



HealthBeat

Quarterly Health Magazine Vol.29, April 2022.

AGES OF U

Nexus Between Self-Awareness and

Decision Making



IS FOGO THE NEW FOMO?

DNA Repair
Guarantees Longer Life
MYTH OR FACT





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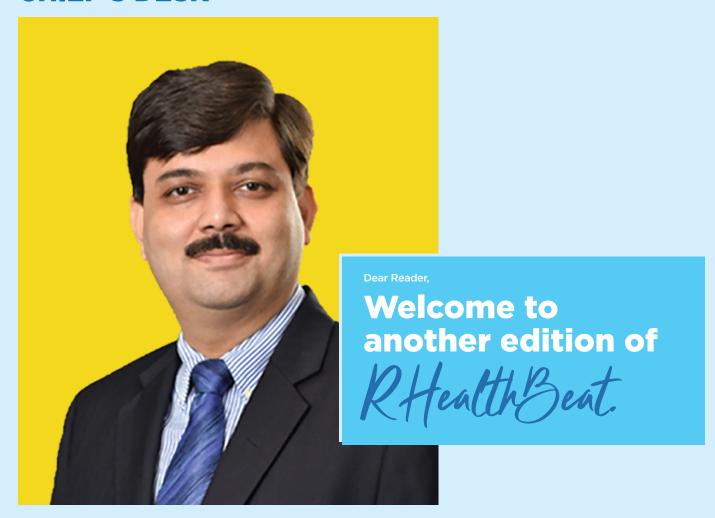






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CHIEF'S DESK



Self-awareness is surely the key to a life lived fully, which is why the ancient people's great challenge to themselves was, 'Man, know thyself!'. With the course of time, we are now in the position to at last say, 'Know ourselves!'.

William Shakespeare wrote his famous "All the world's a stage" speech, listing what is now known as the "Seven stages of Man". Man takes on seven distinct roles based on his ages. It stands as a strong case for the argument, pointing to the futility of believing in a single prime of Life.

For many of us, 20s are the most exciting decades of our lives. We launch our careers, meet our companions & achieve milestones that shape the rest of our lives - we're in our best physical prime. But can we single out a stage as the healthiest? The concept of one prime age is incorrect because there are many. Each decade is an opportunity to be the best at something. If we want to live a life full of achievements, we must recognize the strengths & opportunities each decade brings. Let's read more about it in our cover page article, "As you like it? Seven ages of you".

Why do some people retain strong brains even in their old age? Find out about these cognitive super agers in "How the ageing brain affects thinking". Unravel the mystery of how "Engineered Immunity" will be able to predict the trajectory of an illness that can lead to greater longevity & healthy life.

With changing lifestyles we are witnessing a rise of obesity among young adults which often leads to PCOS, Thyroid issues or even Type II Diabetes. Let's understand more about them in our new section," Disease Focus".

"Fear & Love" are the two basic motivating forces - which one will you choose for parenting? Find out the implications of each in our feature "Are you parenting from Love or Fear" and decide wisely.

With this edition, we have set out to explore the ethos of life, to recognize our abilities and make conscious choices towards a more fulfilling life.

Hope you enjoy reading this volume of RHealth Beat as much as we did while writing it.

Exciting things to look forward to!

I wish you all great health!

Warm regards,

RAKESH JAIN
CEO, Reliance General Insurance





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TESTIMONIAL





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Medical Director, Sahyadri Hospitals Pvt. Ltd.

"R Health Beat is an interesting take on what's happening in the medical world. Talking about health, fitness and technology, the magazine is engaging for everybody. The content is useful and relevant to the current trends and scenario. Such initiatives should be encouraged. I appreciate all the hard work and wish all the best to the team."





DR. VIJAY NATARAJAN

CEO, Symbiosis University Hospital & Research Center, Lavale, Pune.

"We appreciate the time & effort put in to create awareness on health & well-being. The content is useful & relevant to the current trends & scenario. I appreciate all the hard work & wish all the best to the team."





Manager - HR, Cavendish Industries Limited.







The seven ages of Man, also known as "All the world's stage" is a dialogue from the English playwright William Shakespeare's comedy 'As you like it'. It's a reply Jacques gave to Duke Senior. The purpose of this reply is partly to console the sad Duke Senior & partly to tell the audience that we all go through certain stages of life. The monologue is a philosophical reflection on Life & our role in it. It breaks down the complexities of human life into exceedingly simple stages & makes a sweeping generalization as to the manner in which an individual progresses in merely seven sentences.

For many of us, the 20s are the most exciting decades of our lives. We launch our careers, meet our partners, & achieve milestones that shape the rest of our life - we're in our mental & physical prime.

The more we study the human mind, & body, the more we realize this painted picture is so wrong. "The whole idea that the brain is fully mature at 25 is a joke," exclaimed Daniel Romer, Psychologist at University of Pennsylvania. We gain advantages & disadvantages in all decades of our lives. In fact, we perform many skills far better in our 50s, 60s & even 70s than in our 20s.

The concept of one prime age is wrong because there are many. Each decade is an opportunity to be the best at something. If we want to live a life full of achievements, we must recognize the strengths & opportunities each decade brings.

In a series of large scale experiments, Researchers probed the cognitive abilities of people aged 16 to 89. Their results shatter the belief that our prime age is in our 20s or even 30s. Older adults perform better in tasks that require focus, face recognition, emotional attention & many more.

In our 20s, our body starts losing fast-twitch muscle fibers. These fibers are the ones that help sprinters & swimmers reach their peak performance. But for sports that rely on stamina, they are of little use. Add extra years of experience in regulating emotions & planning minute details, and we see why athletes in their 30s & 40s are superior in many categories.

40-somethings get into the zone much easier than younger people, helping them to perform tasks that require extended periods of focus better. People in their late 40s score highest in identifying emotions. Their ability makes them better leaders, partners, parents & judges of character.

In our 50s & 60s, our emotional intelligence becomes our super power. As someone with decades of experience, we would understand the world better than most. We can make sound & better decisions, settle conflicts, & communicate clearly. These skills make us perfect advisers when it comes to ideas, products, services, business strategies as well as new policies.

Igor Grossman from Waterloo university states people won't peak in certain skills until their 7th decade & beyond. To prove that, he probed specific skills in people such as:



The ability to analyze conflicts:

Personal, Professional, & Political.



Expansion in Vocabulary.



Intellectual humility - the ability to admit that we don't know.



Capacity to embrace different viewpoints & find compromises.

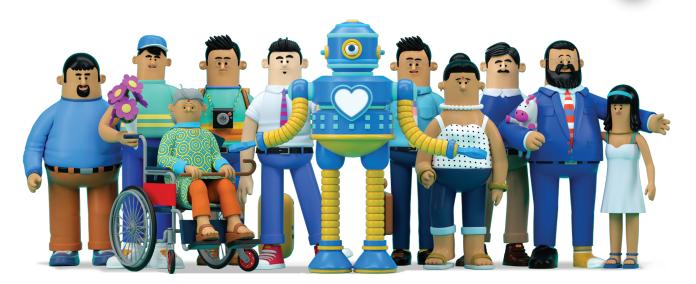
According to Grossman, these traits capture the concept of wisdom that many cultures promoted throughout the ages. The results were clear: the quality of our decision making increases steadily throughout our lives.

People in their 70s are wisest, most humble, & most understanding. Those in their 60s & 50s are leaders & visionaries. And those in their 40s, 30s & 20s are dynamic, ambitious, and energetic. We hold impressive abilities at all

ages of our life. There simply is no single prime time. Every decade brings with it new strengths to perform elite work one way or another.

If you've been holding back on dreams because you thought that the prime years are behind you, then think again. By coming into this world and until we exit, we have great potential to achieve incredible things.







The brain controls many aspects of thinking - remembering, planning, organising, making decisions etc. These cognitive abilities affect how well we perform everyday tasks & whether we can live independently.

Some changes in thinking are common as people get older. For e.g., older adults may:



Become slower to find words & recall names



Face problems with multitasking



Experience low attention span

Despite the above changes, research shows that older adults can still:



Learn new skills



Make new memories



Improve vocabulary & learn a new language

Changes in the ageing brain

As we enter midlife, the brain changes in understated but measurable ways. The brain's overall size begins to shrink when we are in our 30s or 40s, & the rate of shrinkage increases once we reach 60. Brain shrinkage is likely to get more severe as we get older.

As a person gets older, changes occur in all parts of the body, including the brain.

- · Certain parts of the brain shrink, especially those important to learning & other complex mental activities.
- In certain brain regions, communication between neurons (nerve cells) may not be as effective.
- Blood flow in the brain may decrease.
- Inflammation (which occurs when the body responds to an injury or disease) may increase.

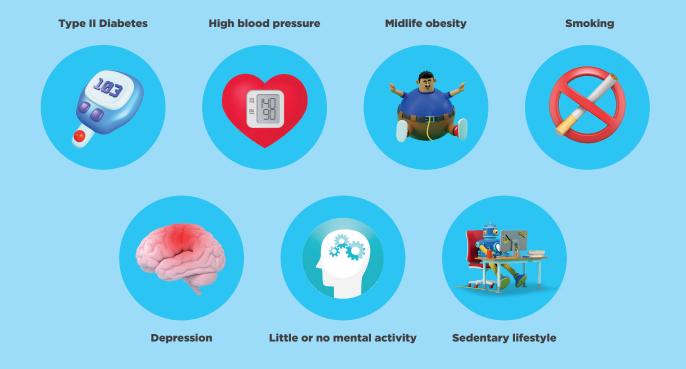
These changes in the brain can affect mental function, even in healthy older people. There is also growing evidence that the brain maintains the ability to change & adapt so, that people can manage new challenges & tasks as they age.

The progression of cognitive deficits observed in conditions such as Alzheimer's disease may be accelerated in a few years immediately preceding the diagnosis. Accelerated cognitive decline may not occur until events like a life stressor or other illnesses (e.g. Pneumonia) reach a threshold where the brain can no longer compensate for damage.



Risk factors for cognitive decline

Research suggests that cognitive decline may be related to these modifiable risk factors:



Why do some people retain strong brains into old age?

Researchers are exploring several theories to explain why some people's cognitive abilities stay intact to the end of life. Perhaps they start out in life with larger, stronger brains, or perhaps their brains somehow change to compensate for ageing's damaging effects. Another theory being pursued is whether their brains have stronger defences against ageing.

A person's environment may be a factor. Researchers have suggested that there is growing evidence that enriching

experiences, such as advanced education & mind-challenging occupations, can help brains last longer.

It's also noted that these **Cognitive super-agers** reported more friends & family connections, a finding that builds on past research showing links between psychological well-being & lower risk of Alzheimer's.

Take actions today to enhance cognitive health:

- Learn a new skill & engage in continued learning: Trying new activities can be a great way to challenge your brain to make new connections.
- Use all your senses to reinforce stimulation: i.e Practicing piano or any musical instrument will involve the coordination of brain, vision, hearing, arms/hands, legs/feet.
- Regular exercise, a balanced diet & good quality sleep are the golden rules to follow for a daily routine.
- Prevent or control high blood sugar & blood pressure.
- Quit smoking & drinking.



LIVE LONGER.

Longevity Study Shows People Over 105 Years Old Have More Efficient DNA Repair

"Researchers may have uncovered the key to longevity based on their study on people who lived past 105 years old & over."



This study is the first one to decode the genomes of people in this age group, providing clues as to why they lived long and how they managed to evade life-threatening diseases related to old age.

Key to Long life

A team of researchers took blood samples from 81 people aged 105 and over from all over Italy. The team also took blood samples from 36 healthy individuals in the same regions with an average age of 68 years old. They conducted whole genome sequencing from the collected blood samples to find out the significant differences in the genomes between the older & younger group.

"We chose to study the genetics of a group of people who lived beyond 105 years old and compare them with a group of younger adults from the same area in Italy, as people in this younger age group tend to avoid many age-related diseases and therefore represent the best example of healthy aging," as told by Paolo Garagnani, Associate Professor, University of Bologna, Italy, & a first author of the study.

They conducted whole genome sequencing to look for differences in the genes between the older & younger group.

They then cross- checked their new results with genetic data from another previously published study which analyzed 333 Italian people aged over 100 years old & 358 people aged around 60 years.

The team found genetic variances that are common in the older group who lived past 105 years old. The most common is the **STK17A gene**, which is responsible for the efficient repair of DNA. High activity of this gene means that it helps combat the growth of diseases like cancer.

They also found the presence of **BLVRA** in the same group. This gene is responsible for the health of a cell. The final common genetic trait was the **COA1** gene that plays an important role in a cell's functionality. The previous study has shown that it is the key to understanding age related diseases, such as neurodegenerative disorders. Therefore, its main role is to stave off this kind of deterioration.

Low Genetic Mutations in People Aged 105 & Above

According to Science daily, the researchers also looked into genetic mutations in the two age groups that they have accumulated throughout their lifetime.

They found that people aged 105+ or 110+ had a much lower burden of mutations in 6 out of 7 genes tested.

These individuals appeared to avoid the age-related increase in the disruptive mutations, & this may have contributed in protecting them against diseases such as Heart disease.



How can we live longer?

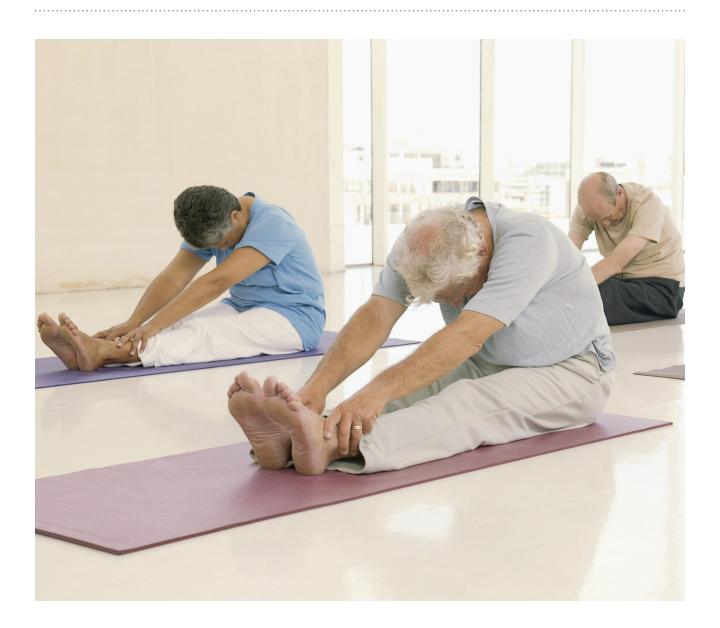
Many of us want to live a long & happy life. The key to longer life is not just dependent on our genes but we can work towards a healthier life by making healthy choices.

Nutrition & Lifestyle: A study of large groups of ordinary people show that keeping the weight off, not smoking, restricting alcohol to moderate amounts & eating at least five servings of fruits & vegetables a day can increase your life expectancy by 7 to 14 years as compared to someone who smokes, drinks too much & is overweight.

Physical activity: You can't outrun a bad diet, but that doesn't mean that exercise doesn't do good things. Globally, inactivity directly causes roughly 10% of all premature

deaths from chronic diseases, such as coronary heart disease, type II diabetes & various cancers. Just over 30 minutes a day of moderate to vigorous physical activity is enough for most people. It makes you stronger & fitter & has been shown to reduce harmful inflammation & even improve mood.

Clear out old cells: Removing senescent cells also helps people. In a small clinical trial, people with severe lung fibrosis reported better overall function, including how far & fast they could walk, after they had been treated with senolytic drugs.



By taking a few steps, we can preserve our health. Good health is the true wealth of life. Let's make it a necessity rather than an option, and work towards a brighter & healthier future.



We can hardly miss Petra, Jordan or The Taj Mahal. You could, however, be forgiven for overlooking the great wonders of Human biology. It's easy to take the brain or DNA for granted.

Around halfway through 2022, we will have witnessed several significant breakthroughs in ways in which we can engineer the body's immune system to fight disease. The Pandemic has already led to the development of new types of vaccines such as those based on mRNA, but we may also see other ways to harness the immune system to fight diseases.

One molecule, in particular, has taken a centre stage: The Antibody. These Y-shaped proteins, which we produce in response to infection, are a vital part of our natural defenses. They are now being used as the basis of many of the most important medicines.

These antibodies are used in a way that exploits their natural ability to lock onto specific targets. The design of antibodies themselves has been left relatively untouched.

Using genetic engineering or by separating & recombining parts of the protein chemically, we have tools that can alter the basic structure of antibodies. These will enable us to produce all manner of antibody-based medicines.

For example, we will be able to manufacture antibodies that can recognize & attach to three separate targets at once - maybe a cancer cell, a receptor protein that activates

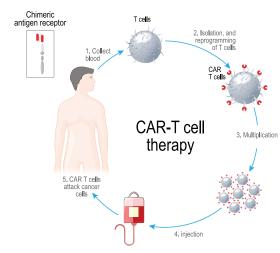
immune cells, & other immune cell protein that strengthens the response. This will make it harder for the cancer cells to evade or for the virus to mutate & avoid being targeted.



Engineering antibodies to better recognize cancer

Another type of immune based medicine set to gain prominence is CAR T-cell therapy. Here, T-cells are extracted from a patient's blood & genetically manipulated to endow them with a new receptor that targets the patient's cancer. The engineered T-cells are then infused back, hopefully now able to kill the patient's cancer cells. This type of therapy has been used in acute lymphoblastic Leukemia

cases. The CAR T-cell therapy gave some striking results but also unwanted side effects & relapses in a few cases. In the future, this type of therapy will be expanded by using different types of immune cells or different versions of receptors & so on. CAR T-cells could be engineered in such a way that it may kill off a problematic subset of the body's own immune cells which are causing autoimmune disease.

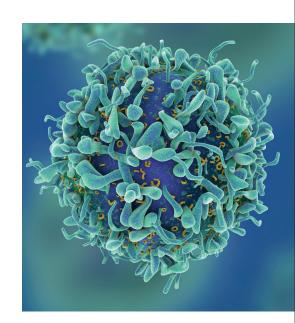


Taking the break off T cells

We now know that cancer cells can be destroyed by a specialized type of white blood cell called a killer T-cell. To avoid being attacked by the immune system, healthy cells are decorated with molecules that turn killer T cells off whenever they come near. As normal cells transition into a cancerous state, some pick up the ability to coat themselves into so-called "checkpoint" molecules, allowing them to put the brakes on even a robust immune system attack. This process is known as immunoediting. It is now considered a hallmark of the most hazardous types of cancer.

One such checkpoint molecule is PD-L1, a protein that shuts down killer T cells by flipping a switch on the T-cell itself. When cancer picks up the ability to make more PD-L1, it becomes more effective at shutting down T cells.

Designer antibodies that disrupt this process are already available in the U.S. for patients with inoperable melanoma, certain lung cancers, renal cell carcinoma & classic Hodgkin's lymphoma. Nivolumab is one such proven drug with many engineered antibodies



Immunity lab inside you

Several research ventures & teams are either enhancing & storing generic T cells that could be infused into multiple patients or by building nanotechnology that moves the laboratory into patients. Seattle researchers have designed injectable nanoparticles which carry the DNA needed to

reprogram T cells to better fight cancer. But this comes at a risk, as T cells may get out of control harming other healthy cells. Anticipating this, researchers have begun installing "suicide genes" into engineered T cells.

Future

Our continuing understanding of the immune system will also enable us to develop new diagnostic tools. Artificial intelligence is already providing us with an unprecedented depth of analysis around our immune cells. This will help us to correlate their parameters with, for instance, the severity of symptoms a person has experienced with coronavirus infection. We will be able to look for immune signatures that correlate with severe cases of COVID-19 & other diseases, & be able to predict the trajectory of an illness & plan the treatment accordingly. In 2022 & beyond, our increasing knowledge of our immune system will lead to new approaches in medicine.



COVID-19 VIRUS DEMONSTRATES 'NATURAL SELECTION IN REAL TIME' AS VARIANTS EMERGE

We find ourselves in a continuous flood of new information about the Coronavirus & its variants. In addition, the emergence of highly transmissible omicron variants has intensified the questions about what lies ahead. While we naturally feel whipsawed by the constantly changing news & recommendations, we need to understand that they reflect the expected evolution of the virus itself.

In popular culture, mutations produce monsters or superheroes and are essential in both negative & positive ways. For example, mutations cause damage leading to genetic defects & cancer. However, it is also considered the ultimate mechanism that makes evolution possible on the flip side. A mutation is a random change in genetic information, which involve a nucleotide sequence or an entire chromosome.

Viruses have a remarkable capacity to adapt to new hosts & environment during replication or multiplication in the host's body. This phenomenon is called genetic mutations or "copying errors" in simple words.

All viruses mutate because errors can randomly occur when a virus replicates itself. Some of these errors, or mutations, give the virus a survival advantage. As a result, different variants emerge, & those that lack a competitive edge drop out of the picture.



Are all variants significant concerning public health?

World Health Organization defines COVID-19 variants as follows:

Variants of Concern

having high transmissibility, severe clinical disease presentation, poor effectiveness of conventional treatment methods & vaccines.

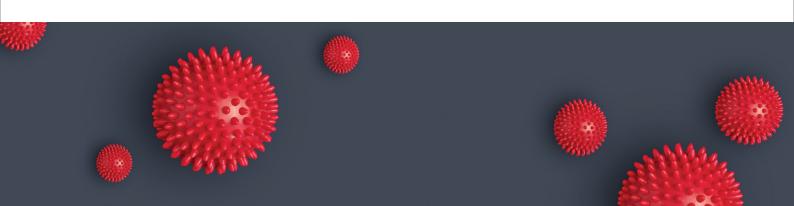
People who previously had COVID-19 may become re-infected by these new strains.

Variants of Interest

causing significant community transmission of COVID-19, with an increasing number of cases over time, an emerging risk to global public health. They were found to cause multiple COVID-19 clusters of infections globally.

Variants Being Monitored (VBM)

are suspected to indicate future risk; impact is currently unclear, requiring enhanced monitoring & repeat assessment.



COVID-19: How many variants are there, & what do we know about them?

Nine notable variants of SARS-CoV-2 have been found since September 2020.

Variant	Origin	Timeline	Summary
Alpha	Kent U.K	Sept 2020	30%-40% more transmissible than the original one & drove the second wave in the U.K
Beta	South Africa	May 2020	C.D.C has linked Beta with a 50% increase in transmission.
Gamma	Manaus, Brazil	Nov 2020	It remained a dominant variant in South America.
Delta	India	Oct 2020	The most transmissible variant, as far as 60% more than the Alpha variant. Researchers described this as an "improved" version of the alpha variant, thanks to a mutation that makes it more infective.
Eta	Nigeria, U.K	Dec 2020	WHO has declared this as a "variant of interest," with a second-tier alert level.
lota	New York, U.S.A	Nov 2020	It is reported in 53 countries & has a lower susceptibility but enough to declare it as a "variant of interest".
Kappa	India	Oct 2020	It was reported in 55 countries. It had reduced the neutralization potential on some monoclonal antibody treatments.
Lambda	Peru	Dec 2020	Lambda became the dominant variant within three months, accounting for 80% of cases.
Omicron	Multiple countries	Nov 2021	While it appears to be less severe than the Delta variant—W.H.O. has warned against categorizing it as 'mild.'

Will the Coronavirus continue to mutate?

The mutation is a critical fact in the survival of the virus because some of the mutations help the virus circumvent people's existing immunity to previous variants. We are witnessing natural selection taking place in real-time, with the virus continually morphing into altered forms that the immune system is less prepared to fight.

Will this Pandemic become an Endemic?

When a virus is no longer circulating throughout the entire population but is concentrated in particular areas or groups, it is considered an Endemic. It is hard to say when exactly COVID-19 becomes endemic. It is possible when the Immunity level in the population & contagiousness of the disease will reach a steady state. Until the virus becomes milder, we will continue to follow COVID appropriate behavior.

How have we been able to control past epidemics?

With Spanish flu, or H1N1 influenza, we did not have vaccines, & so the infection raged throughout the world until immunity became widespread & the virus's virulence subsided. The virus is believed to have diminished in potency over time & is present as seasonal flu in today's life. In contrast, we were able to eradicate polio with the help of vaccination, & we have nearly eliminated it globally. Likewise, smallpox was eradicated globally by vaccination. Differently, the severe acute respiratory syndrome (SARS-CoV-1) outbreak was well controlled. It was contained through swift cooperative response to W.H.O global alert before becoming a pandemic.

Could vaccines become ineffective against future variants?

It is possible that our original vaccines can become ineffective if the virus mutates to the point where it is no longer recognized by the immune cells, developed in response to the original vaccines. However, few mutations have already decreased the capability of the body's "neutralizing antibodies" that are stimulated by vaccination, infections with the last variant or both. The effectiveness of our original vaccines has "blunted" over time but not entirely lost.

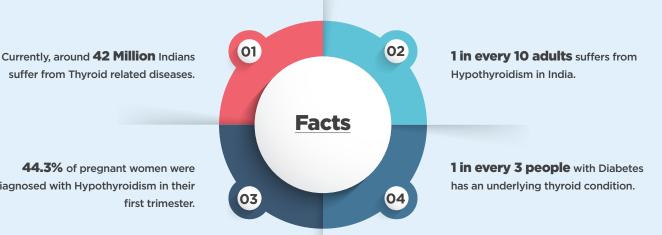
And most people who experience waning immunity are still protected against severe liness. Therefore, it may also become necessary to develop annual COVID-19 vaccines that will target as many variants of concern as possible.

Time for a new mindset?

We salute our scientists for developing the vaccines quickly & the governments to mobilize & increase vaccination drives which have enabled the global population to move towards possibility. However, we should approach this new phase with the right attitude & a different strategy. In the early stages of the war against COVID-19, with limited knowledge of the virus, severe cases & deaths mounting in the second wave, the message was to hunker down, stay at home & avoid going out. It was necessary then, but this very defensive posture cannot continue in a new phase. The new message is to live our lives as normally as possible, with safe practices, mask-on & strict personal hygiene. In this new phase, we hope that we will live life fully, provided we are fully vaccinated but still following all the preventive measures. Without this individual social responsibility, the future is not safe, as variants of viruses are bound to appear & break through the vaccination protection. Are we up for this?

Do you feel bloated all the time? This may be due to your thyroid levels that are going haywire.

The thyroid gland is a butterfly-shaped organ located below your Adam's apple, responsible for secreting hormones that stimulates oxygen consumption by cells in the body to regulate lipid and carbohydrate metabolism. Collectively, these hormones influence functions like respiration, heart rate, metabolism, mood, mental development and body temperature.



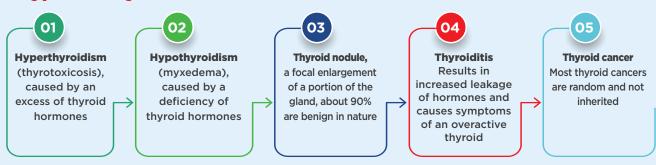
44.3% of pregnant women were

diagnosed with Hypothyroidism in their first trimester.

So, what are Thyroid Hormones?

The primary hormone secreted by the Thyroid is Thyroxine (T4), along with a lesser amount of Triiodothyronine (T3). lodine is an essential raw material for thyroid hormone synthesis. Another hormone, Calcitonin, regulates calcium levels secreted from the Thyroid.

5 types of Thyroid Disease



Symptoms of a thyroid problem:

Dysfunctions of the thyroid can be divided into two groups - Hyperthyroidism and Hypothyroidism. Watch for the following symptoms.



Menstrual cycle changes: An over or underactive thyroid can cause changes in the menstrual cycle.



Infertility and miscarriage: Hypothyroidism interferes with ovulation, which impairs fertility. Hyperthyroidism can cause scanty irregular periods and makes conception difficult. Males also get a marked reduction in sperm count.



Heart rate symptoms

Overactive thyroids can cause heart palpitations, high blood pressure, and an increased heart rate.



Goitre is a thyroid condition characterized by the swelling of the thyroid gland.



Sleep problems: When you have an underactive thyroid, your body does not produce enough hormones to get you going for the day, leading to all-time sleepiness. In contrast, an overactive thyroid can overstimulate your system and keep you up all night.



Tremors & tiredness:

Hyperthyroidism causes muscle weakness & tremors, whereas hypothyroidism causes unexplained tiredness.



Brain fog: An overactive thyroid can interfere with your ability to concentrate. Lack of energy and forgetfulness can lead to "brain fog".



Thinning hair: Thinning hair, especially the hair on your eyebrows, can indicate that your thyroid has a problem.



Mood swing: This can be caused by both hypo and hyperthyroidism. Whereas anxiety, irritability & nervousness can be experienced particularly by hyperthyroid patients.

Diagnosis procedure of Thyroid Disorders

The blood sample is tested to assess the levels of plasma TSH, T4: Thyroxine, Free T4 or free thyroxine, T3: Triiodothyronine. In some instances, Thyroid antibodies, Calcitonin, Thyroglobulin levels are also evaluated depending on the clinical condition.

What are the treatment options?

Depending on the level of the above tests, medications are prescribed. Surgery or radioiodine treatments are also recommended for severe hyperactive thyroids.

A thyroid ultrasound is considered, followed by a biopsy if the nodule is large. Treatment options for prominent benign nodules that are symptomatic (problems in swallowing or breathing) include surgery or radiofrequency ablation of the lesion.

When to call a doctor?

In most cases, problems with your thyroid isn't an emergency. If you experience the symptoms mentioned in the article or have altered levels of hormones, consulting an endocrinologist would be suggested.

Some thyroid-related emergency conditions include Myxedema Coma; Hypothyroid patients may feel drowsy, cold & lethargic. On the other hand, some hyperthyroid patients suffer from a sudden increase in pulse rate, accompanied by a fever, agitation, or delirium leading to a thyrotoxic crisis. Immediate institutional medical care is required in such cases.



The bottom line

Thyroid disease is often a life-long medical condition that you must manage constantly. This often involves daily medication & regular follow-ups. Your healthcare provider will monitor your treatments and make dose adjustments over time. However, you can usually live your everyday life with thyroid disease.

PCOS & DIABETES: A SILENT EPIDEMIC **AMONG TEENS**

Kartika, an 18-year college student from Mumbai, had gone from being petite to slightly overweight in the past 11 months. Sadly, she is not the only one. There has been a substantial rise in obesity cases among teenagers during lockdown & the leading cause for this is lifestyle disruptions.



What risks are teens

facing due to Obesity?

Obese teens suffer from high blood pressure & abnormal levels in lipid profiles

with high LDL, Cholesterol & Triglycerides,

which pave the way for various

cardiovascular ailments including heart attacks. They also suffer from psychological

Women with PCOS can develop serious health problems, especially if they are overweight



Diabetes:

More than half of women with PCOS develop Type II Diabetes by 40 years.



Gestational Diabetes:

Diabetes during pregnancy can put the baby at risk.



Heart disease:

Women with PCOS are at higher risk of heart disease which increases with age.



High blood pressure:

Potentially damages the heart, brain & kidneys.

.....



High LDL (bad) & low HDL (good) cholesterol:

Increases the risk for heart disease.



Sleep apnea:

A disorder that causes breathing to stop during sleep



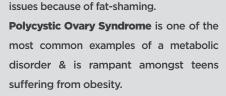
Plaque clogging blood vessels can lead to blood clots that in turn can cause a stroke



PCOS is also linked to depression & anxiety.







1 in 5 (20%) of Indian women in their childbearing age suffer from PCOS in various degrees. Women with PCOS are often insulin resistant; their bodies can make insulin but cannot use it effectively, increasing their risk for Type II Diabetes. In addition, a higher level of male androgens gets produced, which restricts ovulation & causes irregular periods, acne, hirsutism etc.

Do you have PCOS?

Sometimes symptoms are evident & sometimes they are less noticeable. One may need to visit a dermatologist for acne, hair growth or darkening of the skin in the body creases. A gynaecologist's consultation is also required for irregular periods. Women of any race & ethnicity can have PCOS.

PCOS can be diagnosed in women as young as 11 or 12 years. The presence of ovarian cysts does not necessarily mean PCOS. Various hormonal assays like AMH, LH/FSH ratio, Cortisol, Testosterone, DHEAS, PgE2, etc. are required to evaluate the impact & severity of the condition. Other tests such as Fasting & PP Blood Sugar Levels, Oral Glucose Tolerance Test (OGTT) with Glycosylated Hemoglobin Test (A1c) levels for Diabetes are suggested parallelly.





Current research updates

Australian researchers collected data from over 8,000 women & found out that those with PCOS were 4 to 8.8 times more likely to develop Type II diabetes. A 2017 study of Danish women found that PCOS women were four times likely to develop Type II Diabetes.

How to manage both?

PCOS & Type II Diabetes may be a prolonged condition. Hence, managing & living with the conditions in a strategic way is essential.



Regular exercise: It helps to burn excess blood sugar & supports weight loss, which reduces insulin resistance. A minimum of 150 min or 75 min per week of physical activity including muscle-strengthening activities are essential



Balanced diet: Helps reduce the risk of diabetes and ensures weight loss. Food rich in whole grains, lean proteins, healthy fats, fruits & vegetables helps in both conditions. Calorie deficit diets could be prescribed for women, considering energy requirements, body weight, food preferences & physical activity.



Maintaining normal BMI: Peripheral fat is directly proportionate with a higher rate of hormonal imbalance. Therefore, maintaining a BMI nearer to 25 is essential to avoid complications.

Living with PCOS & diabetes doesn't have to be scary.

A health coach who understands your specific needs
can help you take the right steps in the right direction.



ARE YOU PARENTING FROM love or Fear?

The Beatles had it right; all you need is Love. When you parent with the vibration of love, nothing else matters. If your motivating force is to love your child, exactly as they are, they will feel it & always be the best they can be. Parenting isn't about you, it's about the child & how you feel reverberates through them. The tone you speak will live through them for the rest of their lives. Take a good, hard look in the mirror. Do you live your own life based on love or fear?

Fear based parenting tends to be punitive & blaming. It is one of the most common parenting mistakes. This tendency stems from parental fear about behaviors & the predictions that if the behavior does not change, something bad will happen in the future.

There are two basic motivating forces:
Fear & Love. When we are afraid, we pull back from Life. When we are in love, we open to all that life has to offer with passion, excitement, & acceptance.

- John Lennon.

Love helps us to look at the present with a wider lens & attempt to understand our child's feelings, the triggers that may have initiated their actions, & look for the best options to help calm the stressors in our child & our self. For many of us, this is a subtle distinction because no parent wants to harm their child. It's just that much of what we do "in the name of Love" actually does harm those we hold most dearly.

But let's not underestimate the value of fear - it does have its place. The problem is that to let it run us, we give up control of our other faculties that help move us into a more loving state. A loving state of mind & heart provides us with many more options to respond based on our discernment rather than our reactivity, which often manifests in our own fight, flight & freeze behaviors.

Love & Fear, the two main emotions & their corresponding hormones have a profound effect on little ones. Their emotions run wild while their executive functions & cognitive skills are not yet developed. When Children believe that they are being threatened in some way, their natural response is fear. Most adults can cognitively assess the threat & learn to calm down. However, children are yet to learn & practice that kind of skill. Their emotions are extreme as compared to adults which make some things difficult to handle.

Depending on the makeup of the child, fear will manifest itself in various ways, such as anger, fighting, aggression,

anxiety, the impulse to run away, shutting down, & other such behaviors. When children have experienced trauma such as neglect or abuse of any kind (emotional, verbal, mental or physical) they learn ways to handle that trauma in their lives

Some freeze, so they shut down

& might go into a catatonic state. We see this when the child gets very restless, agitated, becomes hyperactive, has a need to do something physical (jump, bounce & run).

Some fight, so they act out in angry, defensive & hostile ways. We see this when a child talks back, hits, bites, is aggressive or refuses to comply. The greater & longer the trauma children experience the more embedded those fear responses will be. These fear responses of emotions, thinking, & actions are self taught survival skills and may become second nature & a part of their personality.

A big issue faced by schools these days is bullying. Many parents struggle with how to stop this type of behavior. But without knowing it, parents may actually model bullying to their kids when they use threats or physical punishments to get them to do things. The gentle path to good behavior is positive discipline. Positive discipline stays away from induced fear, humiliation, shame, guilt, yelling, threats, or any kind of emotional coercion. Instead, it focuses on establishing reasonable limits and correcting missteps when they occur in a kind & encouraging manner.





How does it work?

It is designed to strengthen the relationship between parent & child. It also works to understand a child's needs & be sure those needs are met. The main reason kids act out is because they feel disconnected.

Traditional punishment models get results through fear, shame, & guilt. This erodes self-esteem & leads to anger & resentment, which results in more bad behavior. It also doesn't teach them to think about why certain behaviors are wrong or how their actions impact others.

A positive discipline focuses on teaching children HOW to

do things the right way.

Understand Needs

Understand why your child is acting up. Whether they are hungry, tired, or frustrated can change your entire perspective & make you much more empathetic with their plight (and less likely to resort to yelling or threats).

Distraction

It is a simple technique that works specially well with younger children. It is also extremely helpful when kids get cranky & whiny because they have to wait for something.

Instruction

The idea behind instruction is to tell your kids what you DO WANT instead of telling them to stop doing whatever it is you don't want. This is one of those parenting techniques that take a little practice, but the results are worth it. For example; Instead of saying "Don't run!" say "Walk, please."

Connection

One of the core tenets of positive parenting is that kids are at their best & "behave" more when they feel deeply connected to their caregivers. This is a great opportunity for you to help your child take responsibility for their actions. A time-in becomes a teaching moment. It also maintains the strong connection between yourself & your child, which lessens the chance of them making the same poor choice.







Like so many things in life, sometimes it is best to throw out the old & bring in the new. For the sake of children, it is far better to treat them with mercy, grace, understand them as they are, and teach them the critical skills of life through love far more than through fear.

GUIDE TO CONQUERING SOCIAL AWKWARDNESS

Awkward silences • Uncomfortable feelings

Trying hard to come up with fillers • We've all been there.

When you've just met someone and are trying to get to know each other better, going beyond the usual "Hi" becomes an absolute necessity. Yet somehow the impending awkwardness of the situation makes social interaction feel like a task.

Profile of socially awkward people

- Feeling nervous in social settings
- · Lack of conversation flow
- Constantly replaying that embarrassing moment
- · Feeling self-conscious
- Being hesitant & timid

Does it serve any purpose?

A 2012 study suggests these very feelings can help by acting as a warning system of sorts. They help you realize when you've approached a social boundary. As a result, you might experience physical symptoms of anxiety, panic or fear including:

- Muscle tension
- Flushed face
- Pounding heart
- Nausea
- Hyperventilation

Despite sounding unhealthy, this discomfort can motivate you to:

- Take action at the right moment
- Take care to avoid missing similar social cues in the future







Social Anxiety vs. Social Awkwardness

According to the **Social Anxiety Institute,** Social Anxiety Disorder (SAD) is described as an intense, recurrent state of emotional stress in social situations. When placed in these situations, those who suffer from SAD may experience physiological symptoms such as a racing heart, excessive sweating, trembling, difficulty in swallowing or other reactions and often require treatment.

Unique perspectives

Psychologist Ty Tashiro in his book, "Awkward: The Science of Why We're Socially Awkward & Why that's Awesome" states that socially awkward people tend to view the world around them in different ways.

They may be less likely to notice cues or pick up on emotions but feel more driven towards systematic or scientific approaches.

This unique perspective may stem from

differences in the brain - differences that sometimes relate to high intelligence & achievement.

They are good at seeing details, picking up on patterns in these details and taking a systematic approach to problems.

How to be more comfortable in social settings?

The following tips can help in navigating social situations and dealing with the repercussions that come from inevitable slip ups.



Be observant:

Look for subtle changes in body language, facial expressions & voice tone. This will help you be better at reading social cues, which in turn will make you less awkward.



Don't try to make people like you:

When we do things in order to be liked, we put ourselves under a massive amount of pressure. Just be yourself.



Be present and actively listen:

Be involved & listen carefully. This will make the other person feel that you are genuinely interested in talking to them.



Keep practicing:

The best way to tackle anything that feels challenging is to build up confidence with small steps.



Seek help:

Speak to trusted friends & colleagues - tell them how you're feeling.



Ask questions:

Begin your conversation with simple polite questions like hobbies, weather, news etc. Questions are a great way to start and take the focus and pressure away from you.

Awkward people are neither better nor worse than anyone else - they simply see the world differently & have to put more effort to master social graces that come intuitively to others. Being different is not a liability. Embracing your unique perspective & exuberance for uncommon things is the key to realizing your true unique potential.





HOW SCIENTISTS LEARNED TO ENTER PEOPLE'S DREAMS?

If you've watched "Behind Her Eyes" on Netflix, you might be intrigued with lucid dreaming - the phenomenon of being aware that you're dreaming while asleep. In the movie, the main character Adele obsessively uses lucid dreaming to spy on her cheating husband. Louise, her husband's lover, uses lucid dreaming to safely confront nightmares.

These fictional characters suggest that lucid dreaming (LD) can be a lot of things: exciting, pathological & even healing. Scientists are increasingly making a connection between lucid dreaming & mental health. Could this practice be a healthy way to confront the psyche or is it treading into dangerous territory?

The science behind lucid dreaming

Lucid dreams are when you know that you're dreaming while you're asleep. You're aware that the dreams aren't really happening but they feel vivid and real. You may even be able to control how the action in the dream unfolds.

It was confirmed by scientists in a 1981 study to be a real phenomenon. More recently, researchers used EEG to track lucid dreaming activity in the prefrontal cortex, a part of the brain involved in complex behaviours & personality development.

In a 2009 study, researchers categorised LD as a hybrid sleep-wake state which takes place during Rapid Eye Movement (REM) sleep.

But this isn't a natural occurrence for everyone! LD contrasts with typical dreams, taking place behind a thick wall that separates the dreamer from waking consciousness.

Positive mental health effects

An International Dream Research survey questioned 528 respondents about how they used lucid dreaming.

Common reasons for lucid dreaming included:



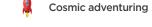
Problem-solving



Overcoming fears & nightmares



Spiritual growth & healing



Many participants, particularly men & young adults, used LD for wish fulfilment. Older people & women were more likely to lucid dream for healing purposes.

Healing with LD happens when you become actively aware that the dream is just an illusion. Many people use it to overcome fears, experience positivity and feel peaceful regardless of reality.

Concerns & risks

Few researchers have expressed concern that frequent lucid dreaming may lead to disrupted sleep or "getting stuck", unable to wake up effectively.

Experts recommended that people with mental health problems such as schizophrenia must not pursue LD as they might struggle to distinguish between dreams and reality.

A 2018 longitudinal study of 187 self-reporting undergraduate students reported that deliberate lucid dreaming induction can blur the lines between reality & hallucinations, increasing symptoms of "dissociation & schizotypy."

While wish-fulfilment & altered consciousness without substance use might sound safe & fun, those exploring lucid dreaming must be aware of its unwanted consequences.

Conclusion

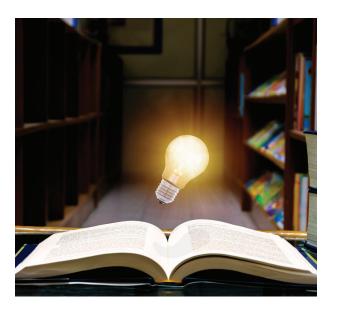
It seems that we may be cultivating a shared blind spot by focusing solely on the possible beneficial effects of LD induction, without considering its possible risks. Will frequent induction be deleterious to sleep hygiene & sleep-wake psychological boundaries? If so, is it worth it? Only further research can answer these. Till then, let's sleep & dream well.



HOW TO BOOST YOUR SELF-AWARENESS & MAKE BETTER DECISIONS

"Know yourself" is an excellent piece of advice. However, it's easier said than done. We all think we know ourselves much better than we actually do. But is that the truth?

Self-awareness is the foundation for personal growth. It involves understanding your own needs, desires, failings, habits, & everything else that makes you tick. You've got to be able to accurately monitor your inner world, as well as accept who you are with an open heart.



The benefits of self-awareness are far reaching, some of which includes:





Greater empathy & listening skills



Improved critical thinking & decision making communication



Enhanced leadership qualities

The W.H.O has also recognized the importance of self-awareness as one of the skills that power good health across all cultures. It's considered essential for mental well being.

How to Become Self-Aware?

Becoming self-aware is the first step in the creation of your ideal future. It's the personal commitment to yourself that you are ready & willing to upgrade your current reality. Once you are more aware of your thoughts, you become empowered to make changes that serve your highest self.

Keep a journal: Journaling is a great way to get connected with your inner world on a deeper level & communicate with any overlooked subconscious feelings. The act of writing provides a space for unexpressed feelings to be acknowledged. But what do you write about? We suggest that you should focus on one area of your life where you feel you're currently stuck.

Practice mindfulness: It helps to experience the totality of our emotions. The quiet time is a perfect opportunity to reflect on our feelings in the present moment. This will make us feel calmer & less stressed.

Ask for feedback from others: Feedback is a great way to discover our strengths & weaknesses. Through this, we can figure out how to harness & improve them.

Challenge yourself: Challenging yourself & putting everything on the line helps to propel forward & fuel personal growth. Test your limits & figure out who you are meant to be.

Signs of Self-Aware Individuals

You're unapologetically yourself: Self-aware people live from a place of integrity. They know how to stay in their own lane.

You listen to yourself: They take pride in their ability to pay attention & tune into what is happening inside of them. Their intuition rarely ever lies.

Strong boundaries: Setting a boundary is the ability to recognize the need for a healthy separation between your thoughts & feelings with that of others.

Final Thoughts

Self-awareness is the key to self-mastery. By making the commitment to discover new truths about yourself, you will grow & improve in every area of your life. When you know who you are, there is nothing you cannot do.

In the words of Eckhart Tolle, "Awareness is the greatest agent for change." So what actions will you take today to grow your self-awareness muscle & change your life for the better?



WHAT MOTIVATES YOU TO WORK?



The paycheck will never be big enough if it's the only reason you're going to work.

Each one of us responds to different drives & motivations, but there are many drives we can choose from, that not only make our careers more fruitful but also more enjoyable. Those people who experience the "Sunday blues" do lack joy & fulfillment. Sunday comes around & many of us immediately begin dreading our work week, thereby ruining the rest of our weekend.

Dan Ariely, a Behavioral Economist, talked about this scenario in his TED Talk, "What makes us feel good about work?". He said, "when we think about how people work, the naïve intuition we have is that people are like rats in a maze. We really have this incredibly simplistic view of why people work & what the labor market looks like".

Instead, when we look carefully at the way people work, we find out there's a lot more at play & at stake than money. Ariely provided evidence that we are also driven by the meaningfulness of our work, by others' acknowledgement & by the amount of effort we've put in. The harder the task, the prouder we are.

So, what motivates you?

What is it that makes us feel accomplished?



Money: Initially, the main thing we view as the most worthy motivating force inspiring us to work hard is money. Making money becomes a necessary motivation which directs us into our careers & motivates us to stay in them. It's a tool we all need for survival, but earning money also provides us with a feeling of status, success & achievement.



Purpose: To live a truly fulfilled life, we need to have a sense of purpose. Those without purpose live with more depression, with feelings of aimlessness than others. When we have a purpose, we feel directed & more certain about our lives & the direction in which we're heading.



Making a difference: There is nothing more fulfilling than knowing that what we contribute in this world makes a significant difference. When our contribution makes a difference, it makes our careers & our purpose feel much more rewarding. When we are inspired we are more motivated to get back to the grind each new day.



Responsibility: Our career may be stressful, but being irresponsible is even more stressful. When we are irresponsible we dig ourselves into holes that are impossible to get out of. Scott Peck in his book, "The Road Less Traveled" makes the point that there is no such thing as an irresponsible psychological healthy person. Self-management brings personal development & self actualization. Being responsible brings us to a sense of balance, feelings of success, motivation & self trust.



Challenges: We grow the most in our motivation when we are optimally challenged. Being in careers that feel like groundhog every day does not provide enough challenges for us to make any new efforts. In his book, "Resilience", Navy Seal Eric Grietens discusses how, when we are optimally challenged it is natural for us to rise to an occasion. We want to see & prove that we can leap over whatever hurdles are placed in front of us to glean the satisfaction of having a win at the end of the game.



Passion: It drives people to push themselves harder to achieve it. Don't just work for the sake of working. Love your work & it will love you back. As they say, enjoying what you're doing is like not working at all because they enjoy every minute of it.



Acknowledgement: We all desire, & want to be acknowledged when we have performed well. Acknowledgement can come in the form of a compliment, a raise, a promotion, all paid expenses trip, bonuses, or support & encouragement. Personal growth & higher visions of what we're capable of achieving cannot come without the all important ingredient of acknowledgement.



Duty: Having a sense of duty, a place to go, things to accomplish & achieve is a great motivation. When we are motivated by strong values we are given the opportunity to build & define our character. Having a sense of duty is what motivates us to be good to ourselves, honest in our approach to relationships & develop a positive reputation. There is nothing that will speak more highly of us than our character & what we stand for.

What to Do When You Have No Motivation?

Act as if you feel motivated: So ask yourself, "What would I be doing right now if I felt motivated?" Consider what you'd be wearing, how you'd be thinking, & what actions you'd be taking. Then, do these things, & see your motivation levels increase.

Argue the opposite: When you think you're going to fail, argue all the reasons why you might succeed. Or when you think you can't finish a job, list all the evidence that shows you'll be able to complete the task.

Practice self-compassion: Research suggests that self compassion is actually much more motivating, while we are struggling with adversity. It also improves mental health. A 2012 study suggests that self-compassion decreases psychological distress, reduces depression & anxiety as well as the harmful effects of stress.

Pair a dreaded task with something you enjoy: Boost your mood by adding a little fun to something you're not motivated to do. Just make sure that your fun doesn't impair your performance. Here are some examples:

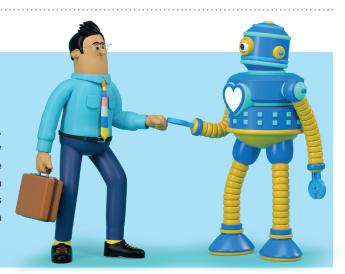
- · Listen to music while you run
- · Light a scented candle while you're working on your computer
- · Invite a friend to run errands with you

Practice self care: Create a healthy self care plan that allows you to take care of your mind & body:

- · Exercise regularly
- Get plenty of sleep
- · Drink water, & eat a healthy diet
- · Make time for leisure & fun
- · Avoid unhealthy habits like binge eating & drinking too much alcohol

Know what motivates vou to succeed

Motivation isn't lasting, but we need it to keep moving. It is what is driving all of us to our goals. This may change but we can keep it by recognizing how they are changing. At the end of the day, living your life with motivation can give you that sense of fulfillment that is also essential for your personal growth. Find your own motivation to succeed today!





HIIT (High-intensity interval training) has gained acclaim as being an efficient way to improve many aspects of physical fitness & gained a reputation for being a "Magic Pill" of exercise.

WHAT IS HIT

A HIIT workout consists of short bouts of intense work lasting anywhere from 10 to 60 seconds, followed immediately by a period of active recovery of the same length or longer. This cycle is repeated anywhere from 3 to 10 times, depending on the workout.

Positive physiological benefits include heightened post-exercise metabolism, improved body composition, and improved fasting blood glucose & insulin sensitivity.

On the flip side, it can lead to elevated levels of

cortisol in the bloodstream and heighten symptoms of

physical stress, even when exercise is not being performed.



HIIT is for everyone - regardless of age

Many people consider HIIT with activities like CrossFit or a Boot Camp, but these aren't the only HIIT exercises. For example - Walking up a steep incline will get your heart rate up, even if your pace is slower. Other activities include a stationary bicycle or marching on the spot.

So, what is Cortisol?

Cortisol is a hormone that our body produces to help us handle stressful situations. During HIIT exercises, the brain senses the stress and causes the body to release certain hormones. Cortisol is one of them. The release activates the fight-or-flight response in the sympathetic nervous system, making our body believe that it may be in danger.

How HIIT affects cortisol levels?

Part of what makes HIIT training so effective at turning the body into a lean, fast & powerful machine is the cortisol response that it generates. As your legs start pedalling as fast as possible, your brain receives the message that your survival depends on this interval. The body makes metabolic improvements following this routine.

Symptoms of Cortisol

The problem with cortisol is that when our body has too much of it - either because of physical or psychological stress - it floats freely in the bloodstream, causing negative symptoms to creep into our daily lives.

Overtraining Syndrome has some physiological causes, which may include a raised level of cortisol. The symptoms include:

- Anxiety
- Chronic fatigue
- Changes in mood
- Lack of motivation
- Changes in sleep patterns or sleeplessness
- Repressed immune system & consistent illness

Too much HIIT can confuse the brain into signalling a protective response even when our bodies are supposed to be calm or at rest.

Everyday tasks, such as packing lunches & driving to work, might leave us feeling agitated because the body is misinterpreting everyday stress as a life-threatening situation.

Because HIIT solicits such a powerful reaction, it's critically important to prioritise recovery after such workouts.



Recovery between intervals & recovery days between workouts are keys to seeing positive physical results. The quality of recovery is also important and can be enhanced with different practices, including:



Sleep



Foam rolling or massage



Good nutrition & hydration



Abstaining from intense exercise



Meditation & slow breathing exercises

It is important to note that this kind of workout should be performed 2-3 days a week at most, with rest days between each session.

So, next time you challenge yourself with a HIIT workout, be sure to plan for rest afterwards to reap the biggest gains.





Three year old Sophie is sitting at a low table, trying to build a house out of large plastic bricks. It could be a scene from any nursery school, but for the bizarre apparatus that Sophie wears: a snuggly fitting black cap studded with sensors & sprouting multiple thick, black wires. It looks slightly weird & sinister, but the harmless cap is letting a researcher do something that has never been done before: Peer inside the Brains of Active toddlers.

Young children do & say the most extraordinary things, & in neurological terms, they are extraordinary creatures. Prof. Natasha Kirkham, a reader in developmental Psychology at the Birkbeck Centre for Brain & Cognitive Development (CBCD) in London states that "The change in between 2-5 years of age is pretty spectacular: there's a lot going on in terms of the brain & cognitive development".

Babies brains have been extensively studied, by tracking their eye movements, the flow of blood to different brain regions - through a technique called functional near infrared spectroscopy (fNIRS) - & the brain's electrical activity.

The development of wearable's & wireless technologies is now enabling scientists to extend their studies to toddlers. This will allow us to understand how they begin to interact with each other socially, & how that impacts their learning. "What are these?" asked a puzzled Serena, aged 4, to Research Lab developer, Dr. Paola Pinti who hands her a pair of pink fingerless gloves to wear for a day. The gloves enable the research team to track Serena's hand movements via 18 motion tracking cameras rigged up around the laboratory ceiling while she plays with blocks.

She's shown a small video in which an adult demonstrates how to press a button to release individual blocks from a set of boxes to build a house. When the video stops, Serena is told to copy what she just observed. Her last performance was very different & she was less able to follow the complex instructions. But now she deftly builds a sturdy colored house.

Other laboratories include "Home lab", resembling a front room, & a "Nap lab" where researchers can study children's sleep. They are also studying children's behavior with their surroundings.

In a small study of less than 100 children without known mental health concerns, it was found that connections in certain areas of the brain seen at age 7 could help predict mental health concerns that developed four years later. Such studies could help us approach mental illness proactively rather than wait for the onset of distressing symptoms. Identification of biomarkers at a young age will enable us to intervene with exercise, cognitive therapy and mindfulness which could possibly prevent progression to full blown illness.

Toddlerhood is when children start to discover social interactions, gradually progressing from playing alongside

one another, to sharing & collaborating during play. With the help of new technology, these abilities will be shaped into a more sophisticated mental process, self concepts & social relationships during the early years of their childhood.



Technology Overuse & the Fear of

"DIGITAL DEMENTIA"

The advent of technology has undoubtedly changed the landscape of modern society. Rapid digital

innovation led to tech-centric routines that have progressed into a heavily tech-reliant lifestyle.

While these devices have certainly made life easier, efficient & more convenient in a myriad of ways, it's over use may be causing us more harm than good.

Our dependence on internet enabled devices could lead to Digital dementia" -

a term coined by German neuroscientist Manfred Spitzer to describe a decline in cognitive abilities more commonly linked with brain injuries. He argued that Digital media has a substantial negative influence on our Mental Health & may have a significant impact on our everyday life.

What are the symptoms of Digital Dementia?

Early signs include a decline in mental function, such as memory, concentration & attention span. Individuals may have difficulty remembering patterns of numbers, directions, or even names of people. It may eventually cause stress, frustration & despair.

Is overuse of Technology really leading to Digital Dementia?

Rational cognition, fact finding & numerical computation are all done by the left side of the brain, whereas creative & emotional thinking are done by the right side of the brain. An underdeveloped right side might lead to an early onset of dementia.

Mental deficiencies such as lack of attention, short attention span & unhappiness are all caused by the fact that the imaginative & creative thinking is located in this area.

As an example, there was a time when people could remember a lot of phone numbers. But today, most individuals have a hard time recollecting them now because they are all stored on their smart phones.

According to American Posture institute, a dominant flexor posture, in which your head & shoulder are slumping forward in a C-shape, is another problem. Brain blood flow & oxygen supply are both restricted in this position & contribute towards Digital dementia. This posture can also lead to long term cerebral impairment.

HOW TO PREVENT & OVERCOME DIGITAL DEMENTIA?

Here are a few helpful tidbits:



Using your brain is the best way to get things done:

Picking up our phones & googling the answer has become our go-to response. We need to reject this new, natural instinct & start utilizing our brains or just ask the person sitting next to us.



Take a pause: Avoid using technology during the day & refrain from looking at your mobile frequently.



Organize your thoughts in advance: Prepare & plan ahead. Determine whether or not your laptop or emails will need your presence at an event. A good strategy should allow us to spend less time staring at the screens & more time engaging in face - to - face interactions.



Exercise: To keep your muscles flexible, perform some extension exercises regularly.



Limit your time on the internet & screen: Allow your eyes, & more crucially, your brain to rest.



Indulge the brain: take up games or activities that challenge you to think and use imagination to give your brain a good workout

Wrap up

Addressing the negative impacts of technology is still an ongoing area of investigation & in some ways; the limited information on prevention & treatment approaches has yet to catch up with the rapid development of Digital technologies.



We need to use technology with more intention & purpose. By becoming more mindful of the usage of digital media, we can avoid adverse & long term effects.

FOOD FOR Peficiencies

Our body requires a steady supply of both macronutrients and micronutrients to maintain our brain, muscle, bone, nerves, skin, blood circulation and immune system. Generally, we need large amounts of macronutrients - Proteins, Fats, & Carbohydrates. In contrast, the micronutrients - vitamins & minerals, are consumed in small quantities but are nonetheless essential for physical and mental development.

Micronutrient deficiencies are an important global health issue, with malnutrition affecting key development outcomes including poor physical and mental development in children, vulnerability or exacerbation of the disease, mental retardation, blindness & general losses in productivity & potential. Unlike energy-protein undernourishment, the health impacts of micronutrient deficiency are not always accurately visible; it is therefore sometimes termed as "hidden hunger". The World Health Organization (W.H.O) estimates that more than two billion people suffer from micronutrient deficiency globally.



The importance of Micronutrients

Nearly 30 vitamins and minerals that our body cannot manufacture in sufficient amounts on its own are called "essential micronutrients".

British sailors learned centuries ago that living for months without fresh fruits or vegetables - the main sources of vitamin C - caused bleeding gums and scurvy. Even today

in low socio-economic countries, people frequently suffer from a variety of nutrient deficiency diseases.

Eating less than optimal amounts of important vitamins, minerals and compounds can contribute to a number of major illnesses, such as heart disease, type II diabetes, cancer & osteoporosis.



Are you getting enough micronutrients?

Conflicting studies have led to great confusion. However the best way to get vitamins & minerals is from plenty of fruits, vegetables, legumes, whole grains and lean sources of protein, along with healthy fats, such as nuts & olive oil.

Which micronutrients do many people lack?

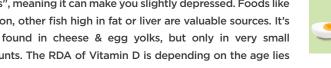
Each and every vitamin, mineral and trace element has a specific reference value, called "Recommended Dietary Allowance (RDA)". This is defined as the daily intake level, sufficient to meet the nutrient requirement of nearly all (98%) healthy individuals.

There are a few vitamins & minerals which we should pay extra attention to, as many "allegedly" healthy people lack these specific substances.



Vitamin D is required for the regulation of the body's mineral balance & strengthening the immune system. It is the only vitamin that can be produced endogenously by the human body.

But the magic helper to produce this little vitamin is the Sun. Bad weather, too much work, seasonal changes can aggravate the symptoms of Vitamin D deficiency known as "winter blues", meaning it can make you slightly depressed. Foods like salmon, other fish high in fat or liver are valuable sources. It's also found in cheese & egg yolks, but only in very small amounts. The RDA of Vitamin D is depending on the age lies between 600-800 IU per day (= International Units).



Vitamin E acts as an anti-oxidant & plays an essential role in the metabolism of each cell in the body. The estimated recommended value is 12-15 mg per day. Good sources like

sunflower, olive or wheat germ oil taste great in salad dressings. Start including them in your breakfast from today.



Folic acid acts as a crucial substance for DNA synthesis, which makes it especially important for women of childbearing age as they have an increased requirement. Lack of folic acid

during pregnancy can lead to severe birth defects. We should ensure a sufficient amount of folic acid in our daily nutrition by eating plenty of greens & soybeans. The RDA of folic acid for pregnant women is 400 mcg per day.



Calcium is important for the mineralization of our teeth & bones. It's found in vegetables & dairy products. The RDA of calcium is depending on the age lies between 300 - 1200 mg/day.



Iron is essential for the transport & storage of oxygen. We should integrate meat, vegetables or cereals into our diet to meet the dietary iron RDA. The RDA of dietary iron is 15 mg per day.



lodine is another trace element most of us fall short of. Its main function is to be a cofactor for our thyroid hormones. We can integrate sea fish, algae or iodine enriched salt into our

diet. The RDA of iodine depending on the age lies between 180 & 200 mcg per day.



Let's recap now!

Micronutrients are essential substances that our body needs for all metabolic processes and which can - in most cases - not be synthesized by our body. Avoid these deficiencies by eating appropriate food as well as getting outside & enjoying fresh air & daylight.





WHY IS THERE NO SUCH THING AS A HEALTHY DIET THAT WORKS FOR EVERYONE?

Eggs are good for you. Red meat is bad for you. Avoid processed food. Enjoy ghee in moderation. Butter is out. White butter is back. Does it make your head spin? According to a recent survey by International Food Information Council Foundation, 80% of people feel confused about nutrition. The seemingly changing nutrition landscape & setting aside conventional views - there's actually a lot of agreement in the nutrition world.

For decades, Geneticist Tim Spector of King's College, London ate the same thing every day! A tuna & sweet corn sandwich on brown bread, followed by a banana. He thought it was a healthy choice, until he turned the microscope on himself & discovered that it was the worst possible thing he could eat. He experienced post lunch surges of sugar & fat in his bloodstream, both of which are known risk factors for diabetes, heart disease & obesity.

Recent research done by his team showed that the food is highly individualized & that, there is no such thing as a healthy diet that works for everybody. In fact, people respond to food in such idiosyncratic ways that everybody needs a personalized nutrition plan. It looks like why nutrition science has consistently failed to produce a straight answer to its most pressing question: What constitutes a healthy diet?

You Do You

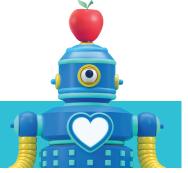
Eating is subjective and it involves more than just fueling your body or sitting down with nutrients on a plate. Your friend might be successful on a Keto plan and your neighbour may love being a vegan, but these plans pose various challenges. We need to understand our unique needs and then identify an eating pattern that suits us the best.



Have We Missed The Mark?

Tailoring food intake to match nutritional needs is important to maintain immune function, prevent bone and muscle loss, preserve eyesight and protect our cells from free radical damage. The following guide will help you to eat healthily and meet daily needs for key nutrients across the decades.

Age group	Focus on	Dietary supplements
20s	Calcium, Folate and Iron	Salmon, legumes, tofu, almonds, and cooked green vegetables. Oysters, breakfast cereals, lentils, chickpeas and raisins are good sources of iron.
30s	Calories and Magnesium	Trim calories from refined starchy foods, sweets and sugars added to beverages and foods. Increase intake of almonds, cooked spinach, cashews, plain yoghurt and raw wheat bran.
40s	Antioxidants	Consume food high in Vitamin C and E including red and green peppers, citrus fruits, kiwi, broccoli, sprouts, strawberries, tomato juice, hazelnuts and peanut butter.
50s	Calcium, Vitamin D, Vitamin B12	Adequate sun exposure and multivitamin supplements will do the trick.



A healthy diet has many benefits. Different diets work for different people and we should pick the one that suits our lifestyle and tastes. The best diet for you is the one that you can stick to in the long term. Bon Appétit!



IS FOGO THE NEW FOMO?



It's a Friday night

Your go-to group chat is ablaze with dinner plans. It sounds like the recipe for a fun night for everyone on the WhatsApp thread except...for YOU.

Having to battle through the rush hour traffic to get to a cafe & then try to talk in the midst of the hustle & bustle just didn't sound appealing. So, most of us might reply back that we have tons of chores to do. The outside world can be busy & overwhelming, & sometimes we just want to get off the treadmill of endless socializing & hibernate.

We've all heard or experienced FOMO, otherwise known as Fear of Missing out, but the above experience is a different acronym: FOGO, aka Fear of Going Out. Severe FOGO is actually social anxiety disorder; it's a fear of being judged or watched by others that's so intense it interferes with everyday tasks. But for many of us, our FOGO isn't tied to anxiety at all. May be you're an introverted person who gets your energy from quality time with yourself. This means making time to indulge in things that make you happy alone -knitting, painting, watching a good movie, or reading a book.

Both FOMO & FOGO appear to result from an abundance of anxiety at their core. If you feel that you fall into this category, you might feel excessively worried, nervous, or may experience an increase & intensity of swirling thoughts related to the fear of missing out or going out. Anxiety related to how others may or may not judge you, or may not like or accept you, can stem from a challenging monologue that is tied up in doubt & uncertainty.

FOGO was something that individuals with social anxiety & agoraphobia dealt with long before the Pandemic. One could hypothesize that the Pandemic shifted the culture around this fear.

Comfort over fear?

FOMO & FOGO are powerful emotions that affect our social relationships & change our behavior. Social media has taken on even greater importance in an attempt to keep in touch with friends, family & the rest of the world as we shelter-in-place. We are all united in the quest to remain engaged in the absence of outside stimulation & face-to-face connections. Our new challenge has become keeping up with the onslaught of live webinars, Yoga or fitness videos, interviews or musical concert that keeps popping up each day. We are now participating in numerous virtual platforms in the privacy of our homes. Besides, the internet offers an immense wealth of possibilities for buying news, leisure, & other products just with a click of a button. You can book airline tickets, or buy food at an online grocery store.

"To go out or not to go out"

If Shakespeare's Hamlet lived in COVID-ian times, we know what his dilemma would be.

In this uncertain period now as cases are declining in certain cities & going up in others, one wonders if home-wearied ones can finally step out & ease their FOMO or whether going out now can only hasten the onslaught of the next wave - the sense of FOGO has brought with it.

"Look at the pictures of the tourists crowding at the Hills. Who knows where one can catch the infection if one goes out?" says Karan, who has seen his fair share of noses poking out of masks.

Let's not blame the Age

Once we're moving into our 30s & 40s, we naturally start slowing down as energy level dips. We no longer have the energy to stay up till 3 am. But at the end of the day, it's all about balance. We might have a hectic day at work, but we want to unwind & spend time on our own. "I have two boys," says Namita. "Now, even at weekends, especially if my husband has had a hard week at work, we curl up on the couch & watch a good movie. That's quality time & it recharges us for the upcoming week. Or we will invite friends over to join us; it's easier & nicer than going out."

So, can we find our happy medium? Below we suggest a few practices to help free us from the grip of FOMO & FOGO that enhances the quality of relationships as well as our overall well-being.



Slow down: Most of us move at a faster pace which is beneficial to our best interests. Practice taking your time while engaging in everyday tasks. It can be helpful to post reminders of this intention in prominent places in order to support yourself.



Practice discernment: With regards to distinguishing what is truly important & necessary from what is merely desirable, and choose to eliminate some of the things that don't contribute to the deepening of the quality of your life experience. Focus on the kinds of things that enhance the quality not the quantity of your experiences.



Be willing to not have it all: Needs are limited. Desires are endless. Accepting the essential futility of trying to fulfill every desire we have is much wiser than indulging all of our impulses for gratification. Prioritizing certain activities enables us to let go of others.



One thing at a time: When we are focused on a single task, & give our full attention to it, not only we're more likely to be successful in producing a high-quality result, but the level of satisfaction while performing the task is much higher.



Practice mindfulness: Rather than chasing after what may just be an illusion of happiness, we can gently strive for the deep satisfaction that comes with the cultivation of mindfulness—the practice of being present in our lives & giving non-judgmental awareness to our moment-to-moment experience.



Cultivate an attitude of gratitude: This practice allows us to more deeply appreciate what we have rather than focusing on what we lack or desire. Gratitude allows us to count the blessings in our life right now, in this moment, where life is actually going on.

Bottom line

We should remember that the most important thing is to experience life. For example, take things slowly, starting with small outings where you feel safe. Putting situations into perspective, analyzing the positive aspects, & writing down fears & feelings to overcome them. Let's talk & share experiences with friends & family, without being afraid of others' judgments. We are entering the new post pandemic era & it is important to be aware of it to face it in the best possible way.

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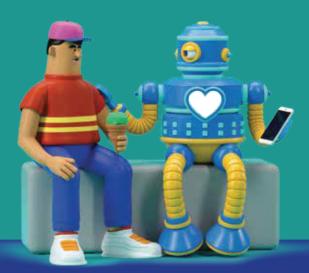
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