

NUCLEAR – A SUSTAINABLE FUTURE?

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SOME NUMBERS

1

14

The number of nuclear reactors that world has built over the course of this century – 1/year

The number of nuclear reactors the world must build each year between now and 2030 to maintain the present level of nuclear power in the world as older reactors need replacing - 14

MORE NUMBERS

2

2.3

17

The amount of additional nuclear capacity added globally in 2007 – 2GW

The amount of additional capacity added by photovoltaics in 2007 – 2.3GW

The amount of additional capacity added by wind in 2007 – 17GW

A REALLY IMPORTANT NUMBER

1

The number of suppliers in the world of the special forgings needed for reactor cores - 1

EVEN MORE NUMBERS

1,000

2,000

4,500

6,000

9,000

2,000,000,000

The lowest of fairly recent academic estimates of the capital cost of new nuclear - \$1,000/kW

The highest of fairly recent academic estimates of the capital cost of new nuclear - \$2,000/kW

The average actual cost of recent new nuclear reactors built in Asia - \$4,500/kW

Standard & Poor's 2007 estimate of the capital cost of new nuclear build - \$6,000/kW

A recent estimate from an EoN spokesman of the capital cost of new nuclear build - \$9,000/kW

The cost over-run after two years of the new nuclear power station under construction in Finland – \$2,000,000,000

SOME OTHER NUMBERS

0

50

25

2012

2020

40

4

The percentage of UK oil that can be replaced by new nuclear build – 0%

The percentage of current UK gas consumption for domestic heat that cannot be replaced by new nuclear build – 50%

The percentage of UK gas consumption used as feedstock and for industrial applications that cannot be replaced by new nuclear build – 25%

The date by which the supposed generation gap will appear in the UK – 2012

The date by which, if all goes according to plan, new nuclear build can supply electricity to the UK grid – 2020

The number of new nuclear power stations China plans to build by 2030 – 40

The proportion of Chinese electricity demand that this programme would meet – 4%