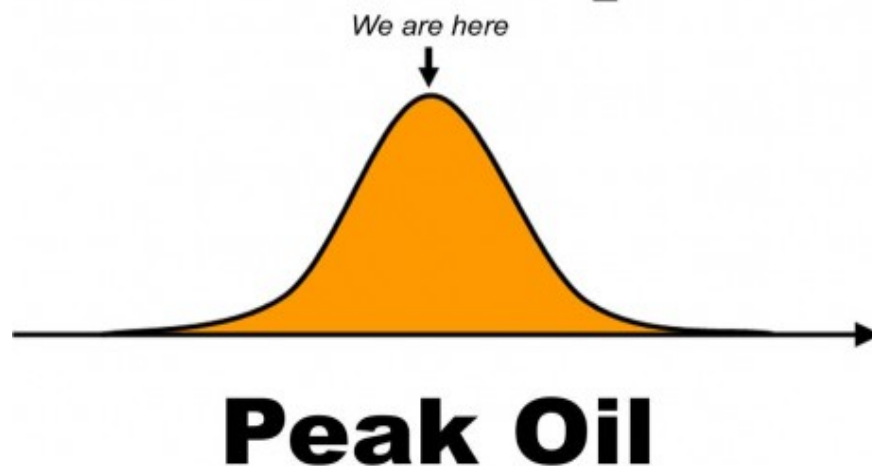


Peak Oil

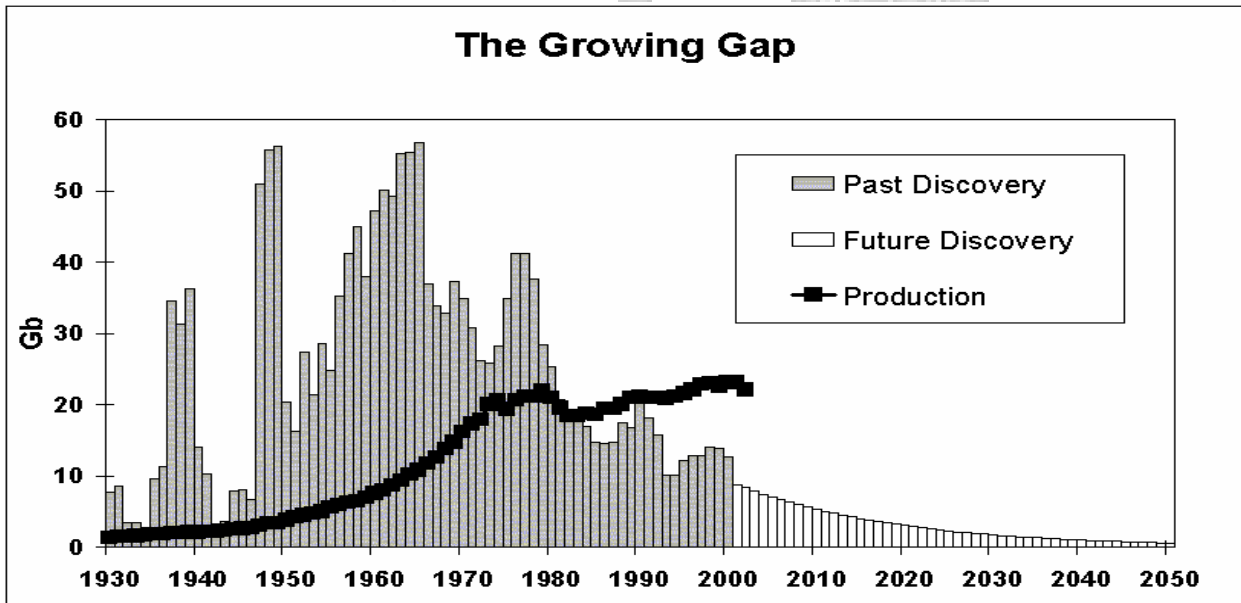
Wake up!!!



Peak Oil is the point at which less oil is available to drill than is already being used. Oil experts think this point is within ten years and may already be here. The Saudis have the largest oil reserves on the planet and Saudi oil production dropped by 8% in 2006.

World Oil Discoveries

The graph below shows how discoveries of oil have declined over the past 40 years, whilst production has continued to rise.



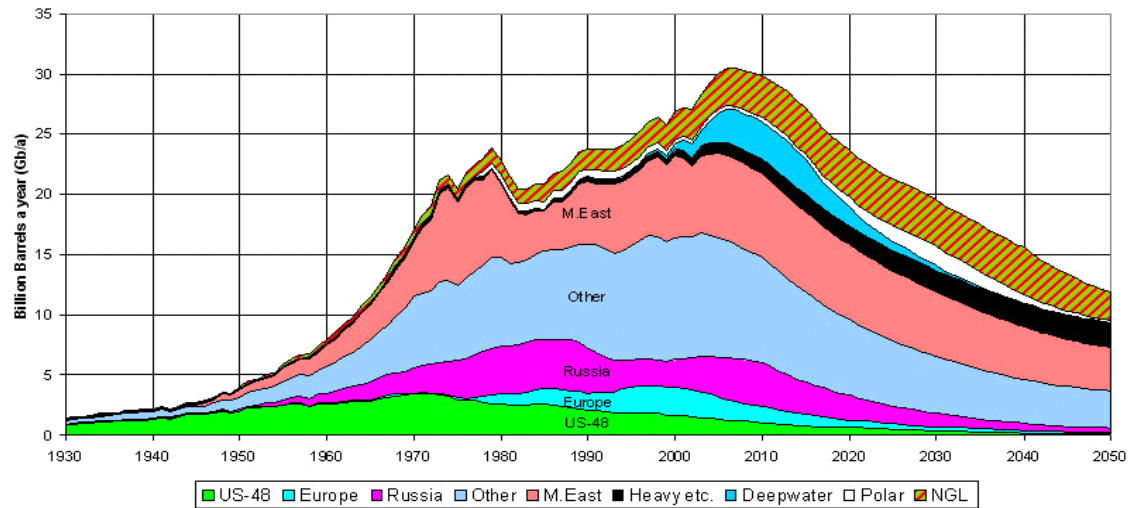
The discovery of conventional oil peaked in the 1960s. We now find 1 barrel for every 4 we use.

50 million barrels of oil is the average size of current oil fields being discovered.

86 million barrels of oil are being consumed each day.

Total World Oil Production

OIL AND GAS LIQUIDS 2004 Scenario



Around 1/3 of oil production is in decline at 4% pa, reducing available oil supplies by **1 million barrels/day**.

Current Situation

The energy costs of oil extraction have risen from 5% in the 1950s to 20% in the 1990s to, for example, 66% for difficult locations such as the Athabasca tar sands.

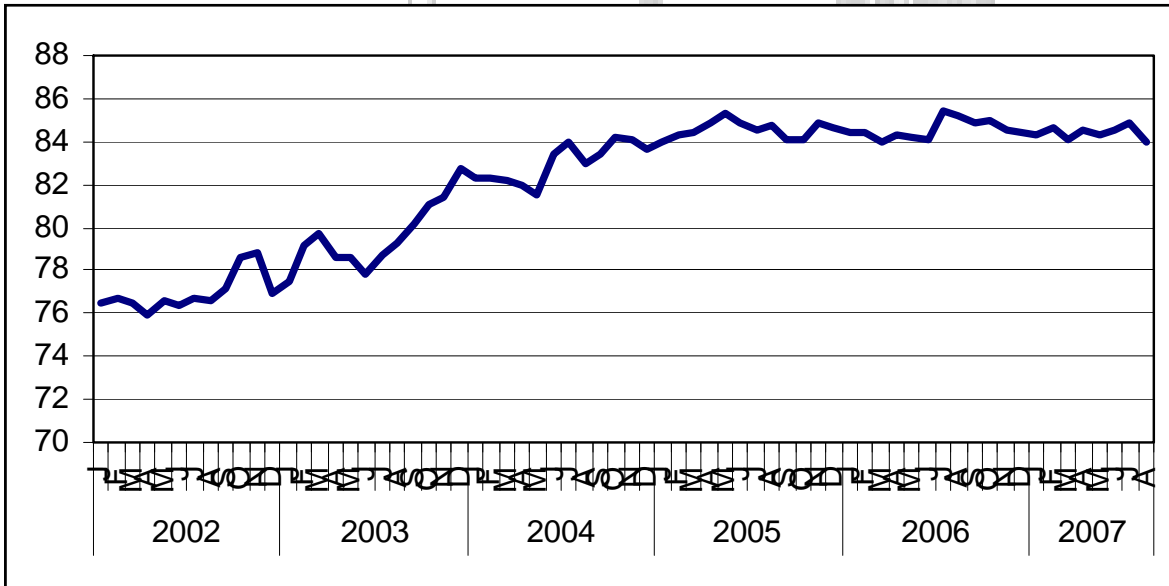
Food travels an average of 1300 miles from farm to plate.

It takes 6 barrels of oil to bring 1 cow to market.

World Oil Production 2002-Aug 2007

This graph below indicates that **world oil production has been static for the last 3 years**, in spite of most agencies stating that demand is rising by about 1.4-1.9% pa and is predicted to carry on rising.

World Oil Production 2002-Aug 2007



Dr. Bakhtiari, energy expert ex National Iranian Oil Company recently quoted:

"The peak of global oil production has been reached."

Bakhtiari (March, 2007) sees the world entering a phase of irreversible decline in daily oil output, moving down from the current **82mb/d to only 55mb/d by the 2020.**

The USA reached Peak Oil in 1971

The UK reached Peak Oil in 1999

Australia reached Peak Oil in 2000

Impacts of Peak Oil

In 2005 the Hirsch report found that the peaking of world oil production presents the world with “*an unprecedented risk management problem*”. Liquid fuel prices and price volatility will increase dramatically, and, without timely mitigation, the economic, social, and political costs will be unprecedented.

Oil is used for all manufactured goods as well as to produce and process food, water and for the distribution of goods and services.

Transport is around 95% dependent on oil, and will be the first victim of price rises and supply disruptions.

There are currently:

736 cars per person in the USA

470 cars per person in the UK

7 cars per person in China

As the population and economy of China grow the number of cars per person is likely to increase dramatically, is this sustainable as the global oil supplies dwindle?

Useful References:

Campbell, C, 1998, *The Coming Oil Crisis & The End of Cheap Oil*
Published in *Scientific American*.

Heinberg, R, 2006, *The oil depletion protocol: a plan to avert oil wars, terrorism, and economic collapse*. Clairview Books, London.

Hirsch, R, 2005, *Peaking of World Oil Productions: Impacts, Mitigation, and Risk Management*. National Energy Research Lab for US Department of Energy

Strahan, D, 2007, *The Last Oil Shock: A Survival Guide to the Imminent Extinction of the Petroleum Man*, John Murray, London.

www.peakoil.net Association for the Study of Peak Oil and Gas

www.theoil drum.com

www.energywatchgroup.org - Publications include:

Oil Report, Coal Report, Uranium Report.

www.opec.org Organization of the Petroleum Exporting Countries



Renewable Energy Office
REOC
Renewable Energy Office for Cornwall
Monument House
58 Coinagehall Street
Helston
Cornwall, TR13 8EL
www.reoc.info