

Državni izpitni center



SPOMLADANSKI ROK



A: Bralno razumevanje B: Poznavanje in raba jezika

Sobota, 5. junij 2004 / 80 minut (40 + 40)

Dovoljeno dodatno gradivo in pripomočki: kandidat prinese s seboj nalivno pero ali kemični svinčnik, HB ali B svinčnik, plastično radirko in šilček. Kandidat dobi list za odgovore.

SPLOŠNA MATURA

NAVODILA KANDIDATU

Pazljivo preberite ta navodila. Ne izpuščajte ničesar!

Ne obračajte strani in ne začenjajte reševati nalog, dokler Vam nadzorni učitelj tega ne dovoli.

Naloge, pisane z navadnim svinčnikom, se točkujejo z nič (0) točkami.

Prilepite kodo oziroma vpišite svojo šifro (v okvirček desno zgoraj na tej strani in na list za odgovore).

Izpitna pola je sestavljena iz dveh delov, dela A in dela B. Časa za reševanje je 80 minut: 40 minut za del A in 40 minut za del B. Nadzorni učitelj Vas bo opozoril, kdaj lahko začnete reševati del B. Vračanje k delu A ni priporočljivo. Izpitna pola vsebuje tri naloge v delu A in tri naloge v delu B. Vsak pravilen odgovor je vreden eno (1) točko.

Odgovore z nalivnim peresom ali s kemičnim svinčnikom vpisujte **na list za odgovore** v za to predvideni prostor, s svinčnikom pa počrnite polja pri nalogah, ki to zahtevajo. Pišite čitljivo. Če se zmotite, odgovor prečrtajte in napišite na novo. Nečitljive rešitve in nejasni popravki se točkujejo z nič (0) točkami.

Zaupajte vase in v svoje sposobnosti.

Želimo Vam veliko uspeha.

Ta pola ima 12 strani, od tega 2 prazni.

A: BRALNO RAZUMEVANJE (Čas reševanja: 40 minut)

READING TASK 1: SHORT ANSWERS

Answer *in note form* in the spaces provided on the answer sheet.

Example:

0. How long will it take Nasa to send astronauts to Mars?

Ten to twenty years.

With no space of your own

- 1. How long will astronauts to Mars stay in space?
- 2. What does Kanas compare astronauts' life in space with?
- 3. What did Kanas focus on in his study of space missions?
- 4. How many astronauts were there in the crew Kanas studied?
- 5. What should an astronaut-to-be be resistant to?
- 6. When do the problems for astronauts arise during the flight?
- 7. What is the aim of "surprise presents" for astronauts?

With no space of your own

Adapted from an article in The Guardian, 23 November 2000, by Sanjida O'Connell

Imagine living in a very small cramped room with two or three people, constantly monitored like an inmate from Big Brother for months, maybe even years, at a time. It takes a certain sort of person to live like this. They are called astronauts.

Not only do they have to live with people for extended periods, almost without privacy, they must also cope with incredible isolation and loneliness, unable to see family and friends. Despite the glamour of space travel, in reality it is composed of tedium interspersed with crises.

The next shuttle launch on November 30 will be a 10 day trip, practically a vacation. But within the next 10 to 20 years, Nasa plans to fly to Mars, and this could take a minimum of two to three years.

Most of us know about the physiological problems of being in space: bone wasting, muscle loss, motion sickness and stomach aches. But psychological problems can be almost as bad. Apart from feeling bored, astronauts also experience insomnia, anxiety, depression, irritability and emotional hypersensitivity.

The psychiatrist Professor Nick Kanas says: "The average person can't do it. Astronauts are living in an isolated and confined environment. It's like living in the Arctic, or in a submarine, and they have to adapt. They have to tolerate seeing the same person day after day, and still deal with them on a professional basis."

The sort of person who can cope in this situation doesn't feel the need to please others, or crave their own space. Kanas, who has just published a paper on how the astronauts interacted during the shuttle and Mir space missions, believes such people are born, not made, but it is possible to enhance what is already there.

For instance, during a routine operation practised on the ground, the astronauts could be observed and afterwards told how well they dealt with the rest of the crew. If they were not open enough, or didn't listen to another member of the team, they would be asked to repeat the procedure, correcting their social faux pas. Most people would have difficulties with this kind of personal criticism, but Kanas believes astronauts would cope if they're told they are healthy people training for an unusual situation. In his research, Kanas found the Americans seemed to have more emotional problems than the Russians. He thinks this was because two of the three crew were Russians, and the controls were in their hands, so the Americans may have felt they had less authority.

The Russians, in contrast, had financial problems. Their salary wasn't paid for months at a time. They also suffered asthemia, a kind of agitated depression, where they became irritable, couldn't sleep and started to withdraw from their colleagues. Kanas believes this is a normal response to a confined environment.

In general there was very little in-fighting between the crew, be they Americans or Russians. What tended to happen was that mission control was blamed instead. Kanas calls this displacement. "It's as if you or I had a bad day at work. We can't tell our boss he's a jerk, so we go home and kick the cat."

The astronauts have to deal with very stressful situations: if anything goes wrong with the shuttle, they have to repair it. On longer flights, even mission control may not be able to advise them. Kanas found both the astronauts and mission control took in their stride most situations that would be considered stressful by a normal person.

Overall, they perceived significantly less job pressure and stress than most other work groups. Again, a potential astronaut is likely to be someone who doesn't easily become stressed. But this quality can be enhanced.

Research shows problems occur during the middle to the end of a space trip, normally because the novelty has worn off and boredom has set in. There are a number of ways of getting around the kind of psychological problems that astronauts may face. Apart from pre-flight training, it's a good idea to give them a varied diet so they're not eating monotonous fare every day.

In addition, they should be allowed to exercise, speak to their families and listen to music. Kanas is pioneering the idea of surprise presents to relieve the monotony. For long term flights, he suggests having a counsellor on board: if anyone on a two year trip has a nervous breakdown they would not be able to pop back to see the therapist.

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READING TASK 2: GAPPED TEXT

In the following extract 9 sentences have been removed.

Choose from sentences A–J the one which fits each gap 1–9. There is one EXTRA sentence which you do not need.

Write your answer on the answer sheet and shade in the appropriate circle.

There is an example at the beginning: Gap 0.

It's thirsty work but someone's got to do it

Adapted from an article in The Independent, 30 December 2000, by Tony Wheeler

A flock of electric-green budgerigars suddenly dropped out of the tree, swooped across the waterhole, squawking noisily, and homed in on another tree just beyond our tent. $_0_$ K Whoever got the idea of putting these classy little aerobatic artists into cages? We had a small fire burning and the water on the boil for coffee. In another month or two, the waterhole would dry up. $_1_$ The sandy riverbank was still warm, the sun was half an hour or so from setting.

"This spot is really paradise, isn't it?" I suggested lazily. Even the flies that can plague any Australian outback expedition seemed to be on vacation.

"What I can't get over," replied Don, "is how few people we've seen. It was three days back we last saw another walker."

"Forty miles ago," I mused, doing a quick mental calculation of how long it was since we'd seen the first, and last, walker on the trail. ___2__

Ten minutes later, as if to remind us that we were not the only walkers to discover the Larapinta Trail, and that women walking alone in the Australian outback are not that surprising a phenomenon, two more walkers, both of them women, appeared in the clearing. We offered them some of our coffee and, as if on cue, the first – and last – snake we were to see wriggled out of a bush at the water's edge. 3

A few days earlier, towards the end of our first day on the trail, we'd been thirsty, very thirsty. Not quite to the sharing-the-urine-around stage, that terminal Australian thirst that Bill Bryson makes so much fun of in his book *Down Under*, but certainly thirsty enough.

Well, what do you expect when you set out to walk 140 miles west from Alice Springs in Australia's very dry centre? Of course you're going to feel thirsty. __4__

Certainly, you could do day walks with a few water bottles in your day pack. Sure, you could plan walks from waterhole to waterhole, of which there are a surprising number along the MacDonnell Range, the spectacular desert mountain range that extends east and west from the Alice. <u>5</u> Not without a lot of planning and careful investigation, so that you didn't roll into camp only to discover that the waterhole dried up last week and it wouldn't be refilled until the rain fell again, perhaps in six months' time.

__6__ They'd map out a 12-stage walking trail, starting at the old Telegraph Station just north of the town centre and right beside the springs that gave the town its name. Some of the stages would start and finish at the permanent waterholes, like the ones at Simpsons Gap, Standley Chasm or Ormiston Gorge, where ancient rivers have made dramatic cuts through the range. **__7__** The end result would be a two-week walk through some of Australia's most magnificent desert scenery.

8 Oh, sure, there are spectacular sand dunes and it can certainly be dry, but anybody who thinks a desert is just sand and nothing else will find central Australia very un-desert-like. There's lots of vegetation, an artist's palette of wild flowers in the spring, amazing rocky outcrops, oasis-like

waterholes and a twitcher's book-list of birdlife – like those noisy budgerigars that entertained us at our Jay Creek campsite. It's just that there aren't many people. In six days on the trail we met a grand total of five other walkers, apart from people close to the popular gorges.

Despite the isolation, the harshness of the environment and the lack of water, two factors make the Larapinta Trail a surprisingly safe walk. One is that it simply follows the east-west mountain chain, so getting seriously lost is more or less impossible. **__9__** If you need help or simply have had enough and want to quit, all you have to do is walk directly south, sometimes just a mile or two, at other points as much as five to 10 miles, but eventually you'll hit the road.

© The Independent

- A "Well, Freud would have had something to say about that," I suggested, as the two women left to set up camp further along the gorge.
- **B** That small problem had for years deterred walkers from invading the Red Centre.
- **C** But right now, it was still clear and only slightly salty.
- **D** But a long walk, something taking a week or more, simply wasn't possible.
- **E** Desert is really the wrong word to apply to Australia's Red Centre.
- **F** In the mid-Nineties, the Northern Territory's Parks & Wildlife Commission decided to solve that problem.
- **G** The other is that the road out to the west from Alice Springs also runs parallel to the walk and the mountains.
- **H** At others, they'd set up water tanks which would be regularly replenished.
- I "And it was a woman and she was walking by herself."
- J The first and last sections of the walk are spectacular.
- *K* A few minutes later, they repeated the performance, and went whizzing past quickly like bright green bullets.

READING TASK 3: TRUE / FALSE / NOT GIVEN

Decide whether the following statements are TRUE / FALSE or NOT GIVEN.

Tick (\checkmark) the appropriate column on your answer sheet and shade in the appropriate circle.

Example:

0. The first major wind farm will be located on the coast.

Т	F	NG
	\checkmark	

Nuclear reaction

- 1. The wind farm cannot be heard or seen easily.
- 2. It will be easy to get rid of nuclear industry.
- 3. The nuclear industry wants to prevent the development of wind power.
- 4. Locals support the land wind farms in Wales.
- 5. Country Guardian believes in global warming.
- 6. Sir Bernard Ingham is a consultant to British Nuclear Fuels.
- 7. The effects of the wind farm on Porthcawl have been exaggerated.
- 8. Tourist agencies financially supported the anti-wind farm campaign.
- 9. Friends of the Earth approves of wind power.
- 10. Local and national interests are working hand in hand.

Nuclear reaction

Adapted from an article in The Guardian, 22 August 2003, by Polly Toynbee

With good timing, as sweltering Europe ponders an overheating world, the first of 30 turbines was this week erected at Britain's first major offshore wind farm. North Hoyle is four miles out to sea off the north Wales coast, inaudible and virtually invisible. Britain has the best wind potential in Europe and the government's new energy policy at last promises no more nuclear power and a lot more wind and other renewables.

But don't imagine the nuclear industry just rolled over and died. The fight is on. Despite the staggering cost of bailing out British Energy with £610m now and £3bn to come in taxpayer liabilities, the nuclear industry is doing all it can to halt the progress of wind power.

When Patricia Hewitt announced the end of the nuclear era and the beginning of a better energy policy, there was a clear caveat. Her promise is for 10% renewable energy by 2010 and an aim to reach 20% by 2020. But the caveat is that wind power has to prove itself sufficiently cost-effective and reliable within the first five years when the nuclear option will be reviewed in the light of wind's success or failure.

Three major offshore wind regions were announced, producing the same electricity as six new nuclear power stations. Can they be got up and running quickly and easily, to prove that wind is indeed the answer?

The one great obstacle that could cause fatal delay and disruption is local objections. The history of wind farms has been that 16 out of 18 planning applications for land wind farms in Wales failed between 1993 and 1998, due to local objections.

A harmless-sounding group called Country Guardian has been backing many of the small, but effective, local action groups opposing planning requests for wind farms. It describes itself as the national campaign to oppose wind turbines. Its cleverly casuistic website casts scathing doubt on global warming and rubbishes every aspect of wind power's viability. Country Guardian's vice-president is Sir Bernard Ingham, former Thatcher press spokesman, former consultant to British Nuclear Fuels and current secretary of Supporters of Nuclear Energy (Sone). He has boasted that he personally is responsible for stopping 66% of wind farm planning applications. Now the battle is on at the next proposed wind farm location – Porthcawl in Swansea Bay, where Country Guardian backs the local opposition, SOSPorthcawl.

The proposed wind farm, three miles out to sea, would produce enough energy to power Swansea. The group has produced grossly distorted pictures of how the wind farm might look, alarming the town and generating 3,000 letters of objection. It claims tourism will be damaged, that the waves for surfers will be affected, the noise deafening and the sight an eyesore – none of which is true. (Only distant masts on the horizon will be visible: as for noise, the blaring of Britney Spears from the fairground is rather more damaging than far-away silent windmills). SOSPorthcawl supports wind in principle, but just not on its coast.

The Nimbys will be challenged over this bank holiday weekend when Greenpeace and Friends of the Earth turn out in force in Porthcawl to mobilise local people to speak up for wind power and to persuade local businesses that offshore wind farms have proved a tourist attraction, not a deterrent, elsewhere.

It is crucial for the future of offshore wind farms that planning permission passes quickly and smoothly here. It goes first to a public inquiry and then to the Welsh assembly environment and planning committee but the local politician (a Lib Dem AM), is backing SOSPorthcawl despite party policy that strongly supports wind power. That's always the bind – localism against the national interest. If the Welsh assembly turns it down and this pattern is repeated elsewhere, it will dampen government enthusiasm for wind power.

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B: POZNAVANJE IN RABA JEZIKA (Čas reševanja: 40 minut)

TASK 1: GAP FILL

Write the missing words in the spaces provided on the answer sheet.

There is ONE word missing in each gap.

There is an example at the beginning: Gap 0.

Does the World Need GM Foods?

Adapted from an interview in Scientific American, April 2001, by Sasha Nemecek

Robert B. Horsch, Vice President of product and technology cooperation at Monsanto Company, received the 1998 National Medal of Technology for his pioneering experiments in the genetic modification of plant cells. He talks about the promise of GM crops.

How did you become interested in the genetic modification of plants?

I started ___0__ *in* this field with a strong interest in plants but with __1__ you might call an academic interest in agriculture. I had this vague, naive notion that if we could genetically improve plants with the new tools of molecular biology, we could find a __2__ to make biotechnology relevant to agriculture.

That has now <u>3</u>. Biotechnology is a great tool that will allow us to produce more food on less <u>4</u> and with less depletion or damage to water resources and biodiversity. I am convinced that biotechnology is not just relevant <u>5</u> imperative for helping us to meet the rapidly growing demand for food <u>6</u> other agricultural products. The combination of more people and rising incomes will increase the demand for food <u>7</u> at least 50 percent in the next 25 years.

But critics of genetically modified foods point out that companies are not going to start giving products away. Can a corporation like Monsanto make biotechnology affordable for farmers in the developing world?

Cultivating commercial markets and applying technology to help the developing world are not mutually exclusive at all. One approach that works very well is to segment the market $_8_$ three different areas. One is the pure commercial market. It $_9_$ economic sense, as a for-profit company, for us to invest in products and market developments in places where we can $_10_$ our products and where we think we can make a $_11_$.

The other end of the spectrum is noncommercial technology transfer, which is largely focused on public-sector collaboration. Take, for example, our collaboration to put virus-resistance genes __12__ the sweet potato. We will never have a commercial business in the sweet potato because it's __13__ not a market economy crop. But by sharing our intellectual property and our technical knowledge __14__ scientists from Kenya, we have helped them develop sweet potatoes that show resistance __15__ the most serious sweet potato disease in Africa, which can cause the loss of 20 to 80 percent of the crop.

Then there's a third area, what I call a transitional market, where we have less experience related to biotechnology but __16__ in the long run I think may be more powerful and beneficial for development efforts. We have used this approach with our older, nonbiotech products, such as high-yielding corn hybrids, and I think we can use __17__ in the future with biotech products. Small farmers can see results in a demonstration plot and, if they want, try it __18__ on a portion of their farm. If it works for them, they can expand or repeat it the next year. We have programs __19__ this in Mexico, India and parts of Africa. By the third or fourth year, if it's working, the __20__ will have made enough money from the experimentation phase to be __21__ to run it essentially on their own.

And what about profits for Monsanto?

We sell the seeds and the herbicide __22__ market prices, and we subsidize the learning, the testing and the development of distribution channels so that we don't actually make a profit in the first several years. Only if the project is successful __23__ to become self-sustaining will we start making a profit. At this point, we haven't got that far with __24__ of these programs.

Monsanto has been one of the most criticized corporations because of its role in the development of genetically modified foods. Has it ever been hard to tell people you're an employee of Monsanto?

I've had a few people react negatively, but my experience is that when people meet you as a person, their reactions are very different than **__25__** they're commenting on the big nameless, faceless company.

TASK 2: GAP FILL

Write the correct form of the verb given in brackets in the spaces provided on your answer sheet.

There is an example at the beginning: Gap 0.

Pole star is on the rise

Adapted from an article in The Observer, 3 March 2002, by Duncan Mackey

Sergei Bubka was accused of __0__ being a male chauvinist pig when he said women should not be allowed to pole vault in major championships until they __1_ (CLEAR) five metres. It is an argument Svetlana Feofanova will soon make redundant if she __2_ (CONTINUE) at her present rate.

The Russian, 21 and the overwhelming favourite for victory at the European indoor championships here today, is doing for women's pole vaulting what Bubka once __3_ (DO) for the men's. On four occasions this winter she has broken the world indoor record, __4_ (ADD) a centimetre on each occasion – just as the Ukrainian used to do – to maximise her earning potential.

She has taken the mark from 4.70 metres to 4.74m and few doubt she would already be closer to five metres if it **__5__ (BE)** not for the lure of the dollar. The woman **__6__ (BRING UP)** in a tiny flat in Moscow with her mother, father, sister, aunt and uncle has received \$50,000 on each occasion. 'In Stuttgart, a little more,' she says, 'but in Germany they take out 30.6 per cent tax.'

Along the way, she has not only taken Stacy Dragila's world indoor record, but also her status as the event's biggest star. The pole vault **__7__ (EVOLVE)** so swiftly that the best days of the Olympic gold medallist already appear to be behind her and the future lies with Feofanova, second to Dragila at the world championships in Edmonton last year.

Feofanova took up the event less than five years ago, <u>8</u> (PREVIOUSLY / COMPETE) in gymnastics. She is certainly more athletic on the pole than Dragila, which Bubka has always claimed is vital for success. She is an all-round athlete, having run 60m in 6.82sec and recorded 6.33 in the long jump. It is her gymnastics ability, though, that she claims has allowed her to be successful. 'Speed is no guarantee of height,' Feofanova says. 'I <u>9</u> (NOT / YET / MANAGE) to convert it into an advantage going over the bar.'

After __10__ (SET) her world record in Lievin, France, last Sunday, Feofanova has switched to using a stronger pole for these championships in the hope of clearing 4.82m. 'You could jump 4.90m with this pole,' she says. The only drawback is that the pole __11__ (CONSTRUCT) for a body weight of 68kg, and the 1.63m Russian __12__ (WEIGH) only 49kg. She __13__ (TRY) – and failed – a 5m vault last December in training. 'Five metres is possible and I have the prerequisites to do it,' she says.

It would be a surprise if she __14__ (ATTEMPT) a world record here unless she had to. Unlike the world championships and other meetings, the European Athletic Association refuse to award prize-money and bonuses – only medals. 'The win is central,' says Feofanova. 'Whether it is a world record or not is a question of form, but it would certainly be welcome if the EAA were __15__ (PAY) a premium for a record at their events.' Sergei Bubka would be proud.

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TASK 3: WORD FORMATION

Write the correct form of the words on the left in the spaces provided on the answer sheet.

There is an example at the beginning: Gap 0.

The Himba and the Dam

Adapted from an article in *Scientific American*, June 2001, by Carol Ezzel

0) TRIBE

2) LIKE

3) SETTLE

4) TRADITION

5) MIX

1) DISTANCE

Turning, I point to hills in the east. "And the water would back up behind the dam to make a lake that would stretch to there." I can see the shock and incredulity in his eyes as he begins to understand how high the water would rise up the faraway hillsides, flooding more than 140 square miles of Himba ___3_, grazing land and grave sites.

Tjiuma is a counselor to one of the headmen for the Himba tribe, an essentially self-sufficient band of 16,000 people who eke out an existence from the barren, rocky terrain of northwest Namibia, living off the milk and meat of their cattle and goats, along with the occasional pumpkin or melon. The Himba are sometimes called the Red People because they __4__ cover their bodies, hair and the animal skins they wear with a __5__ of butterfat and a powder ground from the iron ore ocher.

6) ISOLATE For decades, the Himba have lived in relative __6_. No other tribes wanted their hardscrabble land, and the Germans who colonized the area in the late 19th century rarely interacted with them. More recently, the Himba's main contact with outsiders has been with soldiers during the fight for Namibia's __7__ from South Africa. But if the Namibian government has its way, by 2008 more than 1,000 foreign workers will have settled in a temporary village just downstream from Epupa Falls, the site the government favors for the dam. With them will come cash economy, alcohol, prostitution and AIDS – as well as improved roads, better access to __8__ care, schools and perhaps even electricity.

The situation surrounding the proposed dam on the Kunene River can be viewed as a microcosm of dam projects around the world that are affecting indigenous peoples. The dams will change local peoples' livelihoods and cultures. How should global society weigh the right of such peoples to be left alone against, in some cases, the very real _9_ for developing countries to take advantage of their resources? Should such countries have the _10_ to decide what is in the best interests of all their citizens, even if some of them don't want to change? Perhaps most important, how can traditional peoples decide such issues for themselves when they have only a shaky idea of how more developed societies live and what they might be getting themselves into?

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