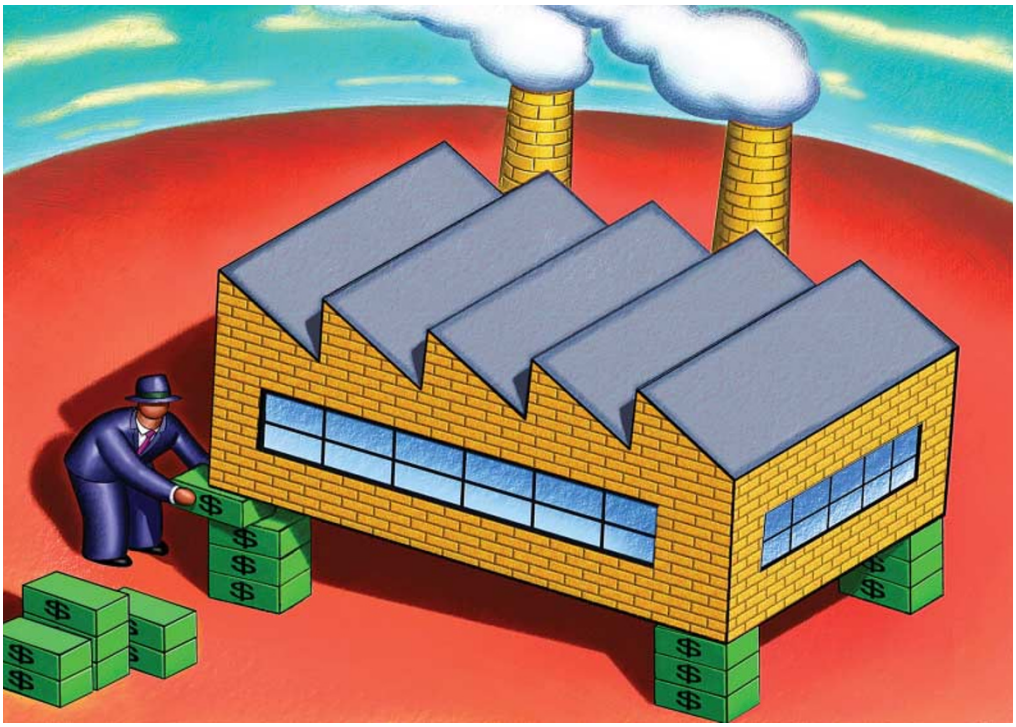
NATUREVIEW
REVIEWS AND COMMENT FROM THE NATURE PUBLISHING GROUP



▲ **Focus on Biomanufacturing and Bioprocessing.** *Nature Biotechnology* November (2004) **This issue contains a selection of news, commentary and reviews discussing important topics in biomanufacturing and bioprocessing. Articles include a review of recombinant protein folding and misfolding in *Escherichia coli* by François Baneyx and Mirna Mujacic, whilst Tillman Gerngross discusses recent advances in the production of human therapeutic proteins in yeasts and filamentous fungi.**

▲ **Magnetic field benefits bacteria.**
Peplow, M.
Nature 26th November (2004)
This News article reports that a weak magnetic field can affect production of chlorophyll in the photosynthetic bacterium *Rhodobacter sphaeroides*.

• **The how and Y of cold shock.**
Wilson, D. N. & Nierhaus, K. H.
Nature Structural and Molecular Biology November (2004)
This News & Views article comments on a structural and biochemical analysis of an essential stress protein (RaiA, also known as protein Y) in *Escherichia coli* that provides the first detailed insights into a bacterial translation initiation inhibition mechanism that enables cells to cope with cold shock. This mechanism might be a conserved stress response in bacteria and chloroplasts.

• **Immunology of sexually transmitted *Chlamydia trachomatis*: implications for a vaccine.**
Rey-Ladino, J. & Brunham, R. C.
Nature Reviews Immunology January (2005)
With more than 90 million new cases of *Chlamydia trachomatis* infection annually worldwide, understanding the host response to this bacterium is essential. This review article discusses research carried out in humans and mice that has led to a model for immunity in *Chlamydia*.

• **Another detour on the Toll road to the interferon antiviral response.**
Hiscott, J.
Nature Structural and Molecular Biology November (2004)

• **Archaeal genetics — the third way.**
Allers, T. & Mevarech, M.
Nature Reviews Genetics January (2005)
A lack of genetic tools for archaeal species, which thrive in all habitats, not just extreme habitats, has hampered researchers keen to capitalize on the available archaeal genome sequences. In this review, the authors examine the fascinating biology of the Archaea and describe the sophisticated genetic tools that have now been developed for these species.

• **Focus on Infectious diseases.**
Nature Medicine November (2004)
In this issue a selection of articles highlight the major biomedical achievements of the past decade, and a complementary web focus draws together relevant historical *Nature Medicine* articles (Historical News, News and Views, Perspectives) from the past ten years.

▼ **Focus issue on Cell biology of disease.**
Nature Cell Biology November (2004)