



Martin-Gatton

College of Agriculture,
Food and Environment
University of Kentucky®

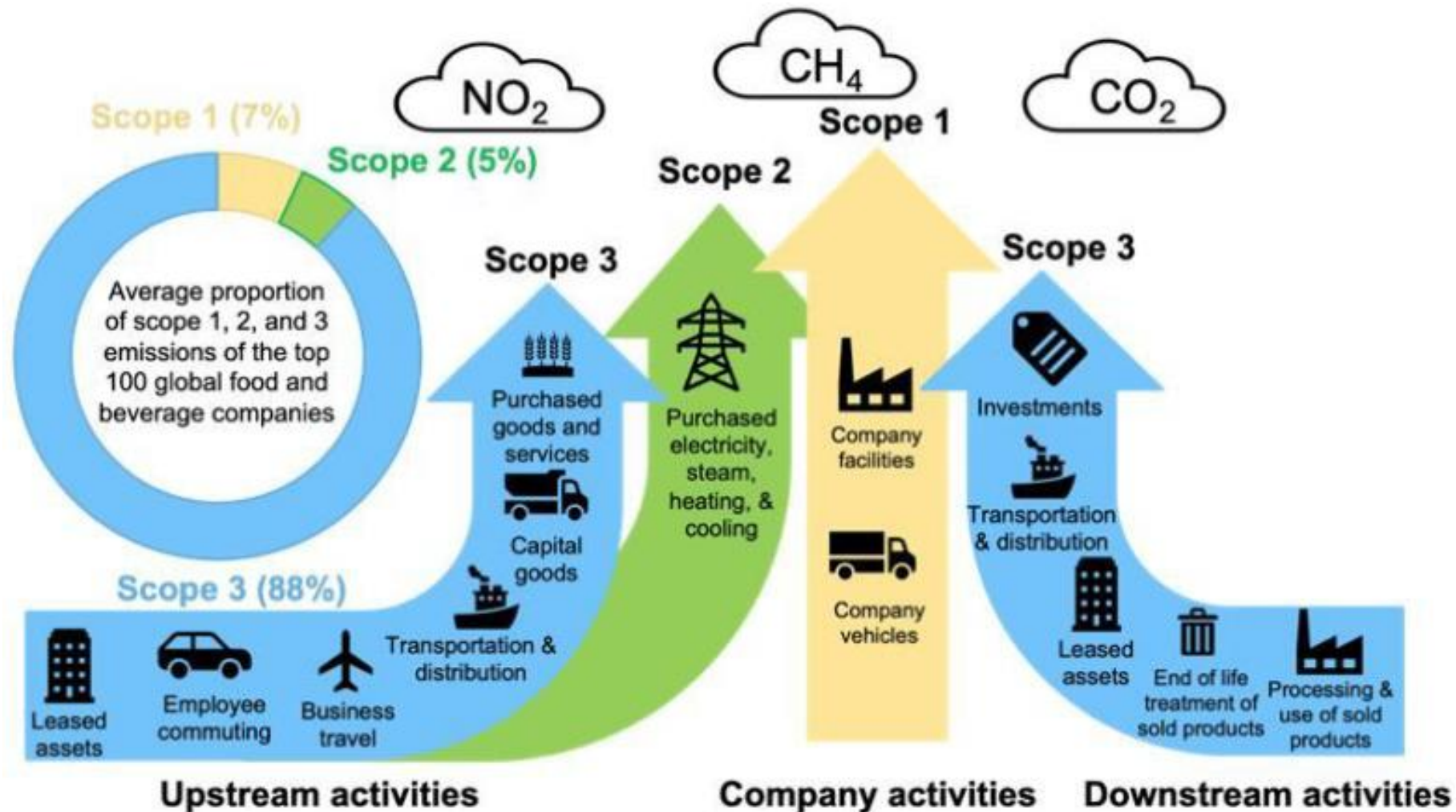
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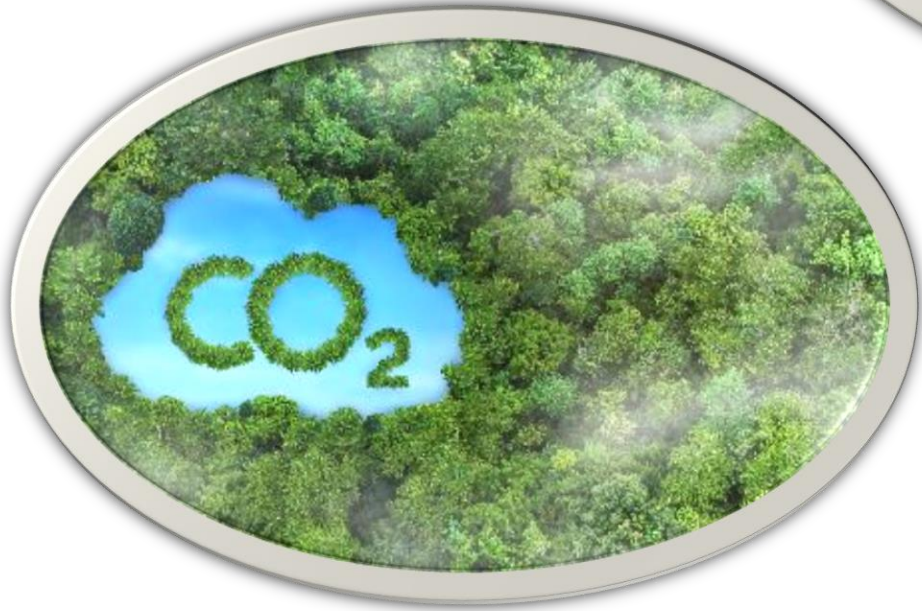
OPPORTUNITIES AND RISKS OF CARBON MARKETS FOR DAIRIES

DISTRIBUTION OF EMISSIONS OF THE TOP 100 FOOD AND BEVERAGE COMPANIES



CARBON OFFSET VS. CARBON INSET

OFFSET



INSET



WHY ARE COMPANIES PURSUING CARBON INSETS?

The Washington Post
Democracy Dies in Darkness

Delta's carbon-neutral pledge is 'greenwashing,' California lawsuit says



By Andrew Jeong

May 31, 2023 at 5:20 a.m. EDT

Delta Air Lines should pay damages to customers for misrepresenting itself as a carbon-neutral airline in marketing campaigns and advertisements that encouraged consumers to pay higher prices, a class-action lawsuit says.

* Delta spent \$137M to buy offsets to neutralize 27 million metric tons
Department of Agricultural Economics
Cooperative Extension Service

Bloomberg the Company & Its Products | Bloomberg Terminal Demo Request | Bloomberg Anywhere

Bloomberg

Faulty Credits Tarnish Billion-Dollar Carbon Offset Seller

South Pole, the world's leading purveyor of offsets, is facing allegations that it exaggerated climate claims around its forest-protection projects. The uncertainty could influence how legions of companies try to slash their emissions.

By [Ben Elgin](#), [Alastair Marsh](#) and [Max de Haldevang](#)

March 24, 2023 at 2:00 AM EDT Updated on March 24, 2023 at 3:44 PM EDT

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CARBON INSET EXAMPLES

COMPANY	GHG GOALS
ADM	25% Scope 3 reduction by 2035 ---- supporting growers in adopting soil health practices
Bunge	12% Scope 3 reduction by 2030
Cargill	Reduce emissions from the supply chain by 30% by 2030
Beam Suntory	Achieve net-zero GHG by 2040 --- “work only with growers that use sustainable practices by 2040”
Brown-Forman	By 2025, 100% engagement with our direct farmers on regenerative agriculture practices
Nestle	50% of key ingredients sourced through regenerative agriculture methods by 2030
Coca-Cola	Advance sustainable sourcing of our agricultural ingredients at the farm level
Tyson	We partner with row crop farmers to continue to advance sustainable land stewardship

CARBON INSET EXAMPLES

COMPANY	GHG GOALS
Cargill	Cut beef emissions from North American beef supply chain by 30% by 2030
Tyson	Net-Zero emissions by 2050 -- Sustainable beef production on 5 million acres of cattle grazing land by 2025
JBS	Net-Zero emissions by 2040 -- Strengthen and scale regenerative farming practices
Wal-Mart	Net-Zero emissions by 2040 -- Sustainably source fresh beef by improving grain sourcing and grazing management practices
McDonald's	Net-Zero emissions by 2050 -- Improve grazing techniques in the U.S.
YUM! Brands	Reduce emissions of beef, poultry, dairy, and packing 46% below 2019 levels
Restaurant Brands International (Burger King)	Advance beef sustainability...work with ranchers and producers in our supply chain to scale regenerative agriculture

CONCERNS FROM AN ECONOMIST

- “Regenerative Agriculture”, “Sustainable Practices”, “Climate-Smart Practices”
- Identity preservation costs in a decommoitized ag sector
- Contracts
- Legal risk
- Who pays?
- Voluntary or Voluntold market?
- Premiums?

THANK YOU!

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