



# touching base

## And the Winner Is . . .

Participants at the Human Genome Meeting '96 held in Heidelberg in March had a tough decision to make in the contest sponsored by *Nature Genetics* to select the best poster from over 500 presented. But after the votes were tallied, the results were as follows. First place, a handsome cash prize and a year's subscription to *Nature Genetics* and *Nature*, was awarded to B.P. Chowdhary, L. Frönicke, T. Raudsepp, I. Gustavsson & H. Scherthan of the Swedish University of Agricultural Sciences in Uppsala and the University of Kaiserslautern in Germany, for their work entitled 'Comparative organization of the human, pig, cattle and horse genomes.' Second place (and a year's subscription to the sister journals), went to K. Bernard, S. Granjeaud, N. Auphan, B. Jordan & C. Nguyen of INSERM/CNRS in Marseilles, France, for quantitative measurements of gene expression by 'Multiplex Messenger assay'. And third place (and a year's subscription to *Nature Genetics*), went to another Swedish group, led by M. Ronaghi at the Royal Institute of Technology in Stockholm, who described real-time DNA sequencing using an enzymatic luminometric detection assay. *Nature Genetics* thanks everyone involved in judging the contest.

## Chromosome Workshop Standstill?

A shortage of money threatens to deplete attendance at the individual chromosome workshops this year, and could represent the final year that they are held. The organizer of one upcoming meeting, for example, says that the \$20,000 provided by the National Institutes of Health and the Department of Energy is sufficient to cover the expenses of only about a quarter of the 60-70 major contributors in the field who ought to attend. Some organizers have sent out pleas for support to corporations and potential sponsors to try to make up the difference. Although there is broad agreement that the mapping phase of the human genome project is drawing to a close, supporters of the workshops argue that they still provide a valuable service in compiling integrated maps of chromosomes, and fostering meaningful collaborations with investigators from smaller groups that might not be able to compete with the well-funded genome centres.

## Deciphering Dino DNA

In Michael Crichton's best-selling novel *Jurassic Park*, fragments of dinosaur DNA retrieved from the blood of prehistoric insects encased in amber were used as genetic templates to recreate the extinct creatures. But Crichton slipped up when his fictional chief scientist, Dr. Wu, discussed a specific example of 'dino DNA': Alan Christensen & Steven Henikoff (*Nature* **358**, 271; 1992) and Mark Boguski at the National Center for Biotechnology Information (*BioTechniques*, **12**, 668-669; 1992), found that the sequence was none other than plasmid pBR322. Boguski wrote: "My respect for Dr. Wu's scientific ability vanished. After all, he was unable to determine with three Crays what it took me two minutes on a Macintosh to discover." But the story does not end there. After Boguski notified Crichton of his findings, the best-selling author invited him to contribute a sequence of his own to the recently published sequel. And so, on page 134 of *The Lost World*, Crichton treats his readers to the amino acid sequence of *Gallinimus* erythrocyte-specific transcription factor, eryf1, as well as an unspecified nucleotide sequence (see below). A few nimble computer manipulations might reveal whether the DNA sequence corresponds to the putative transcription factor. According to Boguski, the sequence also contains a hidden message that not even Crichton himself knows about. Now what could that be?

1	GAATTCGGGA	AGCGAGCAAG	AGATAAGTCC	TGGCATCAGA	TACAGTGGGA	GATAAGGACG
61	GACGTGTGGC	AGCTCCCGCA	GAGGATTAC	TGGAAAGTGA	TTACTATATCC	CATGGGAGCC
121	ATGGAGTTCG	TGGCGCTGGG	GGGGCCGAT	GGGGCTCCC	CCACTCCGTT	CCCTGATGAA
181	GCCGGAGCCT	TCTCTGGGCT	GGGGGGGGG	GAGAGGACGG	AGCGGGGGG	GCTGTGGCC
241	TCCCTACCCC	CCTCAGCCG	CGTGTCCCTG	GTGCCGTGGG	CAGACACGGG	TACTTTGGGG
301	ACCCCCCAST	GGGTGGCCGC	CGCCACCCAA	ATGAGGCCCC	CCCCTACTCT	GGAGCTGGTG
361	CAACCCCGCC	GGCGACGCC	CCCCTATCC	TCCCTCCGGG	CCCTACTGCG	ACTCAGCAGC
421	GGCCCGCCG	CCTGCGCCG	CGCTGATGCG	GCTGATGGCG	GGGAAGAATG	CGGAGCGACG
481	GCAACGCCG	TGTGGCCGCG	GGACCGCAC	GGGCATTACC	TGTGCAATCG	GGCCCTCAGC
541	TGCGGGCTCT	ACCACCGCCT	CAACGCCGAG	AACCGCCCG	TACTCCGCTG	CAAAAAGCGC
601	CTGCTGGTGA	GTAAGCGCCG	AGGCACAGTG	TGCAGCCAG	AGCGTGAATA	CTGCCAGACA
661	TCCACACCCA	CTCTGTGGCG	TGCGACGCC	ATGGGGGACC	CCGCTCTCAA	CAACATTCC
721	GCCTGCCGCC	TGTACTACAA	ACTGCACCAA	GTGAACCGC	CCCTCAGATT	GGCCAAAGAC
781	GGAAATCAA	CCCGAAACCG	CAAAGTTTCC	TCCAAGGTTA	AAAAGCGCGC	CCCCCGGGG
841	GGGGAAAC	CCTCCGCCAC	CGCGGGGGG	GGCGCTCTTA	TGGGGGAGG	GGGGACCCG
901	CTATGGCCC	CCCGCCGCC	CCCGCCGCC	GGCGCCCGC	CTGAAGCGA	CCCTCTGTAC
961	GCCTGCGCC	CGGTGGCTCT	TTCCGGCTCT	TTCTTGGCTT	TGGAAGCTC	CGGAGGTTT
1021	TTTGGGGGG	GGCGGGGGG	TTACACCGCC	CCCCCGGGC	TGAGCCCGCA	GATTTAAATA
1081	ATAACTCTGA	CGTGGGCAAG	TGGGCTTGG	TGAGAAGACA	GTGTAACATA	ATAATTTGTA
1141	CCTCGGCAAT	TGCAGAGGGT	CGATCTCCAC	TTTGGACACA	ACAGGGCTAC	TGGGTAGGAC
1201	CAGATAAGCA	CTTTGCTCCC	TGGACTGAAA	AAGAAAAGAT	TATCTGTGTT	CGCTTGTGCA
1261	GACAATATCC	TGTGAAAGGT	AAAAGTCGGA	CACAGCAATC	GATTTATTTG	CGCCGTGTGT
1321	AAATFACTGT	GAATATTGTA	AAATATATATA	TATATATATA	TATATCTGTA	TAGAACAGCC
1381	TCCGAGGCGG	CATGAGCCCA	CGGTAGATCA	TGCTGGATT	GTACTGCCGG	AATTC

## BSE, CJD and the MRC

In response to the growing concern in the United Kingdom regarding the possible link between bovine spongiform encephalopathy (BSE, or 'mad cow disease') and Creutzfeldt Jakob disease (CJD) in humans, the Department of Health has announced plans to set aside up to £40 million for research. The Medical Research Council (MRC) has temporarily suspended a proposed call for new research proposals until further details of the government's intentions become available. At the moment, the MRC spends about £600,000 annually on research into spongiform encephalopathies, with most of the money going to Western General Hospital in Edinburgh. The CJD Surveillance Unit at the hospital, led by Dr James Ironside, recently reported (*Lancet* **347**, 921-925 (1996)) that ten patients had contracted an early-onset form of CJD, fueling speculation that they might have acquired the disease from infected cattle. Meanwhile, the British government is considering plans to slaughter 4.5 million of the oldest cattle out of a total of some 11 million animals.

## Transgenics Come Up Trumps

The first March of Dimes Prize in Developmental Biology has been awarded to Ralph Brinster, of the University of Pennsylvania School of Veterinary Medicine, and Beatrice Mintz, of the Fox Chase Cancer Center in Philadelphia, for their pioneering work in developing transgenic mice. The two scientists share a \$100,000 prize awarded to them last month in New York City. Dr Brinster has made important contributions in the field of embryonic development for more than 30 years, most notably in the creation of transgenic 'supermice' in the early 1980s. Dr Mintz, whom the foundation calls 'an iconoclastic thinker', is credited for her work on embryonic gene transfer in the 1970s. The March of Dimes set up the prize in honour of Jonas Salk shortly before he died last year. Dr Salk was being funded by the foundation when he developed the polio vaccine.

## If the Cap Fits

In a recently announced deal between arguably the two best known DNA fingerprinting companies in the United States, LifeCodes, a private, employee-owned company based in Stamford Connecticut, has purchased Cellmark Diagnostics, a wholly owned subsidiary of Zeneca, Inc. Lifecodes was founded in 1982 and serves as a testing laboratory for forensic and paternity cases. The company is also the leading supplier of DNA reagents and products for DNA fingerprinting applications, and is active in the development of products and services for HLA typing and autoimmune antibody testing. Cellmark is the largest commercial laboratory conducting forensic testing in the United States, most notably during the murder trial of the former football star, O.J. Simpson. Lifecodes hopes the acquisition will enable it to expand its presence in foreign markets in part through the establishment of additional testing laboratories.