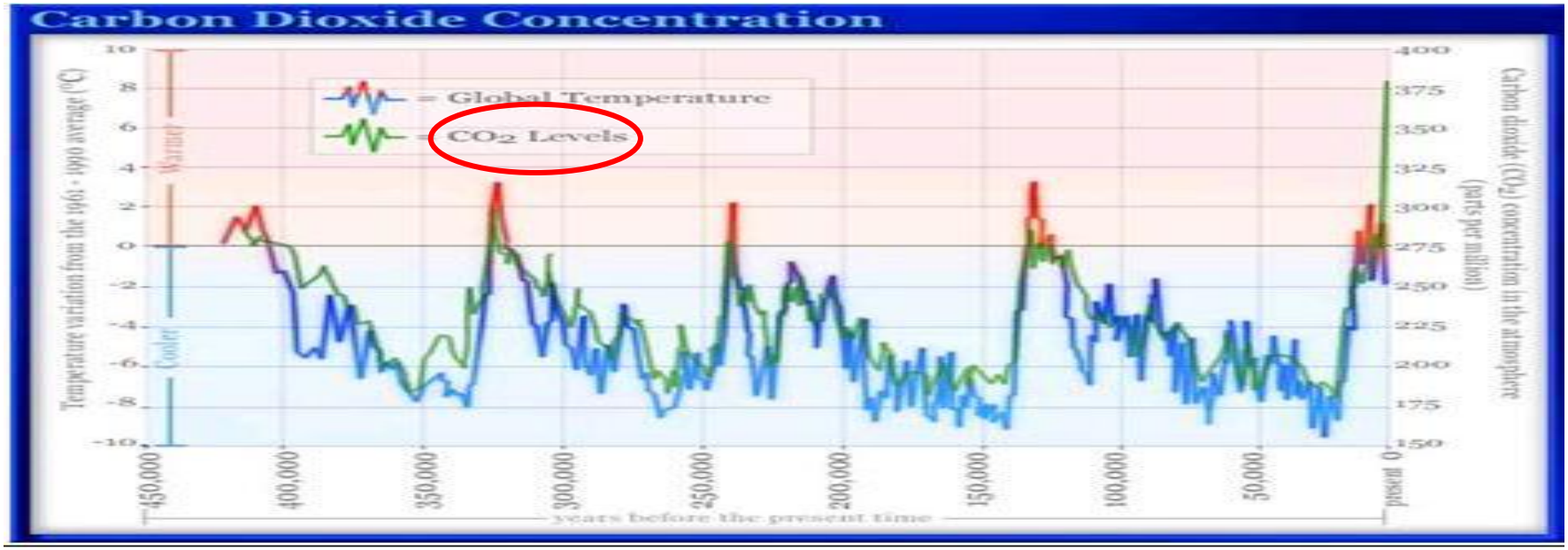
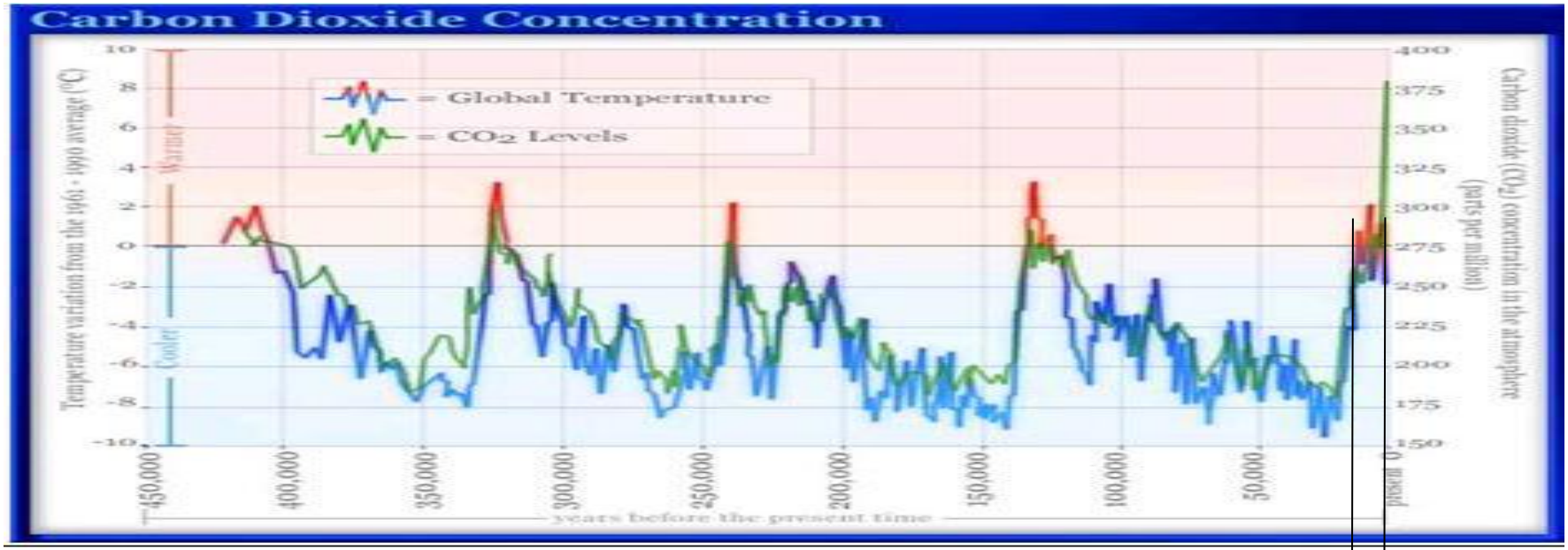
CO_2 content in atmosphere

- correlation with average atmospheric temperature



Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

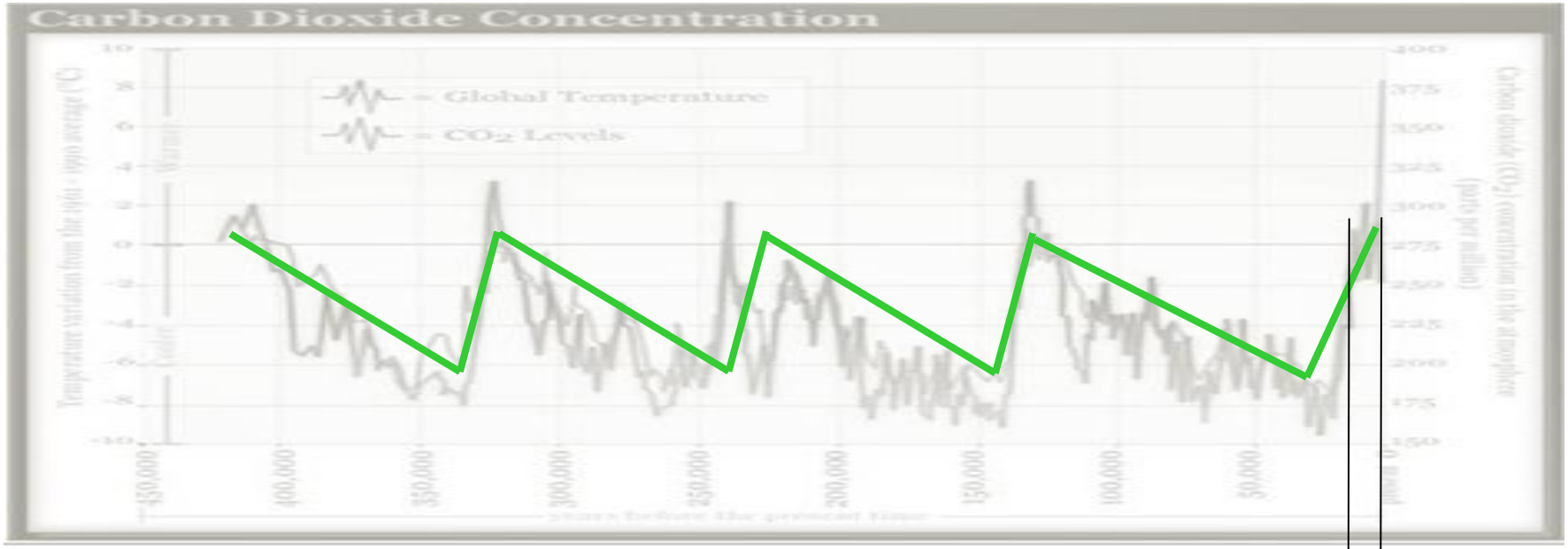
CO_2 content in atmosphere



Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

FOR REFERENCE:
History of mankind.
Start of agriculture
10,000 yrs ago

CO_2 content in atmosphere

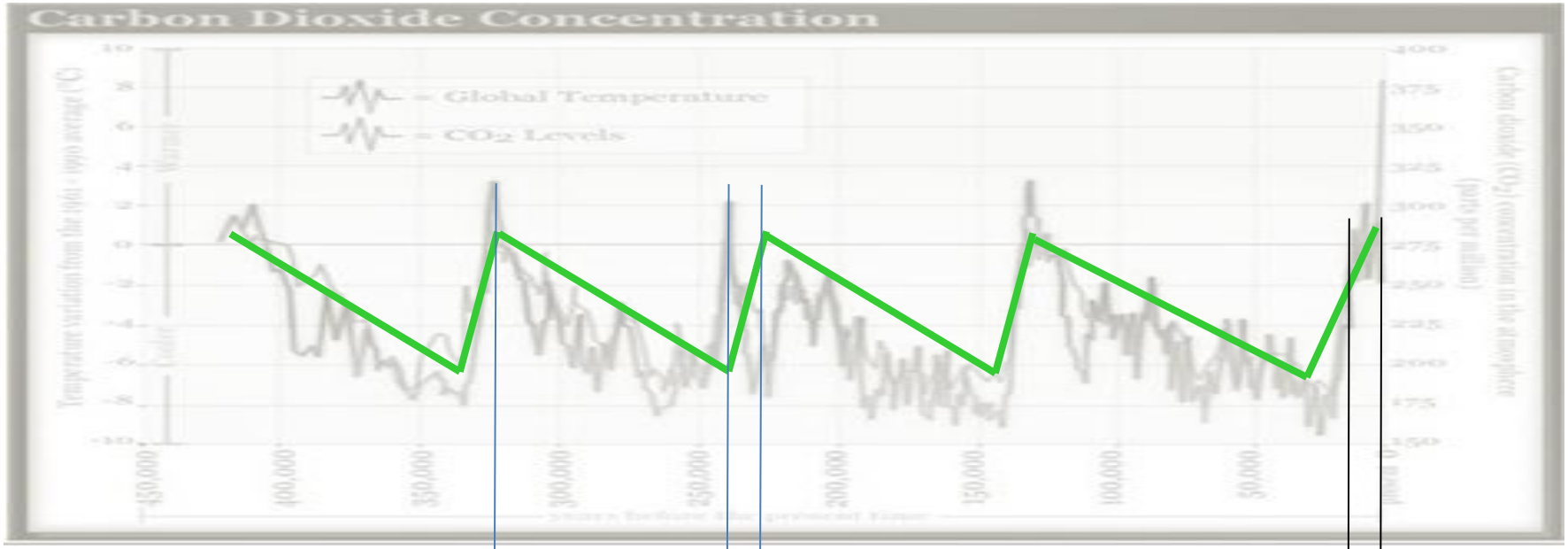


Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

FOR REFERENCE:
History of mankind.
Start of agriculture
10,000 yrs ago

CO_2 content in atmosphere

- 100,000 year sequence repeated again and again



Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

10,000 yrs

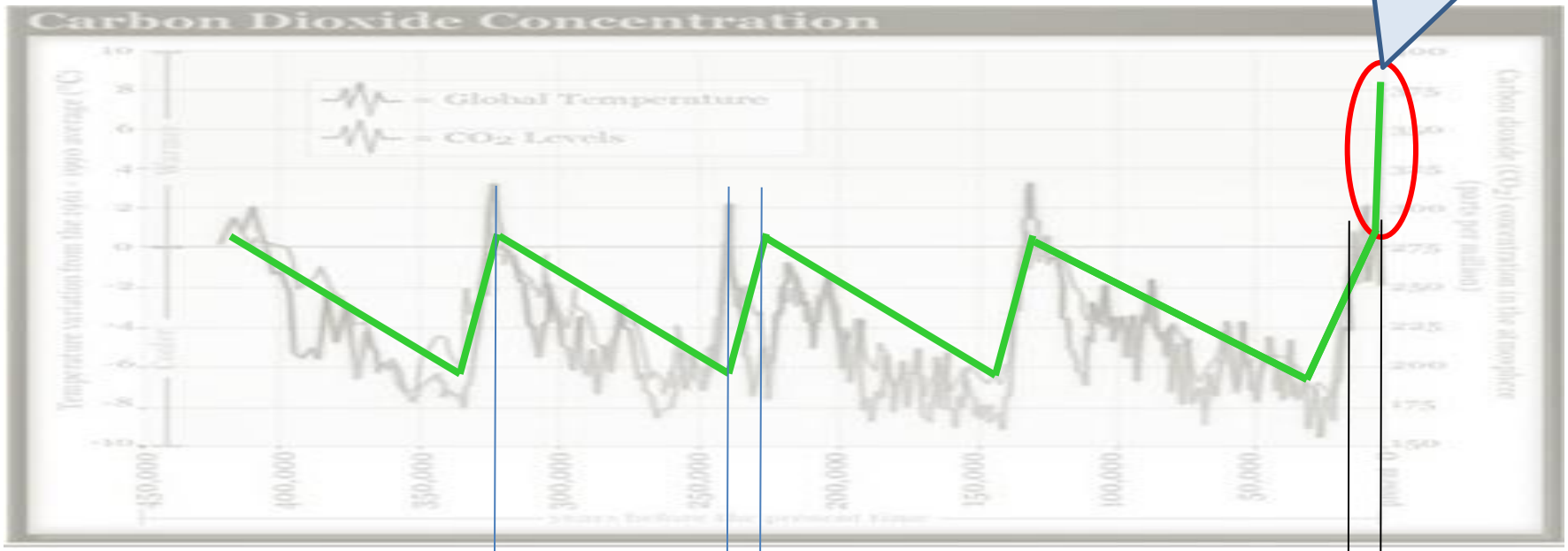
90,000 yrs

FOR REFERENCE:
History of mankind.
Start of agriculture
10,000 yrs ago

CO_2 content in atmosphere

- dramatic deviation from repeated pattern

Latest 150 yrs.
Clear link to
industrialization.



Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

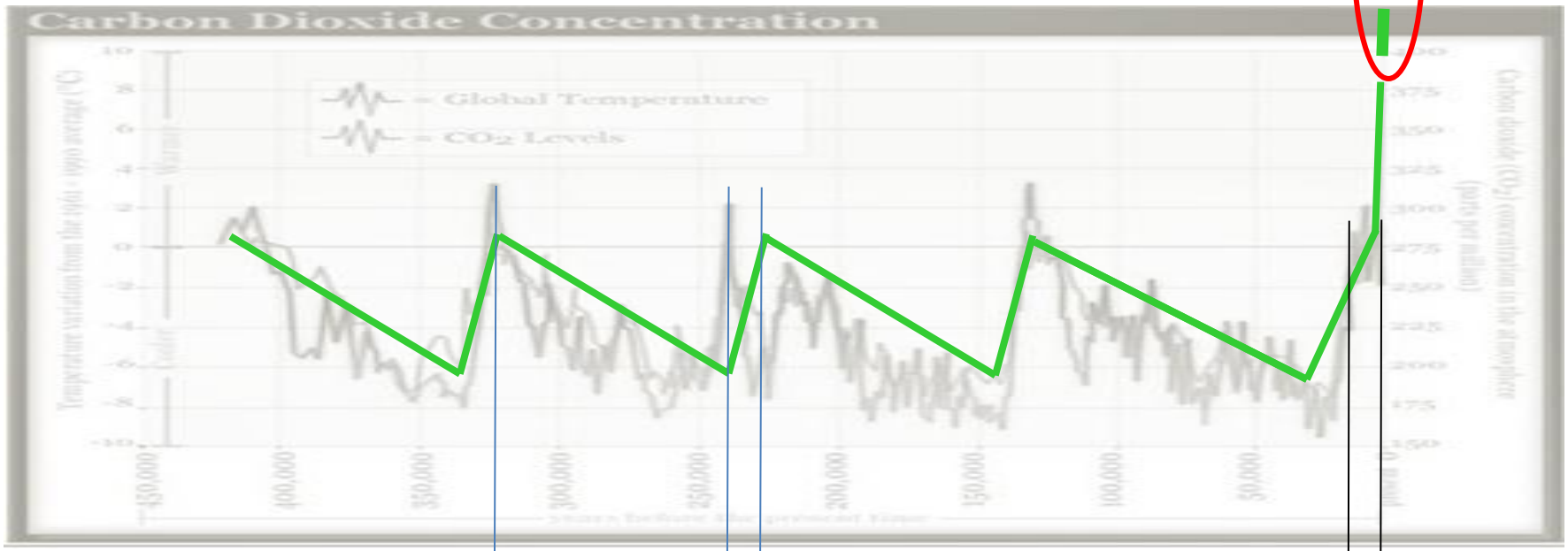
10,000 yrs

90,000 yrs

FOR REFERENCE:
History of mankind.
Start of agriculture
10,000 yrs ago

CO_2 content in atmosphere

Expected next 50 yrs.



Source: Data adopted from National Oceanic & Atmospheric Administration <http://www.noaa.gov/> Accessed at: <http://www.seed.slb.com/en/scictr/watch/climate_change/causes_co2.htm>

90,000 yrs

10,000 yrs

FOR REFERENCE:
History of mankind.
Start of agriculture
10,000 yrs ago

Effects of global warming

- a major shift of the World as we know it

Even ”only” 2 degrees increase leads to major exstinction

	+2 degrees	+4 degrees
Eco systems in general: Portion of known species becoming extinct	20 – 30 %	40 – 70 %
Corral reefs	Most corral reefs bleeched	Wide spread corral mortality
Rising seawater level	• Coastal cities drowned • Decreased fresh water availability (salt water intrusion)	• Same to larger extent • Same to larger extent
Food: Crop productivity	• Low latitude (e.g. Mediterranean): Decrease for some cereal. • Mid to high latitude: Increase for some cereal.	• Low latitude: Decrease for all cereal. • Mid to high latitude: SuDecrease in some regions.

Source: UNEP report ”Climate in Peril, A popular guide to the latest IPCC reports” 2009