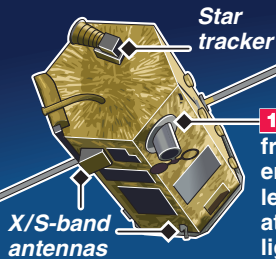
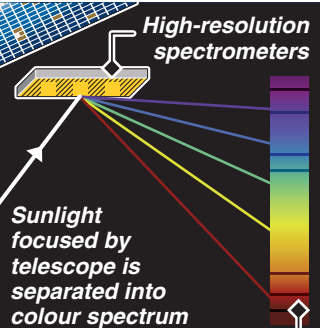


# Mapping Earth's CO<sub>2</sub> from space

NASA's new *Orbiting Carbon Observatory (OCO)* is the first spacecraft that will provide a complete picture of human and natural carbon dioxide sources as well as "sinks" – places where CO<sub>2</sub> is stored by plants and oceans

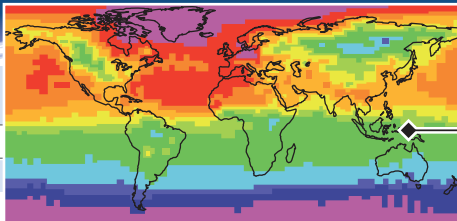


**1** Sunlight reflected from surface of Earth enters telescope. The less CO<sub>2</sub> present in atmosphere, the more light instrument detects



**2** CO<sub>2</sub> measurement: Dark lines in specific bands of colour indicate amount of CO<sub>2</sub> molecules in atmosphere

**3** Data: Input into computer models of global atmosphere to make maps of carbon dioxide sources and sinks



**Global mapping**

Once every 16 days

**Mission** 2 years

**Cost** \$275 million