



Chevron's Business-Driven Actions on Greenhouse Gas Emissions Management



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Critical Challenge

- To find ways to provide and use reliable, affordable energy while reducing long-term growth in greenhouse gas (GHG) emissions
 - As a company with global operations, Chevron is respectful of the decisions on GHG management made by the countries where we operate
 - Chevron believes that fossil fuels, although a finite resource, will continue to meet the vast majority of global energy demands for at least the next 30 years

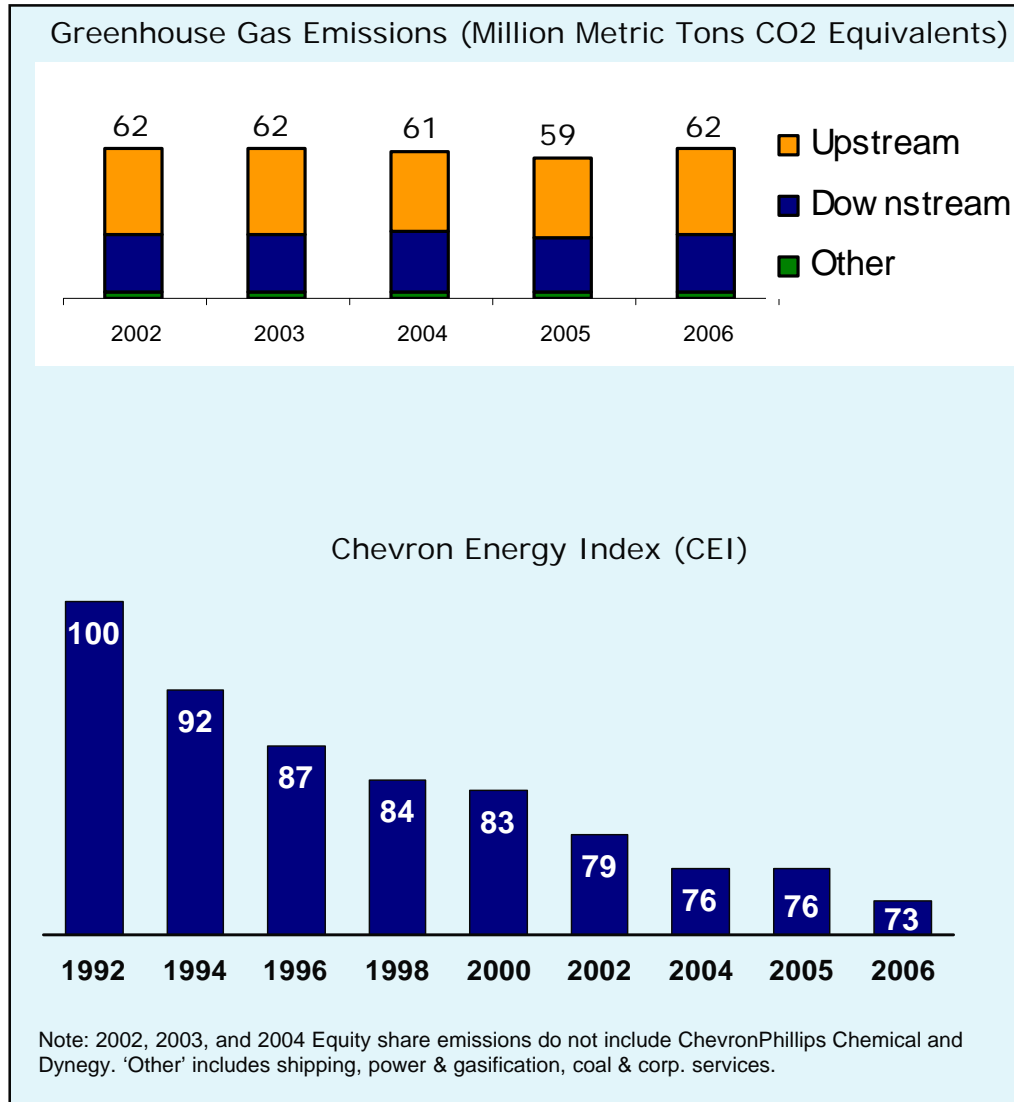


Chevron's Four-Fold Plan of Action: Sample of business-driven activities



Strategy element	Key actions
1. Reducing emissions of greenhouse gases and increasing energy efficiency	Set GHG emissions goal (<i>generally one year out</i>)
	Implement energy efficiency programs
	Overcoming gas-to-market barriers: established standards -- and taking action -- to reduce venting & flaring of natural gas
	Analyze cost of carbon scenarios in capital project planning
2. Investing in research, development and improved technology	Ongoing research and technology development, e.g. carbon dioxide capture and storage in geologic formations
3. Pursuing business opportunities in promising, innovative energy technologies	Offer services to help organizations implement energy efficiency, renewable and alternative energy projects, e.g., CES
	Selective investments in alternative and renewable technologies, e.g., geothermal development, CTV's hydrogen business unit
4. Supporting flexible and economically sound policies and mechanisms that protect the environment.	Engagement under the Kyoto Protocol: comply with European Union Emissions Trading Scheme and develop projects under the Clean Development Mechanism. Darajat III Geothermal Project approved.
	Ongoing public policy activities

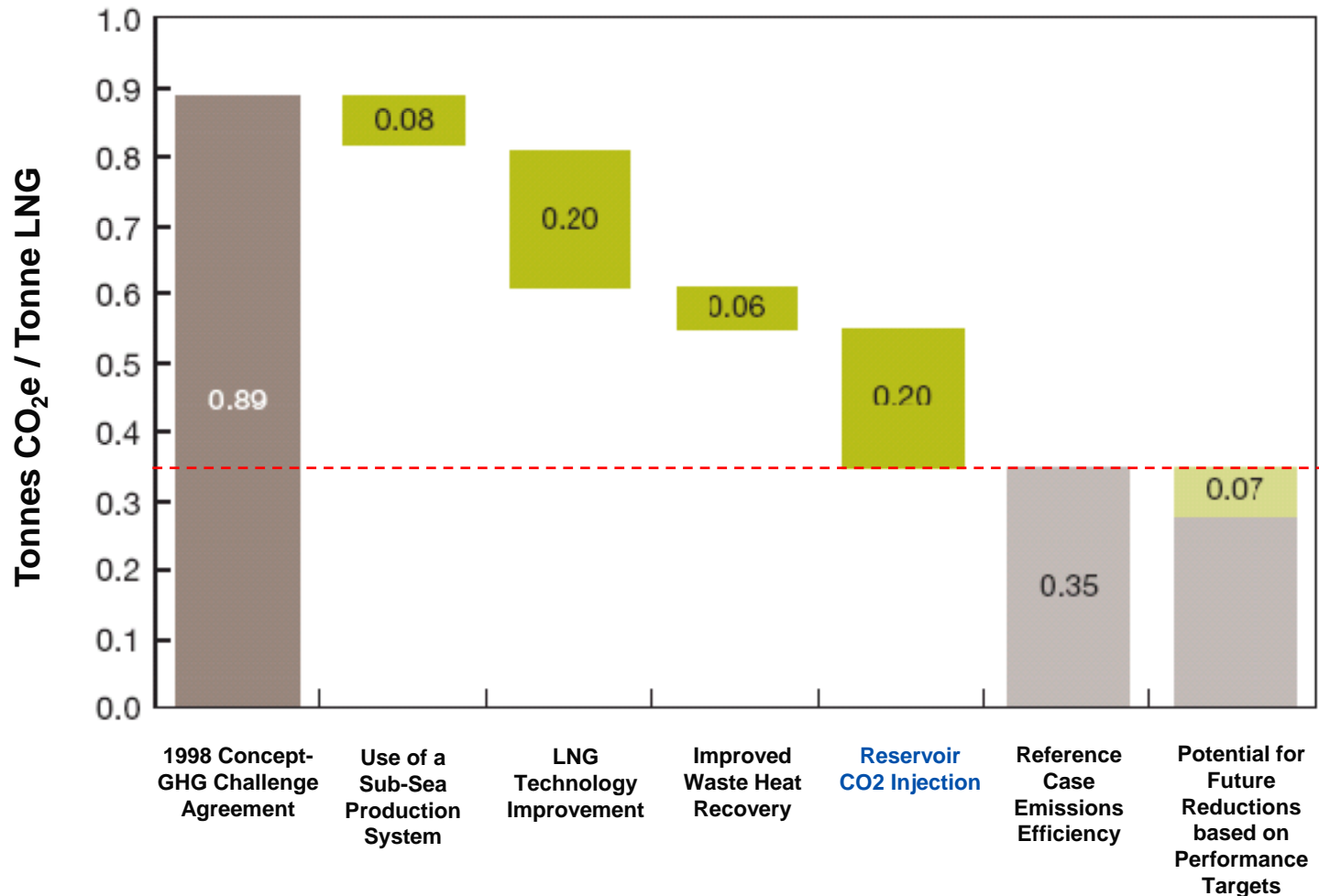
Progress Towards Reducing GHG Emissions



- GHG emissions accounting has become standardized – Chevron’s SANGEA™ software played a key role.
- Chevron’s energy efficiency has improved 27% from 1992.
- Chevron’s OpCos set GHG emissions goal for 2007.
- Chevron to reduce upstream flaring and venting (F&V) in Nigeria and Angola. F&V accounts for around a quarter of the company’s GHG emissions.

Carbon Capture and Storage (CCS): GHG efficiency improvements at Gorgon

- Engineering decisions have resulted in significant improvements in GHG emissions efficiency compared to the 1998 design case

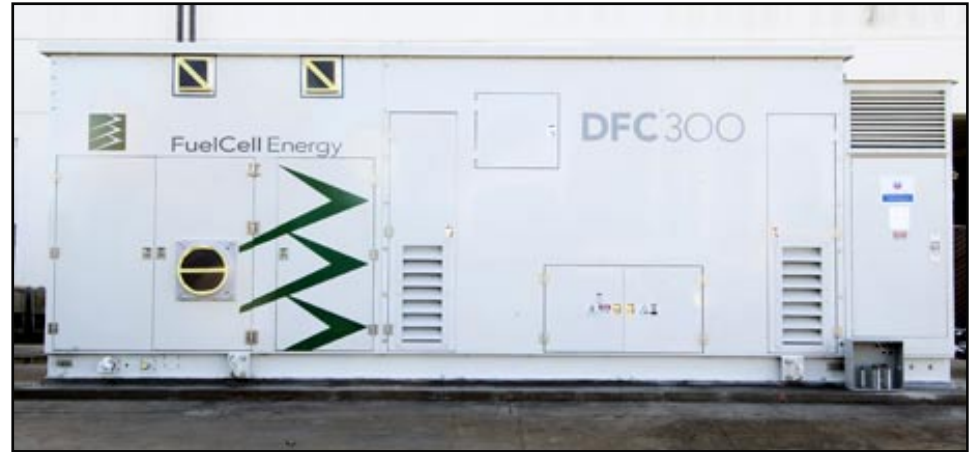


Chevron Biofuels



- Biofuels will play an increasingly important role in meeting the world's growing energy needs and diversifying energy supplies.
- Chevron is well-positioned to make significant contributions to the evolving biofuels industry.
- Second-generation biofuels – those made from cellulosic, non-food feedstocks — hold the greatest promise to grow the biofuels industry to large scale.
- Chevron is actively working and investing to accelerate the scientific, technical, and commercial breakthroughs necessary to bring second-generation biofuels to large-scale commercial production.
- Bringing biofuels to large-scale commercial production is an enormous challenge that will be achieved only through collaboration.

Chevron Energy Solutions (CES): Energy Efficiency, Solar Power and Fuel Cell Projects (Northern California)



Chevron's Expanded Climate Change Policy Position: Seven principles

- **Global Engagement:** The reduction of greenhouse gas emissions must be shared equitably by the top emitting countries of the world. We support equitable sharing via long-term and coordinated national frameworks.
- **Energy Security:** Fossil fuels are expected to dominate energy supply for decades to come. Climate policy must recognize the role these critical energy sources play to ensure security of supply and economic growth.
- **Maximize Conservation:** Energy efficiency and conservation are the most immediate and cost effective sources of new energy with no GHG emissions. Government programs to promote energy efficiency and conservation must continue and should be enhanced.
- **Measured and Flexible Approach:** GHG reduction objectives must avoid a disruptive economic impact and allow for realistic turnover in capital and a phase-in of new, low carbon technologies. Periodic "check-points" are advised in light of new scientific and economic impact information.
- **Broad, Equitable Treatment:** Broad and equitable treatment of all sectors of the economy is necessary to ensure no sector or company is disproportionately burdened.
- **Enable Technology:** Government support and partnerships with the private sector for pre-competitive R&D in carbon mitigation and clean energy technologies must continue at an accelerated pace.
- **Transparency:** The costs, risks, trade-offs and uncertainties associated with such climate policies must be openly communicated.

Opportunities Arising from GHG Reductions: Geothermal in West Java, Indonesia



Project Description

- 110 MW expansion at the Darajat geothermal power plant, through the addition of a new generating unit.
- New capacity will help meet electricity demands of Java, Madura and Bali, where supply shortages are anticipated.
- Darajat's geothermal resources are abundant, clean, renewable; will help Indonesia avoid ~630,000 tonnes per year of CO₂ emissions.
- Eligibility of project for CDM credits through the UN review process was approved in 2006.