

# Living Health & Wellbeing



## FACT OF THE WEEK

Nuts are rich in unsaturated fats, and that is a main driver in lowering cholesterol.

## WELLBEING

**Q** I am 20 years-old and I am short (five feet, three inches). Is it possible to grow any taller? I also lose a lot of hair. Please help.

**A** There is little evidence that suggests that humans can grow taller after puberty. We usually grow faster as infants and toddlers. Your heights also sees changes mainly during puberty. One of the most effective means to increase your height is through a carefully carried out height-increase-exercise-programme, which is designed to strengthen core muscles, improve posture and also encourage your body to increase the levels of growth hormone. It is a well-proven fact that exercise of high intensity such as anaerobic activities like cycling, sprinting or swimming can have a positive impact on height. A nutritious diet that includes fruits and vegetables, dairy products, cereals, pulses and plenty of water will aid the natural process for enhancing height.

Regarding your hair loss, it needs to be seen and examined by a dermatologist. Based on the signs, symptoms and careful diagnosis, it can be managed appropriately.

**Dr Vandana Jayaprakash**

### Your Questions

Every week, Living features an interactive column, Wellbeing, where your questions on health, fitness, diet and nutrition are answered by experts. Send your questions to Living, c/o Deccan Herald, # 75, M G Road, Bangalore-560001 or mail us at [dhliving@gmail.com](mailto:dhliving@gmail.com)

# Fad or wonder food?

**GUT INSTINCT** Not all bacteria are bad. One of the current wellness fads, probiotics, harnesses healthy bacteria, writes **Kalyan Ray**

**P**robiotics has opened up a new genre of food laced with millions of healthy bacteria, invisible to naked eye, which help expel harmful bacteria from the gut.

Improving intestinal health is the most important benefit of probiotics even though latest research has uncovered more to probiotics than mere gut health.

Stress, bad food, and the rat race can throw the digestive system out of gear, triggering bloating, diarrhoea and constipation, flaring up of IBS symptoms, Crohn's disease, and a host of other gastrointestinal problems. When the intestinal flora — an assembly of 100 trillion bacteria — is disturbed and the balance upset, diseases strike.

Probiotics means "for life". Its addition in daily diet keeps the colon and intestines healthy. In a child's digestive system, there are many good bacteria. As one grows up and matures most of these good bacteria diminished or disappear entirely from the body, which is where supplements can help.

Probiotic supplements are an easy, and in many cases, favoured way of keeping the digestive tract healthy. "Other positive functions range from the augmentation of host resistance such as cancer and microbial infections through activation of the immune system," said Koji Nomoto, a scientist at the Yakult Central Institute for Microbial Research in Tokyo.

Allowing the growth of certain good bacteria in the gut remains the most well known function of probiotics. In fact, al-

most 100 years ago, a pioneering Japanese scientist Minoru Shirota became the world's first person to succeed in culturing a fortified strain of lactic acid bacteria beneficial to human health.

That strain, *Lactobacillus casei* Shirota, gave rise to one of the world's first probiotic supplement launched by the Japanese company Yakult in 1935 which helped in diseases like food poisoning, dysentery, cholera and typhoid. Eight decades later, probiotics has become a global health fad and a multi-million dollar industry, even though many claims are unsubstantiated.

### What does research say?

New research has come up with other health benefits of probiotic strains like LCS and Bifidobacteria, which range from suppressing the ulcer-causing gut bacteria *Helicobacter pylori* to improve the digestion for chemotherapy patients.

Functional foods like probiotics have opened up a new area of research because of the regulatory requirement of backing up the health claims with scientific studies. Almost every month, new findings are reported, cementing probiotics' position among the wellness factors.

Take the research from China Medical University, Shenyang, in April, for example. The Chinese team systematically evaluated probiotics' curative effects for treating ulcerative colitis based on existing random control trials. They concluded that probiotics should be considered as an auxiliary medicine in the remission induction stage



**DRINK UP!** Probiotic products can be supplements in your daily diet for they are said to keep the colon and intestines healthy. DH PHOTO BY AUTHOR

and maintenance stage of ulcerative colitis.

The functional food industry received a shot in the arm a month later from the researchers at the University of Helsinki, which mapped the genome sequences of *Lactobacillus rhamnosus* GG (LGG) and a bacterium closely related to it. The results published recently in the *Proceedings of National Academy of Sciences* not only shed light on probiotic mechanism but also promote better product development.

The Scandinavian University showed that a new protein component found by the team has a fundamental role in LGG binding with the intestine. The binding feature has been assumed to be one of the most important characteristics of bacteria with health-benefiting effects. Moreover, the researchers assume that the protein structure enables the health-promoting effects of

LGG and other probiotic bacteria, and the positive immune modulation produced by them.

US researchers too have chipped in. While studying the food allergy trend in the USA, a team from Stanford Medical School reported in the May 11 issue of *Journal of American Medical Association* that probiotics in conjunction with breastfeeding and hypoallergenic formula, or both may help prevent food allergy though their independent effects remain unclear.

The LCS strain has a protective function against influenza virus infections caused by the H1N1 virus, said Hisako Yasui, a professor at Shinshu University in Japan. Her team showed how the LCS strain might be useful in preventing respiratory tract infections for elderly individuals with low immune function and for neonates and infants with immature

## Quick facts about probiotics

- Probiotics are safe.
- Drink one or two bottles a day depending on your health needs.
- Better to buy it through direct selling people (like the Yakult ladies, who are doing door-to-door selling) rather than from big stores, which tend to switch off their refrigerators in the night.
- The products are in the affordable range.
- Take the probiotic claims on ice-cream or biscuits with a pinch of salt as most of the beneficial bacteria don't survive the process.
- The bacteria reach the intestine alive and grow in our bowels.
- Probiotic products are being consumed since 1935.

immune system. The good bacteria simply augment the body's immune response to thwart new diseases.

Another group from the University of Tokyo has identified a new probiotic strain that can be utilized to suppress prostate cancer. But bigger studies are required before taking the product to the commercial market.

The Indian market has just started experiencing probiotic products in Delhi and Mumbai and in a few nearby cities. The launch in Bangalore is around the corner. As the products have started coming, the Indian Council of Medical Research too has set in motion a process to prepare its own norms for probiotics. But it may be an uphill task for the Food Safety and Standards Authority to ensure implementation of such norms across the country.