for a waterfall. The River Severn has a tidal estuary which is 3.2km long. This was formed when a valley flooded by melting ice caused a rise in sea level. There are dangerous mudflats which are created by deposited material from the incoming tide and the river travelling out to sea.

Jubilee River Channel, River Thames, UK

Q: River flood management scheme.

Relief channel, by-passes Eton and Windsor which were prone to flooding, due to impermeable rock and high rainfall.

Issues: some areas downstream are flooded more, cost of £330 million led to accusations of the wealthy being protected more at taxpayers' expense, weirs designed to close the channel trap algae and so water is green.