

Save Money... & save the planet.

Dr. S.Cruz-Pol

**Global Warming
can destroy our planet!**

If we just sit and do nothing about it.

Follow this tips to save over \$2000 a year while reducing your emissions to the atmosphere that are warming the planet.



Changes



Scientific consensus says that human activity, mainly carbon dioxide emissions, is causing global warming.

Every time we use electricity or gasoline, even water, we are sending CO₂ emissions to the atmosphere.

Global Warming



- Is not a theory
- It's happening now
- Some of its consequences are irreversible!

Patagonia (Argentina)

Longest Glacier in S.A.



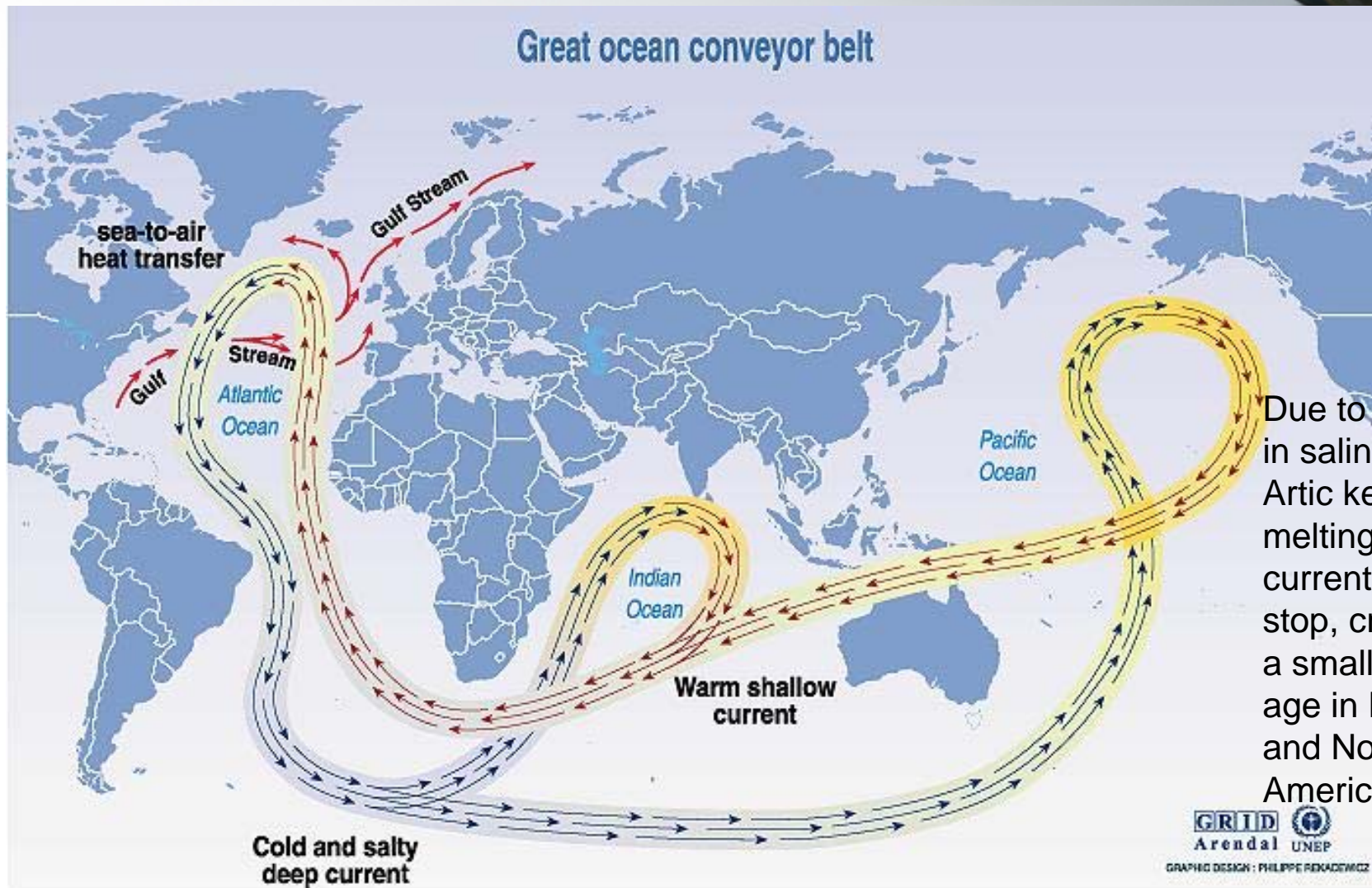
1928



2004

Worst case scenario: abrupt change

IPCC (Intergovernmental Panel on Climate Change)



Due to change in salinity, if Arctic keeps melting, this current could stop, creating a small ice age in Europe and North America.

Source: Broecker, 1991, in Climate change 1995, impacts, adaptations and mitigation of climate change: scientific-technical analyses, contribution of working group 2 to the second assessment report of the intergovernmental panel on climate change, UNEP and WMO, Cambridge press university, 1996.

Do you have phantoms at home?



- Phantom Loads- electrical leakage from appliances that are OFF.
- Yes, even when OFF, electrical appliances are using up electricity!
- <http://www.wordspy.com/words/phantomload.asp>

Top 16 Things – Save \$ with NO initial cost



1. Turn off (or even better, unplug) appliances

- (consider a power strip), cord instead of cordless phones



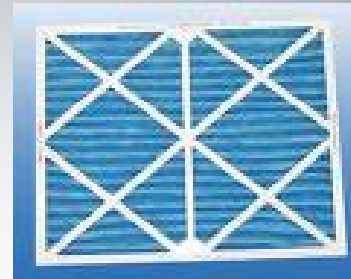
2. Turn off water faucet,

- shower not baths, flow
- change shower head





3. Clean air-conditioning filters
(it save electricity, and it's good for your health)



3. Tune-up car, keep balanced,
Accelerate minimum only.

*This can increase the
MPG by 10Miles/gallon



Green means it's also good for your HEALTH.

5. Turn down Water heater, and air conditioner settings

- Use sheets instead of blankets

6. Turn off PC, printers, when not using:

- Use Laptop instead of PC



7. Use cold water for washing cloths!

- Hang clothes if possible

8. Use dishwasher only when full

- Wash by hand if possible





9. Eating habits:

- Eat less meat (less methane);
- Eat local products

10. Plant trees

- They also lower house T in summer,
- They reduce CO₂

11. Car pooling, walking or biking

12. Avoid sanitary dishes/napkins

- Both styrofoam or paper



13. Buy products with least packaging

- Large family packs
- Gift bags instead of wrapping
- Water bottles! ☹️ - use refillable bottle



Packaging and clean water production needs a lot of energy and releases tons of CO₂ in the atmosphere annually.



14. Be a wise consumer

- Buy less
- Give away things you not longer use.



15. Recycle! –it saves a lot of energy/emissions

- (plastic, paper, cardboard, cans, glass)



16. Email your senators, government officials:

- Sign petition at www.undoit.org
- Sign petition at climatecrisis.org




Top 10 Things – Save \$ with some initial cost



You will recover the initial costs quickly and at the same time, reduce emissions greatly.


1. Consider solar water heater
2. Replace light bulbs with coiled fluores






A Bright Idea



ENERGY STAR® qualified compact fluorescent lamps, or CFLs can save a homeowner \$25-\$50 over its lifetime.



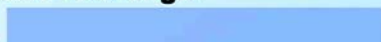

CFLs vs. ordinary bulbs

CFLs use 75% less energy




CFL	
Light Bulb	

CFLs last 10x longer

CFL	
Light Bulb	

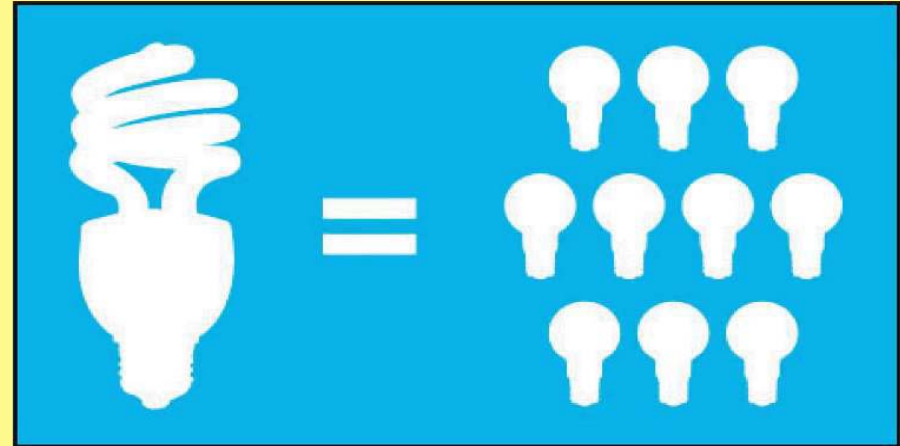
To enjoy these savings, look for the ENERGY STAR® label.

For more information, visit www.myenergystar.com



Source: U.S. Environmental Protection Agency

THE COST BENEFITS OF ENERGY STAR PRODUCTS



2 FEBRUARY 2006



Top 10 (cont...)



- 3. Consider new appliances with Energy Star*
- MYTH: Not all new appliances are energy efficient!! Check the labels carefully.
- 4. Choose LCD over Plasma TV!

Is one of America's coolest crooks robbing you blind?



ENERGYGUIDE

Compare the Energy Guide label with others to help you choose the most energy efficient product.

EnergyGuide labels help you compare the energy efficiency of different models. The label shows the estimated annual energy cost for each model. The model with the lowest estimated annual energy cost is the most energy efficient.

Look for the Energy Star logo on the label. Energy Star products are the most energy efficient available.

For more information on Energy Star products, visit www.energystar.gov.

Estimated Annual Energy Cost

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Top 10 (cont...)

Transportation accounts for 67% of oil used!



5. Consider buying a small car or a Hybrid,
6. Use public transportation
7. Eat organic products (better health, less Br)
8. Consider wind or solar power
9. Use silicone or dark baking pans
10. Use reusable plastic or cloth coffee filter

Green means it's also good for your HEALTH.

In summary...

\$ave Money,
improve **your Health,**
Save the Planet!



In doing so, we are indirectly helping the extreme poor...
...is our moral responsibility.



Take action!

**Stop
Global
Warming**

We are ONE human race;
we only have ONE planet.



Let's use its resources efficiently
so that we can all benefit from it.



With your help...
...we can save the World!

References:

- The End of Poverty by Jeffrey Sachs
- Weather Makers by Tim Flannery
- An Inconvenient Truth by Al Gore
- The World is Flat by Thomas Friedman
- Global Warming by Chris Spence
- Pathologies of Power, Paul Farmer
- www.nasa.gov
- www.ncdc.noaa.gov/oa/climate/globalwarming
- www.povertymap.net
- www.unmillenniumproject.org
- www.st-edmunds.cam.ac.uk
- www.noaanews.noaa.gov/stories2007/s2772.htm
- www.borgenproject.org
- www.unicef.org
- www.energyhog.org **GREAT for KIDS!! (games)**



Global warming: Causes and effects

Earth's temperature has risen about 1 degree Fahrenheit in the last century. The past 50 years of warming has been attributed to human activity.

Burning fuels such as coal, natural gas and oil produces greenhouse gases in excessive amounts.

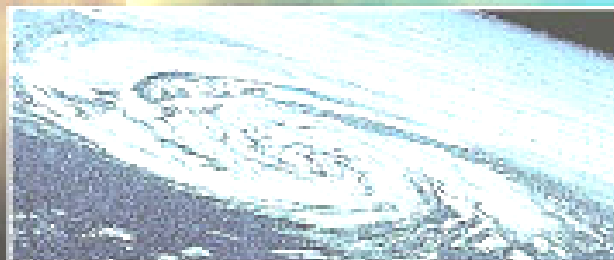
Greenhouse gases are emissions that rise into the atmosphere and trap the sun's energy, keeping heat from escaping.

The United States was responsible for 20 percent of the global greenhouse gases emitted in 1997.

Most of the world's emissions are attributed to the United States' large-scale use of fuels in vehicles and factories.

During the past 100 years global sea levels have risen 4 to 8 inches.

Some predictions for local changes include increasingly hot summers and intense thunderstorms.



Damaging storms, droughts and related weather phenomena cause an increase in economic and health problems. Warmer weather provides breeding grounds for insects such as malaria-carrying mosquitoes.

Costa Rica



First official lost species due to Global warming:
the **golden toad**

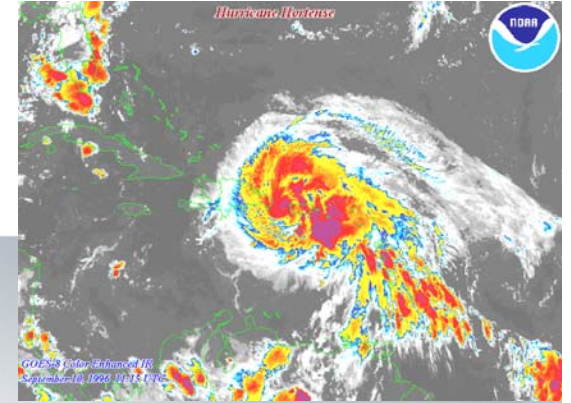


Female



Male

Hurricanes



- 10 hottest years ever, occurred in the last 14 yrs.
- 2006 was the hottest on record ever. (NOAA, 2007)
- 2004 1st hurricane ever in the S. Atlantic Ocean
- 2005 highest # of hurricanes,
 - most intense, 6 Greek letters
- 2005 Wilma strongest hurricane ever recorded AO

Then...

- 2006 Monica strongest hurricane ever recorded
- Luckily, this year (2006), El Niño decreases # hurricanes

Environment

THE WORLD BANK GROUP

ONE Example is this napkin:

Small changes, make a big difference:

By using this napkin, the World Bank Group Food Services is proudly saving valuable natural resources annually.

•268 Trees

•110,000 Gallons of Water

•47 Cubic Yards of Landfill Space

•65,000 Kilowatt Hours of Electricity

•945 Pounds of Greenhouse Gas Emissions



100% Recycled Paper • 100% Soy based ink • 100% Bleach-Free Process