

WARMING SIGNAL

Global temp to rise 4°C by 2100

Melbourne: Global average temperatures will rise at least 4°Celsius by 2100 and potentially more than 8° by 2200 if carbon dioxide emissions are not reduced, a new research has warned.

Scientists found global climate is more sensitive to carbon dioxide than most previous estimates. The research also appears to solve one of the great unknowns of climate sensitivity, the role of cloud formation and whether this will have a positive or negative effect on global warming.

“Our research has shown climate models indicating a low temperature response to a doubling of carbon dioxide from preindustrial times are not reproducing the correct processes that lead to cloud formation,” said professor Steven Sherwood, lead author from the University of New South Wales.

“This new research takes away the lower end of climate sensitivity estimates, meaning that global average temperatures will increase by 3 to 5° Celsius with a doubling of carbon dioxide,” said Sherwood.

The key to this narrower but much higher estimate can be found in the real world observations around the role of water vapour in cloud formation, researchers said. Observations show when water vapour is taken up by the atmosphere through evaporation, the updraughts can either rise to 15 km to form clouds that produce heavy rains or rise just a few kilometres before returning to the surface without forming rain clouds. AGENCIES

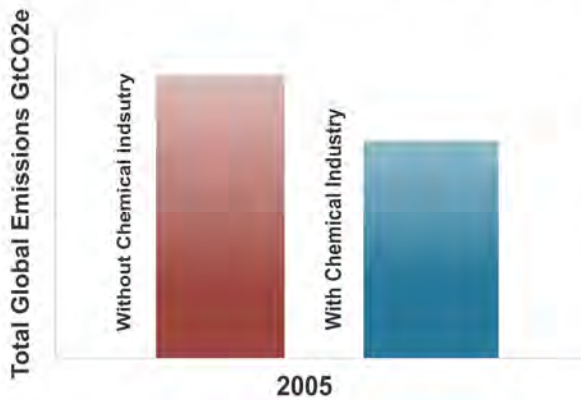


ICPE COMMENT

PLASTICS SAVE GREEN HOUSE GAS EMISSIONS

Plastics

TOP GREENHOUSE GAS EMISSION SAVER



In 2005, Total Global Emissions was 46 GtCO₂e

It could have been 51.2 Gt Co₂e, but for the saving by Chemical Industry

Saving by Chemical Industry 11%

Among The Top 10 **Green House Gas Emission** Saving Sectors -
4 are Plastics



Insulation Materials



Packaging



Automobiles



Piping

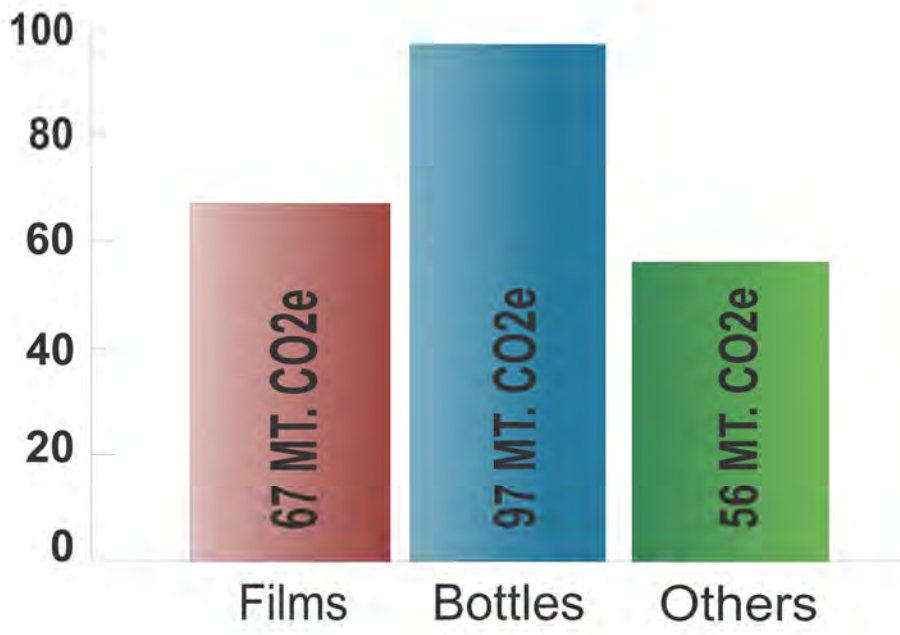
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Source: Mckinsey cLCA for ICCA






Indian Centre for Plastics in the Environment

GHG EMISSION SAVING BY PLASTICS PACKAGING



Total Saving ~ 220 Mt CO2e

| Comparing Segments | Comparing Materials |
|---|--|
|  Carry Bags  Flexible Packaging  Rigid Packaging | Plastics : PE/PP/PVC/PS/EPS/PET vs Glass / Thin Steel / Al Corrugated Box / Paper Card Board / Wood Beverage Carton |

Source: Mckinsey cLCA for ICCA

