PROBABILITY-1: TERMINATION

Minuscule moves in the struggle for funds.

BY EUAN NISBET

hrough the days just before the inauguration of Lady Clinton as Viceroy, Washington buzzed with speculation and intrigue. In St Petersburg, the Tsar's spokesman denied that Preobrazhensky Guards were moving to the Alaska–Yukon border. Peking's Dowager Empress was silent, even though the Kaiser had despatched SMS Bismark to Tsingtao, overruling Chancellor Kohn's anguished pleading. In Foggy Bottom, the press clamoured for a statement from the Secretary. There'd been no fighting since 1918, when the Jerusalem Treaty ended the War of Turkish Succession. But despite a century of universal prosperity, clouds were dark.

Deep in the Smithsonian's corridors, two postdocs gloomily discussed events. "They can't fight, of course," Tom Garcia said. "There are only five battleships on the whole planet, and each empire is limited to 10,000 soldiers. But the League of Nations will impose huge sanctions."

Sara Chakrabarti, fellow in molecular palaeontology, was in misery. "We're breaking contract. It'll be a monster indemnity. Tens of billions. They'll take it out of the science budget, of course. We'll lose our funding."

Ever since the Turkish War, the League had diverted almost all the former military expenditure to science, reasoning that science is the principal beneficiary of war. Conversely, each time the League imposed sanctions, payment came from the science budget of the offending empire.

The birth of the Princess Heir Apparent had triggered the chaos. The Dowager of China loudly demanded betrothal to the three-year-old Emperor Hsüan-tung II, with Hong Kong as the dowry. Russia, supported by the Kaiser, justifiably claimed that the Princess was promised to the five-year-old Tsarevich, quoting an unwise commitment by a previous Prime Minister in London. Given the trade implications, British North America, India and Australasia all supported the Chinese proposal. Unhelpfully, from her winter palace in Nairobi, Queen Elizabeth, in council with former Viceroy Mandela and Archbishop-emeritus Tutu of Canterbury, proposed the extraordinary notion that the baby choose for herself when she came of age.

Reaching the bottom of the whisky bottle, Tom was scolded by Sara: "You're a quantum teleportationist! Can't you do something? Teleport us some gold bars out of Fort Knox, maybe?"



Tom sank his glass in misery. "Not a hope! Teleportation works in all space and all time. But it's incredibly selective. I can only wiggle single atoms, not kidnap gold bars. And I have to identify exactly a unique receptor at one specific moment in time, in all the long history of the entire Universe."

Sara yelled at him: "Useless!" She fell silent.

They sat in gloom for hours. Tom was washing in the depths of Russia's soul, Shostakovich's mighty 7th, *The Peace of Jerusalem*, when Sara suddenly muttered: "Maybe..."

"Maybe?" Tom asked.

"If you can rebuild just a molecule, then maybe," she said.

"All I can do is jiggle a few atoms. But I repeat: the target has to be specified. A single unique molecule, the only one in the Universe at that exact time."

Frantic days followed. Despite support from the outgoing American viceroy, the newly elevated Duke of Chicago, the Queen was overruled by Congress and India's Lok Sabha. Yukon and £250 billion placated Russia; Germany got Hanover but left Tsingtao; Constantinople's Sublime Porte signed the $\rm CO_2$ Treaty for Turkish Arabia. Thus, Britain and China united, delighting American and Australian miners. India rested peacefully; Japan exhaled. All rejoiced, except the scientists. Sara and Tom expected layoff imminently.

Luckily Sara had privileged access to the

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Smithsonian collection. One night she crept into the exhibition commemorating the American Royal

Visit of King George the Wise, whose meeting with Field Marshal Washington led to the Great Democratic Reforms of 1783. A lock of George III's hair, given to the redoubtable Abigail Adams, was now in the museum.

As she delicately lifted a single strand of the king's hair, Sara noticed another royal lock nearby: a knot of Victoria's lovely cascades on loan from the Queen for the Inaugural celebrations. Sara quickly lifted that strand too, and scuttled back to her lab.

Two days later she had the DNA sequences of each monarch. All she needed now was their dates of conception, when their DNA molecules had been single, unique. That took guessing but they could spread the signal a bit.

Tom surfaced from the sublime bowels of the Sibelius 8th. "We can't do this! Changing history? Anything can happen!!"

Sara insisted. "Be patriotic! Stand up for the Union and Stripes! You're just jiggling a few atoms. George will have a chronic illness, so he'll be a less-effective bargainer in 1783. Remember how he out-negotiated Washington on American contributions to the Crown fiscus to pay the Royal Navy's budget? If King George hadn't won such a large share of military costs, the science budget here in America would be less at risk. Likewise if Victoria's Russian descendants have problems, we'll probably get away with a smaller fine and we might even keep the Yukon."

"Too dangerous!"

"Chicken!! The situation is terrible! Some soldier might even be hurt! Just tweak two little molecules! It's impossible to do long-term damage. All scholars agree history is inevitable, determined by mass movements. Tolstoy proved that. So did Sir Charles Marx."

She projected a 3D molecular hologram. "This is George the Wise's DNA. Target the day the sperm met the egg. Just switch these atoms," she pointed. "And here's Victoria's. Change her DNA this way."

"What will this do?" Tom asked as his finger hovered, ready to press the button.

"Nothing deadly — it'll just make George a little odd occasionally. It won't affect Victoria at all, or her son — only the female line marrying Russian royalty." Tom's finger pressed down as she added confidently: "For George, mild porphyria. For Victoria, haemophi ..."

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