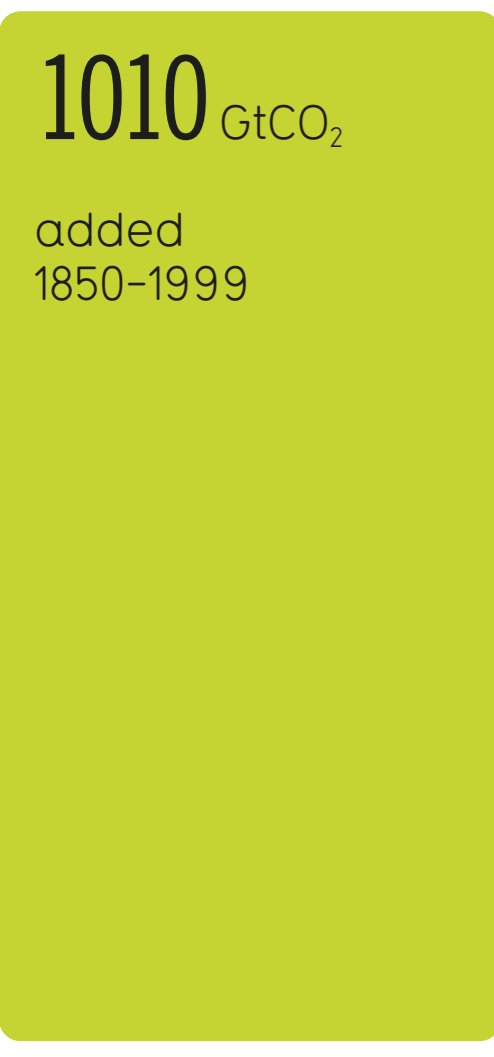
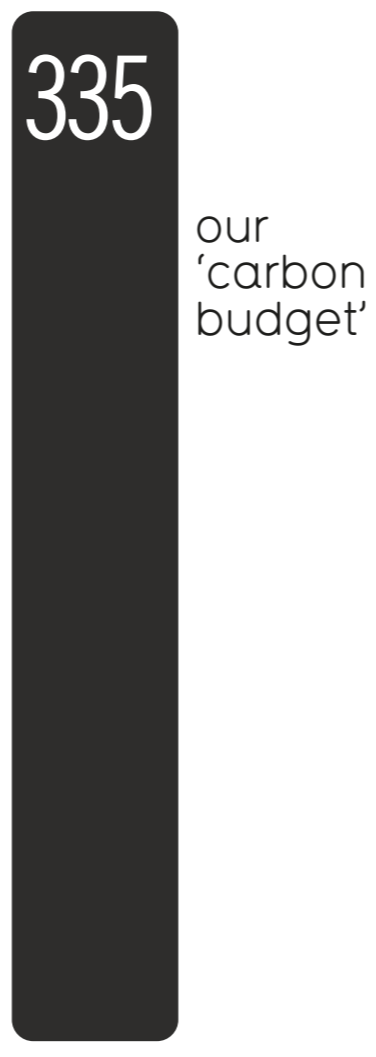


# How Many Gigatons of Carbon Dioxide...?

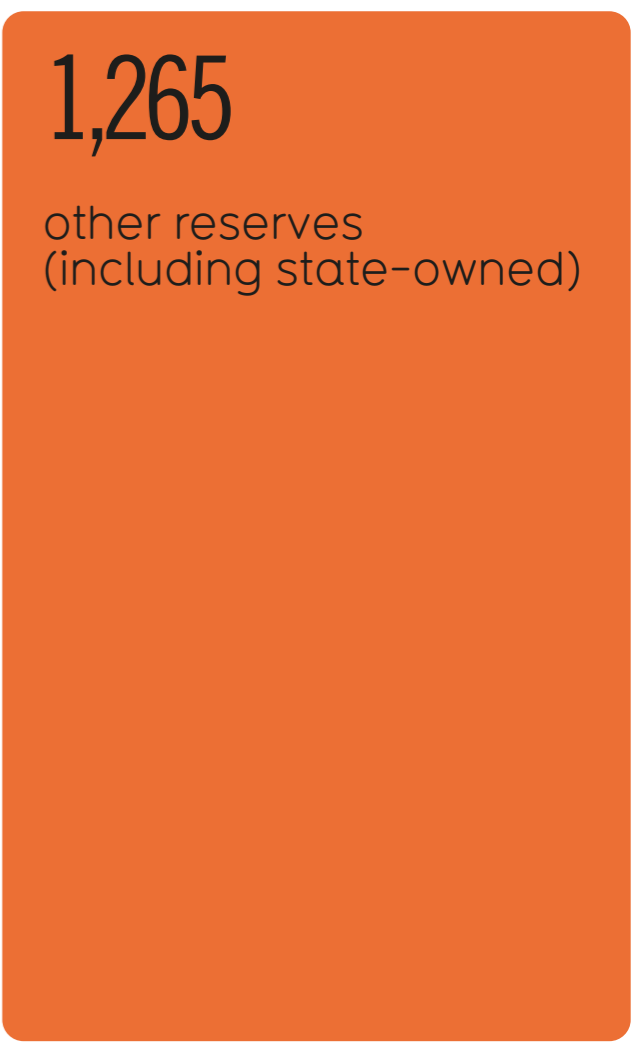
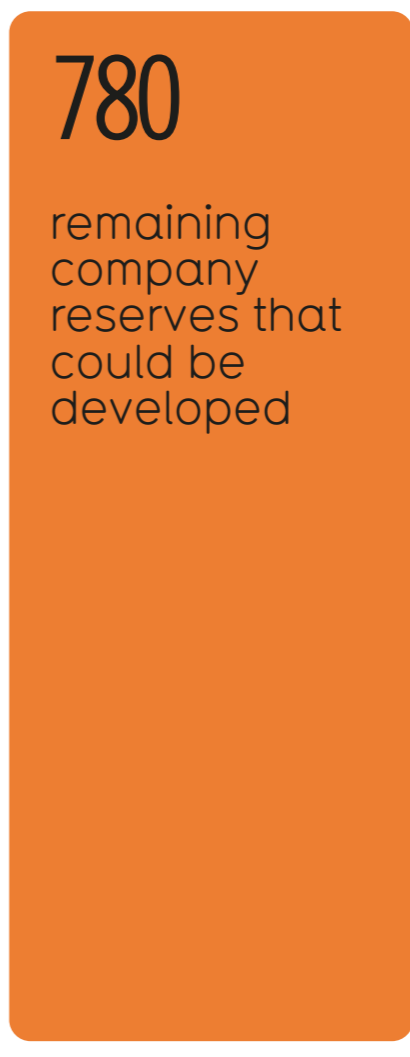
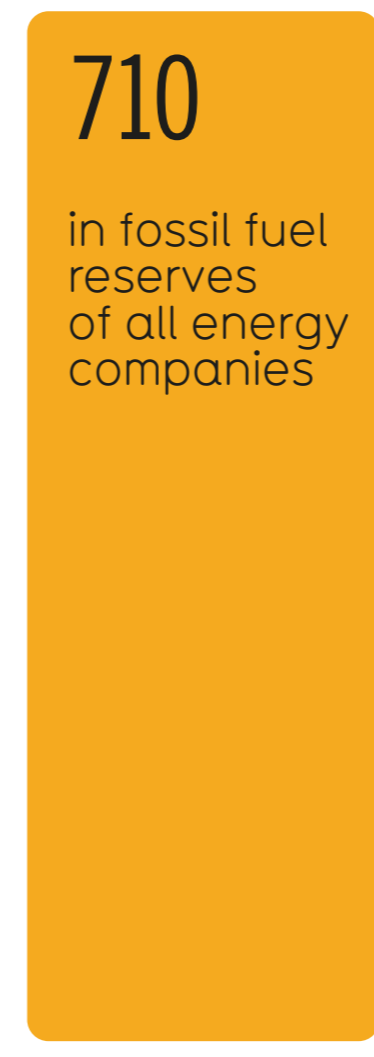
have we released to date?



more can we "safely" release\*?



are left to release?



what's in the ground: 2755

CURRENT ANNUAL FOSSIL FUEL EMISSIONS

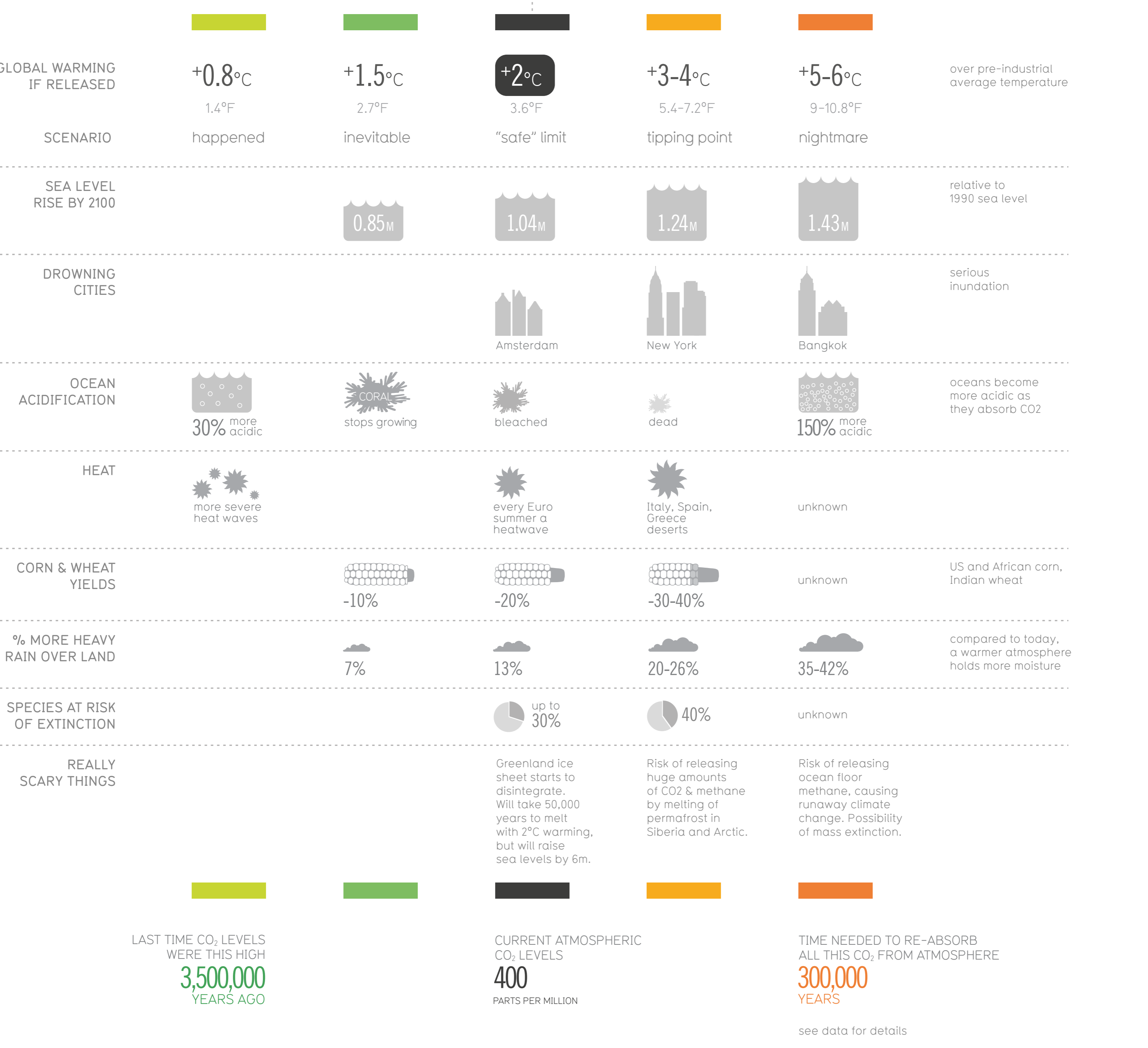


\* before 2050 and still have an 80% chance of staying below 2°C warming

TIME BEFORE WE BREAK OUR 'CARBON BUDGET'



**8 YEARS**  
if emissions continue to increase at 2.5% per year



Note: Our emissions data is expressed in gigatons of carbon dioxide (GtCO<sub>2</sub>), so values are 3.664 times larger than the same amount of emissions expressed in gigatons of carbon (GtC).

Data based on emissions from fossil fuel burning only - see data sheet for emissions including land use changes.

All data & workings: <http://bit.ly/CO2Gigatons2016>

Concept & Design: David McCandless // v2.2 // Feb 2016

Lead Research: Miriam Quick

Additional Research: Ella Hollowood // Additional design: Kathryn Ariel Kay, Paulo Estriga, Fabio Bergamaschi

InformationisBeautiful.net

Sources: Carbon Tracker Initiative, International Energy Agency (IEA), IPCC 2014 & 2007, CDIAC, Global Carbon Project, NASA, National Oceanic and Atmospheric Administration (NOAA), National Research Council, Potsdam Institute for Climate Impact Research, World Bank, European Commission Joint Research Centre, our own calcs