## BEGINNERS GUIDE TO REACH (The new European chemicals regulation)

The new European chemicals legislation is intended to give the public greater protection from intentionally produced chemicals. It is the biggest and most important regulation in twenty years.

REACH (Registration, Evaluation and Authorisation of Chemicals) will completely change the way chemicals are controlled.

The regulation will be published on October 29<sup>th</sup>. It will pass through the European Parliament in 2004 and should become law in 2005. When it comes into force, chemical companies will, for the first time, have to provide basic health and environmental safety data on the chemicals they produce. (Currently only chemicals that started production after 1981 require this data - that is less than 10% of chemicals on the market).

REACH will then identify extremely hazardous chemicals and give them a special classification as "substances of very high concern". These chemicals will be few in number (perhaps around 2000) but will require a special licence for production, even ones that have already been on the market for many years. This license will be called an authorisation. One of the goals of REACH is to ensure chemicals of very high concern are phased out and replaced with suitable, safer alternatives.

A chemical is classified as of very high concern if it can cause cancer, damage genetic material or is a reproductive toxin. Any chemical that cannot be broken down by nature and builds up in the bodies of human beings or wildlife is also classified as of high concern, even if there is no evidence that it is toxic. This is because many substances that do this eventually turn out to be toxic even though they are at first thought safe. Examples from the past are PCB's, DDT, asbestos and TBT. Substances that are known to interfere with the bodies hormone system are the final category that will require an authorisation.

A significant number of chemicals that are likely to be classified as "substances of very high concern" are in a variety of consumer products. Greenpeace commissioned independent research that found nonylphenol in children's pyjamas, toys household paints and cleaners. Brominated flame retardants are in computers, televisions, carpets and upholstered furniture. Chlorinated paraffins are in bathroom sealants and plastics, phthalates are in perfume, shampoos and plastics and artificial musk compounds in detergents and air fresheners. Further research commissioned by Greenpeace found these and other chemicals in ordinary house dust and in children's bodies.

Because of the vast number of chemicals for which data is currently not available (100 000 known chemicals) REACH will prioritise data collection. About 30 000 chemicals will be included in the system. Those produced in the highest volumes and those already known to have dangerous properties will be dealt with first. REACH will also reduce the complexity of current chemicals legislation. New and old chemicals will be brought under the same regime and a number of other pieces of separate legislation will be brought under the one regulation

Another goal of REACH is to enhance the competitiveness of the European chemicals industry. It aims to do this by encouraging innovation (the old regulations stifled innovation) and by setting clear rules which will make the EU chemical industry a world leader in sustainable chemical production.

Will REACH work? Currently no. It contains an enormous loophole that means even if a safer alternative is available, at a comparable price, production of a chemical of very high concern can continue. The producer will have to demonstrate "adequate control". This issue goes right to the heart of chemicals policy (and wider). Experience shows that substances that are persistent and bioaccumulative cannot be controlled. Because nature cannot easily break them down and they are attracted to fatty tissue, they inevitably find their way into the environment and human bodies sooner or later. "Adequate control" is based on an acceptable level of risk. Greenpeace argues that when a safer substitute is available at a reasonable

cost, there is no need to take that risk. This is the substitution principle and it is a great driver for innovation and green chemistry.

It is now up to the European Parliament and Council, represented in the UK by MEP's and Ministers (particularly Margaret Beckett and Patricia Hewitt who sit on the European Councils) to close the loophole. Unless they do this, the legislation will not offer the improved protection for human health and the environment that has been promised.

## In summary REACH is designed to

- a) make chemical companies obtain and provide health and environmental safety data on their products for the first time
- b) identify and substitute chemicals with certain extremely dangerous properties
- c) enhance the competitiveness of the European chemical industry
- d) but it will not do any of these unless Parliament insists on improvements.