

Delprove 2 A

General instructions

1. Answer all the questions **in this section**. The answer **to each question must be given separately**.
2. **The total length of your paper must be about 600-900 words.**

The texts in this section focus on the possibilities of technology:

1. Write a summary of *Something New* in no more 150 words.
2. How do the four texts account for the advantages and disadvantages of technology?
3. Comment on the attitude in TEXT 1, lines 18-20 "Why do we only value the average? Why are plastic surgeons dedicated only to restoring our current notions of the conventional, as opposed to letting people explore, if they want, the possibilities"?
4. In a short essay discuss to what extent people should make use of technology when expecting a baby.

Texts:

1. Johann Hari, "I'm having my Wings done." *The Guardian*, March 11, 2002.
2. Robin McKie and Duncan Mackay, "Gene cheats aim to conquer Olympics." *The Observer*, May 13, 2001.
3. Nancy Smithers, "A Modern Baby" (1991). In *Visions of Technology*, ed. Richard Rhodes, Touchstone 1999.
4. Brian McCabe, "Something New." In *Scotland into the New Era*, Canongate 2000.

Johann Hari

I'm having my wings done

(Excerpt from an article in The Guardian, March 11, 2002)

It's the stuff of science fantasy, but a respected American surgeon says that, within five years, he will be able to graft wings and tails on to human beings. Johann Hari on the bizarre world of radical plastic surgery:

The TV sketch show *Smack the Pony* recently featured a hilarious scene in which a woman turned up at a plastic surgeon's clinic bearing a picture of a wolf. "I want to look like this, please," she explained, and people chuckled in living rooms across Britain. Across the Atlantic, however, there is a respected plastic surgeon who really is working on plastic-surgery techniques which could make us resemble animals in ways we can't even imagine today.

Dr Joe Rosen is not a quack. He works at the acclaimed Dartmouth Medical Centre, and has been a scientific advisor to Nasa. He is fond of making statements such as: "Human wings will be here. Mark my words." He believes in all seriousness that within five years he will be able to graft wings on to a human being's body. This is possible because our brains adapt to create neural maps for new
10 body parts. When we have a limb amputated, our neural map of that limb gradually fades away; and if we gain a body part, our neural map expands accordingly. "If I were to give you wings, you would develop, literally, a winged brain. Our bodies change our brains, and our brains are infinitely mouldable," Rosen has said.

Surgical techniques already in existence can be used to stretch torso fat and rejig rib bones to create
15 a wing. Although no human would be able to fly, they would resemble angels and have full sensation in their new hanging, boned flaps of flesh. Rosen has designed blueprints. This is the new world of radical plastic surgery, where Rosen is Moses. In a conference speech last year, Rosen asked: "Why do we only value the average? Why are plastic surgeons dedicated only to restoring
20 our current notions of the conventional, as opposed to letting people explore, if they want, the possibilities?"

If the medical-ethics board allowed it, Rosen insists he would carry out these procedures. And, as the case of Severino Antinori, the Italian doctor hell-bent on cloning a human, shows, once the technology and the will to experiment exist, it is very hard for even the most overwhelming ethical qualms to block these actions. Sooner or later, Rosen's plans will be put into action.

25 So it's time that we started to ask serious questions about the people who will be the guinea pigs in the radical plastic-surgery revolution. Put bluntly, who the hell would want wings or a tail? We can perhaps find answers by looking at people today who have already changed their bodies in radical and seemingly unnatural ways. Jim Rose, the head of a gross-out travelling circus or "freak show", has considerable experience of people who drastically alter their bodies. A former colleague of his
30 known as Enigma now has horns. Seriously. Enigma's horns are implanted deep into his skull. They are made of coral, which is recognised by the body as similar to bone.

5 Jim Rose has interesting insights on the psychology of people drawn to this kind of procedure. "If there's one thing that the outrageously altered have in common, it's an incredible need for attention. Most of them in their past have felt overlooked, usually by a parent. Because of their desperate need for attention, they're usually happier after they've been altered [for example, by being covered with tattoos]."

This raises the obvious concern that people longing for these procedures are ill. Some social scientists argue that we are seeing in the west a "global pandemic" of Body Dysmorphic Disorder (BDD), a condition which causes victims to feel their bodies are imperfect and must be corrected, often with surgery. The best-known manifestations of BDD are eating disorders such as anorexia
10 and bulimia and, notoriously, individuals who have healthy limbs removed because they view them as ugly or extraneous.

There are complex ethical questions about whether cosmetic surgeons should do what an apparently sane patient requests, no matter how abnormal it might seem. Many plastic surgeons strongly disapprove of Rosen. Distinguished US plastic surgeon Dr John Hugill, for example, says that
15 Rosen "is way too far out, totally beyond mainstream medicine or mainstream cosmetic surgery. No plastic surgeon I know would do anything of this sort, and nor should he. He should be ashamed."

This forces us, however, to confront what has become mainstream in plastic surgery. Surgical techniques have developed so quickly that we have begun to think it normal that 2 million people slice their flesh open each year in Europe and America simply to improve its appearance. Fifty years ago, facelifts - which, after all, involve dragging the flesh on your face back behind your ears were seen as monstrous. If Cher and Michael Jackson have the right to disfigure themselves and yet still nudge their way into the mainstream, should Enigma and his horns be given the same rights?

TEXT 2

Robin McKie and Duncan Mackay

Gene cheats aim to conquer Olympics

(Excerpt from an article in The Observer, May 13, 2001)

Sports' governing body acts over fears athletes could change their DNA to go higher and faster.

Olympic officials are to hold emergency meetings over mounting fears that sport is about to be transformed by the creation of a breed of genetically-engineered 'super-athletes'. The move by the International Olympic Committee has stunned many observers who had thought that the dangers posed by cloning and molecular engineering were still remote.

5 But IOC experts now say the science of gene therapy - in which genes are added to the human body - is poised to radically change sport. Unless action is taken, athletes will begin tinkering with their own DNA to boost their muscle power, heighten their oxygen-carrying capacity, and transform their endurance, they say. And because genetic manipulation is virtually impossible to detect using current tests, it will undermine the concept of personal striving. As one athlete put it: "It is supposed
10 to be a test of human capability, not a genetic war."

Scientists acknowledge that instead of repeatedly taking pills or injections, as many athletes now do, it will soon be possible - with a single injection of genetic material - to sustain bulked-up muscle mass or heightened oxygen-carrying capacity for months or even years.

15 Some scientists and Olympic officials believe that crude forms of genetic engineering are already in use, at great risk to athletes. "I'd be totally surprised if it was not going on in sports," said Dr Nadia Rosenthal, an associate professor at Harvard Medical School and an expert on gene therapy. "Those with terminal cancer and Aids want to know 'What will keep me alive?' Athletes want to know 'What will make me win?'"

TEXT 3

Nancy Smithers

A Modern Baby

A thirty-six-year-old American lawyer responds to the new technologies of reproduction.

I was hoping I'd never have to make this choice, to become responsible for choosing the kind of baby I'd get, the kind of baby we'd accept. But everyone – my doctor, my parents, my friends – everyone urged me to come for genetic counselling and have amniocentesis. Now, I guess I'm
5 having a modern baby. And they all told me I'd feel more in control. But in some ways, I feel less in control. Oh, it's still my baby, but only if it's good enough to be our baby, if you see what I mean.

TEXT 4

Brian McCabe

Something New

(An excerpt from a Scottish science fiction story)

Jack had more or less replaced everything you could see, and a lot you couldn't: heart, lungs, liver and quite a few bones. Some things had been replaced many times. His face had undergone so many changes, he sometimes accessed and enhanced ancient facial images of himself, searching for an original face. It was impossible to find his real face, because ultimately all that came up was the
5 face he'd had as a baby, before his carers modified it according to their tastes. It was difficult to remove himself from their version of him, without a very expensive search. He had found only one image of himself as a baby: as naked as he was now, lying on a bed. It was the face that fascinated him: even although it had probably been genetically designed to some extent, it had a haunting quality.'

10 His new cock was good for the moment. He took it in his hand and was pleased to find that there was feeling in it. He was also very pleased with his new breasts.

Jill was taking a long time in the aurum. He wished she would hurry up and come to bed.

She was depilating. He could hear the faint buzz of the depilator, then the faint hum of the massager. So she was using the oils. When she used the oils on her body, it usually meant she was
15 feeling adventurous. She had certainly hinted that tonight would be special, she was going to do something new.

Maybe, like him, she'd have one or two new geneplants, but he was hoping that it would be something else. He was hoping that tonight they would leave aside the VR equipment completely and experience real touch. He had wanted it since the night his visorscreen had been out of order
20 and he'd had to rely completely on the network of feeling sensors in his VR suit and gloves. There was a name for it. It was called "doing it in the dark" - people did it, sometimes, as a harmless kind of perversion. Real touch was something else. People didn't do real touch, or at least they didn't usually admit to it.

Secretly, he'd wanted to touch Jill for a long time now, to touch her skin, and to have her touch
25 him, to touch his skin, but he didn't know how to ask her for this and was afraid of how she'd react.

He'd joked about it in such a way that she might get the message that this was what he wanted.

Maybe she had, and maybe tonight this would be the "something new" she had in mind.

He poured two glasses of Highland Water, selected some Ambient Scottish Music, dimmed the lights, then pulled the sheet over his breasts. He didn't want the changes in his body shape to come
30 as too much of a shock to Jill. It would be better if she discovered them gradually, during the dual virtual foreplay. Why was she taking so long? Jack wished she would hurry up and come to bed.

His new cock seemed fine, but he hadn't taken it for a test-drive. Also, he was tired.

When Jill dimmed his visorscreen, he saw that she was lying on the bed beside him. He was a little disappointed that she didn't seem to have changed - except that it was the first time she hadn't
35 changed for a long time, and this in itself was a change. She looked exactly like the woman he had gone to bed with last night, but maybe he was being complacent. There might be hidden changes he would discover only during virtual lovemaking - maybe she had changed her sexual needs - and at least she was naked, rather than wearing any of those video transfers. Maybe he was right: tonight the "something new" might be the thing he'd been craving. He could feel the heat of her
40 body next to him. He began to unfasten his gloves.

"What are you doing?" said Jill.

"I think I know what it is," said Jack.

"What what is?" Said Jill.

"The something new," said Jack.

45 "What?" Said Jill.

"Touch," said Jack.

"Touch?" Said Jill.

"Real touch," said Jack.

He held the gloves up by their spaghetti of wires before discarding them. He turned to her, his
50 naked hands rising towards her naked neck, then he saw her mouth turning down at the corners with
disgust.

"No," said Jill. "Please don't, Jack."

"What then?" asked Jack.

She moved aside to show him what she had brought from the aurum: two syringes, one filled
55 with a bloody liquid, the other empty. A little disk. Even before he saw the GB logo he knew it was
a catalogue from the Gene Bank.

"I want to choose a baby," said Jill.