#### Training & Professional Learning

## **Cynnal Cymru – Sustain Wales**





Share Learning, Challenge Thinking, Inspire Change

## **THE GREENHOUSE EFFECT**

2

3

1

Greenhouse gases such as carbon dioxide are **invisible** to visible light, letting sunlight pass through our atmosphere and warm the Earth. However, greenhouse gases act like a blanket, trapping some of the Earth's heat as it escapes back out to space.

These extra gases trap more heat, causing global warming.

4

Burning fossil fuels add extra greenhouse gases to the atmosphere.





### So is it any warmer?

<u>https://climate.nasa.gov/interactives/climate-</u> <u>time-machine</u>

https://climate.nasa.gov/vital-signs/global-temperature/

https://www.co2.earth

# The top six areas of climate change risk for UK (UK Govt. 2017)

Flooding and coastal change risks to communities, businesses and infrastructure

Risks to health, well-being and productivity from high temperatures

Risk of shortages in the public water supply, and for agriculture, energy generation and industry

Risks to natural capital, including land, coastal, marine and freshwater ecosystems, soils and biodiversity

Risks to domestic and international food production and trade

New and emerging pests and diseases, and invasive non-native species, affecting people, plants and animals (research priority)

#### What Does The Warming Mean for Wales?



- Coastal flooding
- Increased storm intensity
- Hotter extreme summer temperatures
- Expected between now and the middle part of this century

#### **Climate Change- What It Means for Wales?**



The impacts of climate change will not be equally felt across society

The poorest and already vulnerable will be the hardest hit

Less resources to adapt to extreme weather

Insurance costs

**Repair costs** 

Lost days

#### "Will I need me brolley?" Treating climate change as a serious risk

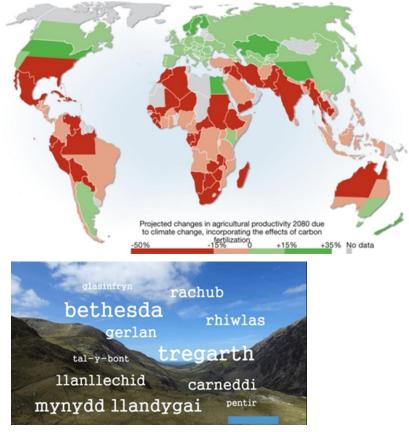
What might be the business impacts of climate change?

- Critical business functions
- Types of extreme weather event

**Critical Functions** Buildings – offices Audience transport Staff well-being and continuity IT and data Audience comfort & safety Investment and savings

Stock supply and storage

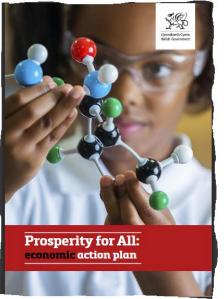
#### What Does The Warming Mean for Wales?





- Fluctuations in food price
- Loss of value for some stocks and share
  - Increased immigration
- But also...
- Opportunities for innovation in technology and business
- Local resilience and selfsufficiency – "The Foundation Economy"
  - Collaboration and partnership

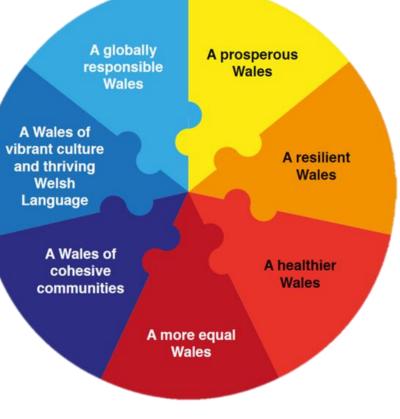
### Low Carbon Economy





We want Wales to benefit from the opportunities arising from the shift from a fossil fuel to a low carbon based economy.....

Use the Economic Contract to drive change by linking any direct financial support we provide to business to a reciprocal commitment from the business to make progress in reducing their carbon footprint. 45% by 2030



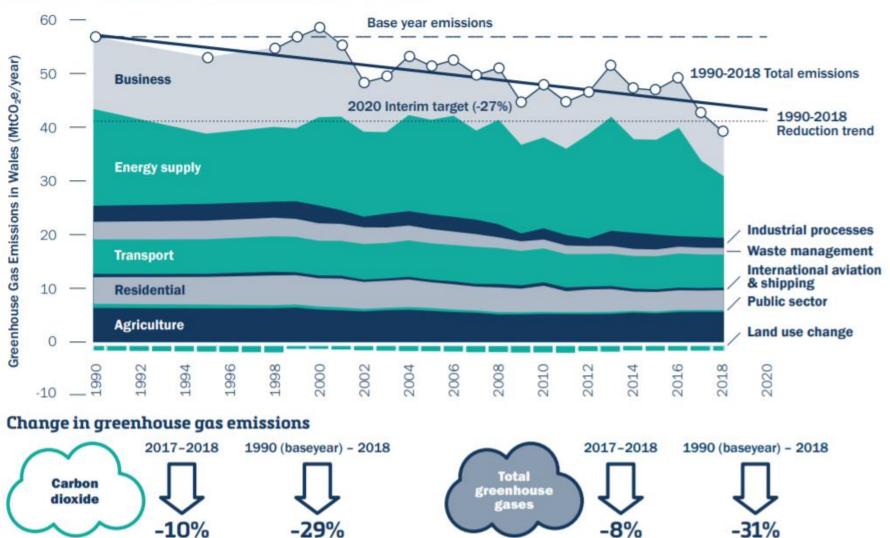
### 2018 Wales Greenhouse Gas Emissions





#CymruCarbonIsel #LowCarbonWales Llywodraeth Cymru Welsh Government

#### **Greenhouse Gas Emissions in Wales**



## Turn A Crisis Into An Opportunity



Canolfan Film Cymru





Ynni

- Get Help
- Calculate your carbon footprint
- LED
- Green Tariff and energy efficiency
- PV Panels
- Bio-diesel generators\*
- Insulation
- Boiler service or replacement
- Food source local
- Food waste minimise
- Plastic water refill
- Wise use of water
- Audience travel
- Spread the message



#### SOLAR PANELS - MIPV IS LEADING THE WAY



#### https://bipvco.com/technology





http://www.powerfulthinking.org.uk/resources/suppliers/

https://ico-assets-live.s3.eu-west-1.amazonaws.com/wpcontent/uploads/2020/02/17155931/Green-<u>Cinema-Resource.pdf</u>