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SCIENTIFIC ARTICLES

THE FASCINATING FIBONACCI NUMBERS

GEETA PALUSKAR

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Universe is a wonderful space full of incredible shapes and patterns. It always surprises you to find patterns in most unexpected ways. Ever seen a sunflower closely? You will notice that the seeds at the centre form spiral patterns. There are spirals winding clockwise and there are the ones winding opposite too. The number of spirals are most often found to be 8 and 13 or 13 and 21 or 21 and 34. And there is something special about these numbers. Ever counted number of curving, turning lines of spikes on the surface of a pineapple? You will be amazed to notice that almost always there are 5 and 8 such spirals when counted back and forth. (Well, most often, though not always.) The number of petals on flowers vary from species to species. But the most commonly found numbers are 3, 5, 8. We do come across four petal or 7 petal flowers, though they are relatively rare compared to 3, 5 and 8 petal flowers.

- Collect 10 different flowers commonly found around you and count their number of petals
- Collect 5 sunflowers and count the seed spirals in both the directions.
- Repeat the above exercise with Pineapples. (If available)
- Repeat the above exercise with pine cones (If available)
- Note down all your results in a journal with date and time

So what is so special about these numbers? Well they are all a part of a sequence known as Fibonacci sequence. It is a series of numbers which starts with 1 and 1 as first two terms, and then you add the two numbers to get the next term of the series. So the Fibonacci sequence goes as

Table1: sequence (1): Fibonacci Sequence: First 18 terms

F 1	F 2	F 3	F 4	F 5	F 6	F 7	F 8	F 9	F1 0	F1 1	F1 2	F1 3	F1 4	F1 5	F1 6	F17	F18
1	1	2	3	5	8	13	21	34	55	89	144	233	377	610	987	159 7	258 4

We refer to the terms as F1=1, F2=1, F3=2(=1+1), F4=3(=2+1), F5=8(=5+3), ...

So in general the sum of nth term and the next one of the Fib Sequence gives the next to next one.

$$F_{n+2} = F_{n+1} + F_n$$
 (for a natural number n)

This is a "recurrence relation" that defines the sequence.

• Make an excel table to generate first 50 terms of a Fibonacci sequence.

Fibonacci numbers have always fascinated math lovers. They appear in nature in most surprising ways and forms. In the examples mentioned above, the number of spirals of sunflower, pinecones and pineapple in both directions are almost always two numbers of Fib sequence which follow each other, like 5 and 8 or 8 and 13 and so on. The number of petals in a flower many times is a Fib number. You can check this with Roses and Daisies. In many trees, the branching takes place in a Fib sequence.

• Check your observations from the previous activity, have you got any Fib numbers?

Let us compute the ratios of successive terms of the first 18 terms of the Fib sequence. We will

compute F2/F1, F3/F2, F4/F3 and so on. The results are tabulated below.

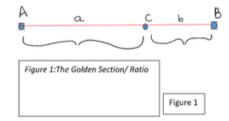
Table 2: The Fibonacci Ratio

n	The nth Fib number	The ratio of successive terms	N	The nth Fib number	The ratio of successive terms
1	1	_	10	55	1.617647059
2	1	1	11	89	1.618181818
3	2	2	12	144	1.617977528
4	3	1.5	13	233	1.618055556
5	5	1.666666667	14	377	1.618025751
6	8	1.6	15	610	1.618037135
7	13	1.625	16	987	1.618032787
8	21	1.615384615	17	1597	1.618034448
9	34	1.619047619	18	2584	1.618033813

Note that the ratio of two neighbouring terms is sort of stabilising around 1.61803. If we keep on computing ratios, we will keep on hovering around the same number. This number is referred to as the golden ratio. As we keep on going infinitely, this ratio converges to an irrational number, denoted by Φ (phi). It is interesting to note that even though Φ (phi) is defined as a ratio of two integers, it converges to an irrational number. Well, Mathematics is full of such wonders.

How in general is the Golden ratio defined?

Well, consider a line segment as shown below. The ratio of AB to AC is same as ratio of AC to CB. This ratio is called the golden ratio or extreme and mean ratio.



Note that b, a and a+b form the three successive terms of the Fib sequence.

The golden ratio is defined as

$$\varphi = \frac{AB}{AC} = \frac{AC}{CB}$$

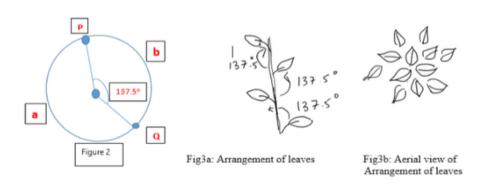
The golden ratio is defined as
$$\phi = \frac{AB}{AC} = \frac{AC}{CB}$$
 Hence, $\phi = \frac{a+b}{a} = \frac{a}{b}$ and, $1 + \frac{b}{a} = \frac{a}{b}$ which means $1 + \frac{1}{\phi} = \phi$

A simple cross multiplication yields that $\phi^2 - \phi - 1 = 0$

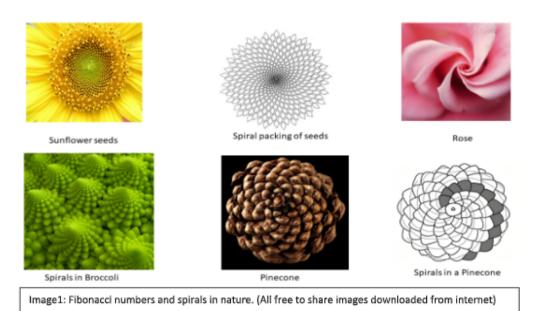
Keeping in mind that is a ratio of positive numbers, we solve this quadratic equation, to get

 ϕ and $\frac{1}{\phi}$ share many interesting properties and we can feel their presence in many shapes and patterns around us.

Consider a circle sectioned such that the lengths of the larger and smaller arcs are a and b which are in the golden ratio. That is $\frac{a+b}{a} = \frac{a}{b}$ (refer Figure 2) The smaller of the resultant incident angles is called the golden angle which is approximately equal to 137.5°.



This is the golden angle, which is most naturally selected by many plants for arrangement of leaves on the branches for optimum sunlight. The study of the arrangement of leaves on a plant stem in botany is called phyllotaxis or phyllotaxy. This study has revealed that leaves grow on branches in specific patterns called Phyllotactic spirals. In many plants, the leaves grow in such a way that they form a Fibonacci spiral around the branch. This allows each leaf to get optimum sunlight. The angle between two leaves is almost 137.5° , which is regarded as golden angle. The Sunflower seeds show Fibonacci spirals so that optimum seeds are packed at the centre of the flower. It should be noted that Fibonacci Phyllotaxis is a general tendency of some plants but not a rule that defines arrangement of leaves of all plants.



Sometimes the leaves and petals are found to be from a slightly different sequence called Lucas sequence

which is similar to Fib sequence, except that it starts with 3 and 1. Sometimes we get a sequence starting with still different first two terms like

with the Fib property, that its next term is sum of the previous two terms.

- Try finding ratios of first 18 terms of the sequences 2 and 3 above and note down your findings. Do you get Golden ratio? (You may use Excel)
- Have you come across any flowers with number of petals in sequence 2 or 3?

This article will be incomplete without a few words about the man who introduced this sequence. Fibonacci (Leonardo Pisano Bogollo) born in Pisa, Italy, belonged to a family of traders and had keen interest in Mathematics. He travelled to Middle East and India for business. His book, Liber Abaci, is a treatise on commercial Mathematics that Fibonacci learnt during his travels. Two important contributions of Fibonacci to Western mathematics are

- Introduction of the Hindu numeral systems in Europe (use of 0,1,2,3,4,5.... To write numbers)
- The series of numbers, later named the Fibonacci Sequence after him, which he mentioned in 1202in his book, only as a now famous Rabbit puzzle which is as follows:

If you start with 1 pair of rabbits, how many pairs of rabbits will you have after 1 year assuming that each pair takes 1 month to mature and produce 1 other pair each month afterwards.

The rabbits puzzle is an unrealistic scenario, however, it gives rise to the Fibonacci sequence. Fibonacci did not delve much on this problem in his book. It was many centuries later, the puzzle gained popularity and the resulting sequence was named after him.

There are several examples based on the golden rectangle and the golden spiral which are popular among the Fibonacci enthusiasts. It is a common belief that the golden ratio is the most beautiful ratio and most naturally occurring in human body parts, popular pieces of art and architecture. However, there is no mathematical evidence supporting these beliefs. Math demands proof and seeks truth. That is the true spirit of mathematics.

References and Further Reading:

- 1. The Fabulous Fibonacci Numbers,
- Alfred S. Posamentier, Ingmar Lehmann, Prometheus Books, New York
- 2. THE GOLDEN RATIO The Story of Phi, the World's Most Astonishing Number; Mario Livio, Broadway Books, New York
- 3. https://www.khanacademy.org/math/math-for-fun-and-glory/vi-hart/spirals-fibonacci/v/doodling-
- in-math-spirals-fibonacci-and-being-a-plant-1-of-3
- 4. https://www.mathstat.dal.ca/fibonacci/ (The Fibonacci Association- Official website)

SCIENCE SHORE | PAGE

CURRENT NEWS - SCIENCE SERIES

SERIES 7 - CCMB UPDATES

GITA BHARATH

The first piece of the DNA puzzle was decoded in 1869, when Swiss physiological chemist Friedrich Miescher first identified what he called "nuclein" inside the nuclei of human white blood cells. However, it's structure was very important to understand Genetics and Heredity. The way organisms differ usually includes microscopic and sub microscopic differences in the chromosome structure such as deletions, duplications, copy-number variants, insertions, inversions and translocations.

Cells need to copy their DNA very quickly, and with very few errors (or risk problems such as cancer). To do so, they use a variety of enzymes and proteins, which work together to make sure DNA replication is performed smoothly and accurately.

Watson is famously supposed to have had a dream of two snakes intertwining and rising up in the air. This led to the "Eureka" moment, when Watson and Crick finally were able to postulate the Double Helix.

Using cardboard cut-outs representing the individual chemical components of the four bases and other nucleotide subunits, Watson and Crick shifted molecules around on their desktops, as though putting together a puzzle.

They were misled for a while by an erroneous understanding of how the different elements in thymine and guanine (specifically, the carbon, nitrogen, hydrogen, and oxygen rings) were configured. Only upon the suggestion of American scientist Jerry Donohue did Watson decide to make new cardboard cut-outs of the two bases, to see if perhaps a different atomic configuration would make a difference. It did. Not only did the complementary bases now fit together perfectly (i.e., A with T and C with G).

ACGT is an acronym for the four types of bases found in a DNA molecule: adenine (A), cytosine (C), guanine (G), and thymine (T).

In India, the Centre for Cellular & Molecular Biology (CCMB) is a premier research organization in frontier areas of modern biology. The objectives of the Centre are to conduct high-quality basic research and training in frontier areas of modern biology, and promote centralised national facilities for new and modern techniques in the inter-disciplinary areas of biology.

Its major research interest has been in the field of human origin, health and disease, to understand the complex origin and affinities of Indian populations, using the genomics variations of contemporary populations and ancient biological remains. And also in understanding the impact of endogamy on health and disease of South Asians.

CCMB has contributed enormously in many fields, of which a few are described in the following section:

Decoding prehistory:

Discovering that the enigmatic tribal populations of Andaman Islands are the first modern humans who migrated out of Africa through southern coastal route about 65,000 years ago (Science, 2005).

Modern history:

Hyderabad, Apr 28 (PTI) A genetic study by researchers of city-based Centre for Cellular and Molecular Biology (CCMB) and other institutes has revealed that the skeletons excavated from an old well in Ajnala town of Punjab in 2014 belonged to the 26th Native Bengal Infantry Battalion killed by the British army during the revolt of 1857 as part of the Indian freedom struggle. The results from this research are consistent with the historical evidence that the 26th Native Bengal Infantry Battalion consisted of people from the eastern part of Bengal, Odisha, Bihar and Uttar Pradesh," said Sehrawat, the first author of this study.

As per historical records, soldiers from this battalion were posted at Mian-Meer, Pakistan, and killed British officers in a revolt. They were captured by the British army near Ajnala and executed, it said.

Genetic Counselling:

Several clinical conditions are predicted by defects in genes; many of them are causal in nature while several others predict increased risk for these conditions. Since genetic disorders are usually incurable, prevention of their inheritance or their development is the best option. Through genetic counselling, CCMB provides assistance in determining the genetic nature of any clinical condition based on clinical history and pedigree analysis and supplements with providing information about its clinical course, probability of developing and transmitting it, ways in which the disease condition can be prevented or ameliorated, pre-pregnancy monitoring and prenatal diagnosis.

Forensics:

CSIR-Centre for Cellular and Molecular Biology (CCMB)'s multifaceted research activities, especially during COVID-19, has set newer standards for science and technology in the country, CCMB has contributed to the importance of wildlife forensics and DNA fingerprinting. When a tigress was killed in the Hyderabad zoo and its skin was traced in Mumbra, Maharashtra — the

case was solved by the institute's wildlife forensic services.

CCMB's contributions in solving paternity disputes and criminal cases via DNA fingerprinting technology has helped the police as well.

(https://philpapers.org/rec/KANTDT)

Ultimately, the progress in cellular biology and gene therapy will make humans and animals a healthier race, and provide a secure food source, applying research in this field to agriculture and aquaculture, too.

References:

- 1. Nature.com
- 2. ccmb.res.in

NARINDER SINGH KAPANY – THE UNKNOWN FATHER OF FIBRE OPTICS

N. SANJANAA

What are fibre optics?

Made with silica or plastic, fibre optics are transparent and flexible fibres, that transmit encoded pulses of light in a matter of seconds without losing any information encoded in the rays. Today, fibre optics are being used in various fields such as, everyday transmission of data, lasers, biomedical instrumentation, solar energy and pollution monitoring, among other things. Our ability to use fibre optics everyday in such variety of ways must be owed to the pioneering work of one of the unsung heroes of the 21st century, the Punjab-born innovator Narinder Singh Kapany.

Narinder Singh Kapany's Early Life:

Born on the 31st of December 1926, to a Sikh family in Monga, Punjab, Narinder Singh Kapany is regarded as one of the seven unsung heroes of the 20th century for losing out on a Nobel prize to Charles Kuen Kao (who continued and revolutionized Kapany's work in fibre optics) and thus becoming largely unknown and unrecognised in the field of science and among fellow Indians. After he finished his schooling in Dehradun and then graduating from Agra University, Kapany served as an Indian Ordnance Factories Service (IOFS) officer for about five years. After which, he left to work on his Ph.D. at the Imperial College of Science, Technology and Medicine in London. A year after his marriage with Satinder Kaur, he received his Ph.D. degree from the University of London in optics in 1955.

How Narinder Singh Kapany pioneered the work in the field of fibre optics:

While in Imperial College, Kapany started working as a research assistant for British physicist, Harold Hopkins who was one of the researchers in the college and shared Kapany's ambition of transmitting light through flexible fibres. Using the work and research of others before him in the field of fibre optics, Kapany, with the help of Hopkins, sought out to develop a material in which light could travel through completely over long distances without getting dissipated despite the wire curving and bending. Kapany developed this material and along with Hopkins achieved transmitting a crisp image through a large bundle of fibres made of this material. Although, the achievement of transmitting images through optic fibres had been done before, the quality of the image achieved by Kapany, and Hopkins was unmatched by their predecessors. But despite their huge accomplishment, there was a big problem with their method, the light rays transmitted through the fibres were dissipating at a certain rate that, beyond nine metres of transmission the light rays would completely dissipate which was not ideal when wanting to transmit data across long distances.

Although the method used by Kapany to transmit light through fibres need adjustments, their achievement along with the development of optical cladding by the Dutch scientist, Bram van Heel gave a miraculous jump start to the field of fibres optics.

Narinder Singh Kapany's Career:

In the 1960s, Kapany coined the term "fibre optics"; wrote his first book which in turn was the first book to be written about the field of fibre optics; became the field's most prominent researcher, writer and spokesperson; and founded the company Optics Technology Inc. where he was the chairman of the board, the President, and Director of Research for twelve years, during which he focused on the processes of innovation, management of technology and technology transfer. He later became a member of the National Inventors Council, and an international fellow to several scientific societies such as, the Royal Academy of Engineering, the Optical Society of America, and the American Association for the Advancement of Science. In 1973, Kapany founded Kaptron Inc. which he sold to AMP Incorporated in 1990. After working as an AMP fellow for the next decade he went on to find K2 Optronics.

Kapany also taught and supervised research activities of postgraduate students in numerous colleges in the United States of America. At the University of California, Berkeley (UCB), and at the University of California, Santa Cruz (UCSC), he was the Regents Professor – the professor of the highest academic merit. At UCSC he founded the Centre for Innovation and Entrepreneurial Development (CIED) and served as the Director. At Stanford University, he was a visiting scholar in the physics department and the Consulting Professor in the Electrical Engineering department.

Outside his academic and entrepreneur career, Kapany published over 100 papers and four books on the topic of opto-electronics and entrepreneurship.

Narinder Singh Kapany's Pastimes:

Outside his work, Kapany was also an avid art collector, sculptor and philanthropist. Kapany mainly collected Sikh art, most of which he went on to loan to art exhibitions who would pass on the paintings to the Asian Art Museum of San Francisco. His sculptures were displayed in museums and art galleries situated in San Francisco, Chicago, Monterey, Palo Alto and Stanford. He also made generous donations to numerous art institutions around the world, mainly the ones which held his sculptures or collected art pieces.

Receiving Recognition:

Despite being deemed as one of the seven unsung heroes of the 20th century and being denied a Nobel Prize for his outstanding innovations and discovery in the field of fibre optics, Narinder Singh Kapany didn't entirely fly under the radar in terms of being recognised for his work. He received "The Excellence 2000 Award", for his contributions to the field of fibre optics, from the USA Pan-Asian American Chamber of Commerce in 1998; he was awarded the Pravasi Bharatiya Samman in 2004; four years later he received the UC Santa Cruz Foundation Fiat Lux Award; and most recently, in 2021 he was awarded the Padma Vibhushan. In the same year, he was deemed as one of the unsung heroes of the 20th century (in 1999) by Fortune magazine, he was part of

Time magazine's top ten scientists of the 20th century in their last issue for the millennia.

Passing away on December 4th, 2020, in Redwood City, California at the age of 94, the physicist and entrepreneur who did more than anybody to make fibre optics as popular and admirable as it is today, left behind more than just a large will for his children.

References from New York Times, The Indian Express, and Wikipedia

REVIEW ARTICLE DANCE, BRAIN, AND PLEASURE THIRUPURASUNDARI C J*1, YT SAMEER 2 AND B SUKESH3

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Dance, Brain, and Pleasure Chapter-1

Introduction

Shake and shake, rock, rock under the impact of rhythm, subconsciously set in our brains, a metamorphic uniqueness in humans!



Picture courtesy: Pinterest

Stepping up the mind-body coordination, dance emanates happiness, pleasure, and thereby overall well-being. Who doesn't wish to remain healthy and in shape! This rejuvenating skill helps in quick response to the brain's commands, and synchronizes reflexes, henceforth avoiding injuries in daily life.

Strike a dance pose

Dance was a devotional, recreational, apart from a sensual practice. Ages ago, in the rock (conceivably Rock and Rock-ing) era, dancers owned their tunes, their postures seized as sculptures on the stones. Each carving or sculpture illustrates a dancer itself. Dance and heritage are always intertwined.

With diverse kinds of dances, different muscles get involved and acquire flexibility. With ameliorated flexibility, body ache, backache, cramps, and muscle rigidness are kept at bay, delays aging too. The meticulous and emphatic jerks and jives strengthen and tone one's muscles. All a dancer needs could be a methodical practice to increase their strength. With a raise in pulse together with increased stamina, a dancer encounters stress by releasing neurotransmitters and alleviating exhaustion, thereby boosting endurance. Emotional health is additionally supervised, strengthening self-confidence and social interactions. Music along with the rhythmic dance moves aid in burning calories. So dance dwells as an exercise regime (aerobics, Zumba).

History of dance

Evolution shows that dance has been entwined with humans for a long time. Any movement, allows us to feel and act. So is dance, (a natural form of expression) to project our emotions, and provide aesthetic pleasure. Dancers create visual impacts (art) across the dance floor. As part of our heritage and community, specific movements were memorized and passed on as a tradition to welcome rain, celebrate a good harvest, worship, prayer service, courtship and glorify life. Dance creates a sense of togetherness. There are evidences to prove that dance has evolved as a by-product of imitative proficiency (social learning)(1). Dance in all stages of evolution has led to social cohesion(2). Tribal war and hunting dances have been integral to diverse cultures. Courtship dances, as back as 1.5 million years ago(displaying vigour and attractiveness) engaged in socially accepted physical contact between the sexes (3). Why few are better dancers than others, has evidence in evolution(4). Dance was performed as an survive. Our ancestors habituated to dancing to socialize. So early humans who were coordinated and rhythmic could have had an evolutionary advantage.

Scientific reasons to evolve as a good dancer

Research studies examined the DNA of a cluster of dancers and non-dancers and established that the dancers shared two genes crucial for being good social communicators: serotonin and vasopressin. Research reports in humans and mice revealed that dancers secrete high levels of vasopressin, which enable musical working memory and serotonin, known to uplift moods and shift you towards happiness. Scientists are uncertain why only some humans might have this innate ability to dance well. One difference could possibly be body symmetry. Evidence proves that quality dancers are more symmetrical. Many are attracted to capable, competent, attractive dancers and henceforth the reason could probably be that their bodies are more symmetrical than those of the less coordinated (5). Some dancers are dynamic and assertive while the residuum may appear soft and fluid, without rushing. Some movements are radically charged and articulative, while others could also be cool and highlight technical perfection. Music and drama work together on a similar wavelength and brings out a blissful experience for the dancer as well as the spectator (3)as per the recent trends.

Dance- a potential springboard towards success

"Practice means to perform, over and over again in the face of all obstacles, some act of vision, of faith, of desire. Practice is a means of inviting the perfection desired" – Martha Graham.

Dancers relentlessly cultivate and radiate confidence, and keep their minds on the top goal. They stay motivated and cherish smaller or larger accomplishments and new mannerisms. Keeping things within the correct perspective, enduring rejections and criticism greatly nudges a dancer to perfectly fit for their talents. Self-care, self-discipline, commitment, and being passionate are always their priority. They are self-driven, hone their skills, and escalate beyond their comfort zone.



Art By Thirupurasundari CJ Idea Courtesy: Pinterest

SCIENCE SHORE PAGE 1

Conclusion

With a multitude of benefits in dance encompassing good health, mental quotient, and happiness, practicing it on a day-to-day basis passionately, works on your self-esteem.

In the forth-coming issues, we shall traverse through the influence of dance on various aspects like coordination of nerves, hormonal regulations, curing various ailments, and holistic well-being.

So let's shake, shake, shake our belly, and Rock on!

References

- 1. Bernhard Fink & Todd K. Shackelford, Evolutionary Psychological Science, 3, pp 147–148, 2017.
- 2. Laland et al. in Current Biology, 26, R5–R9,2016. Why Did Dance Evolve? A Comment on Laland, Wilkins, and Clayton, 2016.
- 3. https://www.britannica.com
- 4. Public Library of Science's genetics journal in 2006
- 5. Live Science, Symmetrical people make better dancers. Ker Than, 2005.

CROSSWORD PUZZLE

D. RUPPESHWARI & Dr. THIRUPURASUNDARI C J

(Clue - Our Environment)

						1	Α	D	Ι					N	
						Е									
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ACROSS

- 1. Energy transmission
- 2. Naturally occurring
- 4. Argentite is a/an -----
- 6. Tundra

DOWN

- 1. Stockpile
- 2. Handling with care
- 3. Related to National and Global growth.
- 5. Includes Autotrophs, Heterotrophs and Decomposers.
- 7. Overexploitation leads to this.
- 8. Largest group, slightly different from breed

(Answers on Page 22)

SHORT STORIES & ARTICLES

KOUSA FLOWERS

HEMA RAVI

It is perennial joy to observe flowering shrubs, fruit-laden trees or the occasional leafless tree during walks. Each has a story of its own. Recently, I was pleasantly surprised to spot these four-petaled pale yellow flowers on medium-sized trees. Without wasting a moment, I got pictures of them (thanks to my partner, who always carries the camera!)

Google Lens helped to identify and gather insights about these pleasant flowers of the deciduous tree – known as 'Kousa', 'Chinese dogwood,' 'Japanese dogwood' and by several other names.

These ornamental trees are native to East Asia and are widely cultivated in the Western countries for their ornamental attraction. Known as a tree for 'all seasons,' the Kousa dogwood has raspberry-like berries that bear fruit in autumn; the fall leaves are reddish-purple.

Such beautiful flowering trees are certain to gain the attention of passersby who stare at them in wonderment, while their lips utter – Unbelievable! Awesome!

Photo Courtesy: N. Ravi





SITUATIONAL BRILLIANCE

T.S.MANOHAR

The very purpose of learning and acquiring skill sets is to apply them at appropriate situations in everyday life. Is there a second thought on that?

The other day I received a message which read, "The front benchers know the answers for every problem in the exam while the back benchers know how to face challenges and solve the problems in every walk of life". Oftentimes, the back benchers see the big picture and come out with out of the box solutions. Ruminating over it I am only compelled to endorse the statement. Also, being an avid reader of Sherlock Holmes stories, I have always admired how he unraveled the crime and nailed the culprit. He always looked beyond the obvious to get the clues and solve the mystery. "Elementary Mr. Watson" was his choice phrase to lead the reader on is observations. Two instances in my experience stand out to substantiate the above.

My uncle working with Tata Power was the chief engineer entrusted with power generation on a government contract. His team of skilled engineers and technician finished the task ahead of schedule. The Chief minister was to inaugurate the project and to provide dedicated power supply to a few hundred villages. They had done the checks and everything seemed perfect. On the D day, hours before the VIP was to arrive there was repeated tripping of power followed by a warning siren. The task force got unnerved and pressure was mounting to troubleshoot the problem. A support staff chanced to survey the area and soon enough he climbed atop a tree to cut off an overhanging branch which had caused the tripping. Needless to say he was highly appreciated for his presence of mind and there was no hiccup thereafter.

Being employed at the airport, I was a witness to the second incident. This was related to the loading of the bullet proof car of The President of India into the cargo compartment of the aircraft. A few days back it had come from Delhi and had to be shipped back. Try as they might, it was not fitting into the compartment by a few inches.

Every passing minute only accelerated the palpable pressure. Every engineer put his head on the issue, trying various angles to get it in. Telephone contact with Delhi only elicited a curt reply "We had sent it to you by the very same aircraft a few days back. Try to reload it and send it back". It was to the credit of a humble helper who went up the plane, depressurized the car tyres and brought down its height. Lo behold, the vehicle moved into the cargo hold smoothly.

Looking as it were, it is the situational brilliance and quick thinking that solves the problem. All the SOPs (standard operating procedures) don't get you the answer.

Going through the article intently, my wife darted in a question. "Were you a back bencher in your growing years"?

"Middle bencher" I replied calmly. "I have the seriousness of the front bencher and the shrewdness of the back bencher. Look, I have been facing all the challenges as they come and

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been solving the problems on the go, isn't it?

For once, she was nonplussed by the speed of my retort.

PARENTS ARE BLESSINGS

NALINI JANARDHANAN

I treasure my childhood days. I miss being a child. I was so happy and carefree those days. But the present time is all about stress, worries, tension, unhappiness, grief and disappointments. My best childhood memories make me smile even during sad moments. "Nalini, we are proud of you dear child..." The words of my parents were echoing in my mind. They always encouraged me to participate in various competitions. And they congratulated me, making me feel proud when I brought home prizes and trophies. Gradually winning became a habit of addiction for me. I became the best all-rounder student in school and colleges. I was a good student and achiever. At this age, I wish I could turn back time and live my childhood once more. In fact, we carry our childhood with us till death. I cherish those memories of nostalgia. I like to recreate those days of pure bliss and innocence. It was the most beautiful chapter of the book of my life.

A loving family is a gift or a blessing from God to us. A family laughs with you during happy times, consoles you during your dark days and cheers you up during your proud moments of success. Family is everything for us in this world of selfishness, revenge and backstabbing. We are nothing without family. A house made of bricks and stones is transformed into a sweet home, a wonderful shelter by a family. All families are different. We are not perfect people. So the family members may have differences of opinion. They may fight and even stop talking to each other. But still, in the end, the unconditional love of family unites each other like a strong bond. As the saying goes "Family is like music, some high notes, some low notes but always a beautiful song". Life is beautiful if you have a family. The value of family can only be realized by orphans on the streets with nobody to take care of them. Family is a source of kindness, love, encouragement and inspiration.

A father is a son's first hero. Boys tend to transform themselves like their fathers. For a daughter, the father is close to her heart as he considers her a princess. Girls depend on their fathers for emotional and physical security. Father creates a firm foundation for children. Being a friend, philosopher and guide, he teaches them values and etiquette. A mother has an important role in the family, taking care of the growth and development of children. As Victor Hugo said, "A mother's arms are made of tenderness and children sleep peacefully in them." Mothers protect children but fathers encourage them to take on challenges helping to build confidence in them. Mothers stress sympathy, care and help. Fathers emphasize justice, fairness and doing duty. Both father and mother are equally important for a child. Both of them have equal roles to play as two pillars supporting the family. Children feel loved, protected and ready to face the challenges of the world. Life is blessed if you have an affectionate family. So you should love your family and treasure every moment of your life making happy memories. I feel that my life is beautiful like a rainbow due to the various colors given by my family members. I am thankful to God for gifting me blessings who call me MOM. Because of you my precious kids, each day is special for me. Thank you my children for making me a Happy Mother. My love is with you always and forever. God bless you!

Children should not forget the valuable contribution of their parents in their lives. Instead of celebrating just one day as Father's Day or Mother's Day in a year and giving gifts to them or showing appreciation only on that day, children should respect and love their parents on all days of life. They should not dump their parents in old age homes or throw them out of their homes to die like orphans on the streets. Children should look after their old parents when they need care and love in the last stages of their lives. A mantra from Taittriya Upanishad says 'MatruDevo Bhava' (meaning: Honor your mother as God) and 'PitruDevo Bhava' (meaning: Honor your father as God). It is a valuable message for the present generation of children. We should respect our parents like Gods. We should thank God, the Divine Father of us all, for His blessings sent to us in the form of parents.Let us offer our salutations to the Divine Mother with her heart always full of love for her children:

'Ya Devi sarvabhooteshu Mathruroopenasamsthitha Namastasye Namastasye NamoNamaha' (Salutations to the Divine Mother who manifests in every being's existence as a mother. I worship thee over and over and over again)

¹R A A T 0 DI Ε ²M I Ν ³E R S С 0 ⁴O U Ν 5B Ν R ı G 0 0 Μ Ε ⁷E T Т Μ S Ρ Χ Т C Ε Ε Ν ı C Ν С Ε

Solution to Crossword in Page 16

SUBCONSCIOUS OBSERVATION BELIEF SYSTEM (SOBS) - UNWINDING YOUR THOUGHT (PART 3)

ORBINDU GANGA

A few seconds without a thought sounds possible but when we need to prolong it for hours or days, it is cumbrous, probably touching a cul-de-sac. Such a scenario of thoughtlessness is presumed to be away from the ordinary. To be in such a state requires the person to be in a state of absoluteness. Is it required for one to be in a state of absoluteness? Can we all achieve such a state? The answer is we can but to unwind the thoughts we need to be in a state of thoughtlessness or perhaps not really into such a state. When we think of thoughtlessness we think of a state to become conditioned to nothingness. So to unwind the thoughts, is it a prerequisite for one to be in such a state? Perhaps, one need not be thoughtless. The thought of being away from such a conditioned one can be screened to filter the required, efface them without a trace and have a state of mind existing without the ones that have been effaced.

Unwinding is part of the biological process in the form. The deoxyribonucleic acid (DNA) and ribonucleic acid (RNA) show such behaviour in their processes. If such a behaviour is being programmed within, it shouldn't be possible for our system not to replicate it. Such behaviour of unwinding the thoughts should become much easier but since the thoughts are not like DNA or RNA, it becomes cumbersome to act as we correlate the process. DNA and RNA have a process imbibed within to create such a flow for them to become cliché as we study them. It is not the same with the thoughts as the conditioned form is imbibed from the beginning, leaving the unwinding process to be incommodious to act on. The probability of unwinding is possible for a few seconds or minutes but it tends to become challenging as the duration becomes more. Most of us believe that the thought process involved in such a scenario is to occlude the thought before us so that such a thought never transpires. In such a scenario, the more you try to coarctate the more it shall be in your mind.

The unwinding of thought is a state of effacing the existing thoughts. It is never the state of absoluteness. Such a state covet only to remove conditioned ones that are absorbed for long and have the tendency to become adsorbed. The conditioned could be anything related to his/her thoughts that becomes a disturbance and have the ability to become part of the belief system. Some would have been adsorbed and would have become part of the belief system. Such conditioned are deep and removing those takes time. The choice of removing the existing is eclectic. The weeds and the probability of becoming a weed can be identified and removed. Subconscious Observation Belief System (SOBS) refine the existing conditioned by identifying them and cleaning them from the belief system.

Since the absorbed and adsorbed have different propensities, the process involved in the adsorbed takes more time than the absorbed. Adsorbed has a deeper connection with the form and belief system, the predisposition of her arrival is uncertain and brings many memories that have touched many layers. Absorbed tend to keep a low profile and ricochet at will, never to make a bigger impact. The stay of the conditioned depends on how much the adsorbed adds the subsets. The more the subsets are added, the more the deeper layers are touched. SOBS identify the selected conditioned to be effaced from the belief system without disquieting the other existing. The selected one can be absorbed or adsorbed contingent on the choice of the form. When the choice to unwind is given to the forms, they often tend to mistake the absorbed and the adsorbed. Since the occurrence of the absorbed is frequent though the stay is minimal, the choice is more inclined towards them. The patience to understand the severity is less seen in the form since the dependency on the frequency is given more precedence. Understanding the severity to be given more priority than the occurrence is being counselled. The analysis and the identification of the one having the high severity are being made understood to the form before acting on the process to effaced the selected conditioned. The unwinding of thoughts shall keep the weeds away from the belief system without a trace.

Understanding the severity of the conditioned self becomes more significant than unwinding the thought. It becomes much of a smoothened process when the right selection of the weeds is done so that the unwinding of the thoughts has the desired outcome. SOBS ensure that the correct selection is done to the form and the belief system is cleansed in the process where there is clarity of thoughts after the weeds are removed. It is to be noted that the existence of the weeds is known and their severity is much more realised after the process. The possibility of the weeds becoming part of the belief system after unwinding the thoughts is much lesser than it would have been without the process, making the conditioned become zilch.

PRANCING AROUND IN PUNE... K V PRASAD VADLAMANI

The moment I landed in Pune, The city of the Peshwas, I was overwhelmed with emotions. This is a city steeped in history and cultural heritage. It's the land on which Sivaji Maharaj, Bal Gangadhar Tilak, Mahatma Gandhi, Gopal Krishna Gokhale, and Phule to name a few strode like colossi.

I joined the ranks of Mahatma Gandhi by being a state guest here. He was imprisoned in Yerawada jail and I was put up in INDIA PRIDE Hotel by the state.

Pune airport, though small, is chic and quite contemporary. As in most parts of India it's carved out of Cantonment. As you come out of the airport you can't miss the Symbiosis Law and Management college. Of late Symbiosis has become synonymous with Pune.

The road leading to my hotel was wide and traffic was sparse. I was amazed to see the Bus Rapid Transit in place (a separate carriage way is reserved for public transport in the middle of a 6-lane road) but only part of the total route is completed till now. Because of this I didn't see the public transport buses caught in traffic snarls as is the case in our Hyderabad. I feel this BRT should be implemented in all our cities to encourage more and more people to use public transport, it'll ease the congestion on our roads which in turn can reduce pollution and can save a lot of fuel.

Earlier Pune was an agricultural settlement known as Punnaka. This city is situated on the confluence of two rivers Mula and Muta, both of which have water only during heavy monsoon nowadays, this confluence was called as Punya. Later on it became Pune. At one time Pune was the "Monsoon Capital" of the Bombay Presidency as Mumbai used to be and still is under water during monsoon.

It's known as the 'Oxford of the East' due to a large number of educational institutes here, our fixation with anything Western is never ending.

Industrial development started here around 60s, many companies like Telco (now Tata Motors) started operations here. The six-lane Mumbai-Pune expressway which was completed in 2001, ushered in rapid urbanisation. Later on Pune saw huge development in the IT sector, and IT Parks formed all over the city.

Pune is the cultural capital of Maharashtra. It epitomizes the Marathi culture, which lays emphasis on education, arts, crafts, music, theatre, etc. It's culture reflects a blend of traditional with modernity. On one hand, you have theatre, classical shows and on the other the city boasts of an amazing nightlife. With several software companies and professional institutions in Pune, the city truly has a cosmopolitan culture.

During breakfast I searched for Traditional Maharashtrian dishes and was delighted to spot Batata vada, Poha, and Sabudana khichdi, When all these were available Can Vada Pav be far behind ...I found it lurking around a corner. The idlis here tasted different, dosas looked like a pale copy of our preparation. I found a jar labelled as Detox water along with other fruit juices in the breakfast spread.

The water had basil leaves, pomegranate seeds in it with a pleasant taste.

Pune's Sassoon General was a 155 year-old hospital well respected in the city. This is where Mahatma Gandhi had an emergency appendectomy on 12 January 1924. It's said that a generous donation from David Sassoon a businessman and philanthropist made the construction of this hospital possible. Hence the name. He's a Jew, who created and dominated the import-export trade in India then. The old two-storeyed structure still stands with dignity and a few departments are still housed in it. The operation theatre where Mahatma Gandhi was operated on is the most visited place there. A large masonry clock tower stands tall rising to 120 feet, it housed the water cistern used by the hospital then. Sasoon hospital has a modern block with 11 floors and is like a star hotel with huge airy corridors, wide rooms with spotless walls, sprinklers and all. It has taken over a decade to be constructed and was put to use when Pune faced an onslaught of COVID cases last year. Really a blessing in disguise for the people of this city. Now it's a Confluence of old and new, brick and mortar with glass and chrome, best of both the worlds.

It's the first government hospital in the state to have a separate ward for "third gender". On the another hand the earlier superintendent of this hospital and member of the regional authorisation committee for organ transplant Dr Taware was suspended for his role in the recent "Kidney Racket" in the city.

Pune is dotted with several Ganesh temples. The most famous of them is the Shreemant Dagdusheth Halwai Ganpati. The temple was consecrated in 1893, and was built by Dagadusheth Gadve who was a Sweet maker. As his halwa became popular he gained name as a Halwai (meaning sweet maker in Marathi), and it became his surname. The legend has it that he was advised by his Guru to construct this temple to overcome the grief after his son's death.

Lokmanya Tilak was a close friend of Dagadusheth Halwai. It was right at this temple the idea of celebrating public Ganesh festival dawned on Tilak. It proved to be an epoch making event in Indian history. During the British Raj, Tilak gave a public forum to the Ganesh festival celebrations as a way of getting around a Government order that barred public meetings.

This temple steeped in rich history is a beautiful one with a simple design. Through strategically located glass all the proceedings in the temple before the Ganesh idol can be seen from outside. You can see huge crowds here all through the day. The huge Ganesh idol measures 2.2 metres tall and is adorned with around 40 kilos of gold. It's said that the main Ganesh idol is insured for a sum of ₹10 million. The temple receives donations from devotees, all those donations are well accounted for and taken care by Shrimant Dagdusheth Ganpati Trust which looks after the maintenance of the temple.

The trust is one of the richest in Maharashtra and is engaged in various charitable activities. They prepare food and distribute it free to all the patients of Sasoon hospital and their attendants daily. Really a great service indeed. In 2003 they built an old age home and also run health care centers for the poor particularly in the tribal belt.

Dagadusheth Halwai's old Halwai shop is still operating under the name Kaka Halwai in Pune. The present owner Mr Youvraj was a seventh generation descendant of the original guy. He was very happy to show me around his shop and he was thrilled when I bought their speciality sweets to take home as souvenirs.

I was surprised to see a fort bang in the middle of Pune, The Shaniwarwada Fort. It is known for its historical significance and association with the renowned Bajirao Peshwa. It was once the pride of the Maratha Empire. It's so named as the ceremonial foundation of the Fort, started on 30 January 1730 which was a Saturday.

If you have some ghost busting goals in mind, visiting Shaniwar Wada feels like a must as it is believed to be haunted and locals advise you to avoid visiting it after sunset. Narayan Rao an young Prince was killed by his uncle and aunt, a story of greed for power and betrayal. And locals believe that it's populated with the wandering spirits of people who lost their lives in the fire that engulfed the fort long back and avoid being there after nightfall or on full moon nights. It's rumoured that shrieks and strange sounds emanate from the fort once in a while. Though I wanted to take up the challenge of spending the night there as I've a reputation of making people run away from me, the authorities refused. They contended that those beings haunting the fort may disappear if I make an appearance there, thereby robbing the place of its prominence. So much for their chivalry...

At the entrance there's a huge statue of Bajirao Peshwa. As with most of our heritage sites parts of the fort are in ruins due to the negligence of authorities.

Saras Baug is like Public gardens of Hyderabad. It was initially a lake at the foothills, as the water of the lake dried up, the exposed land was developed into a park and was named Saras Baug. It spans over an area of 25 acres and also has a Ganesh temple in the centre on a hillock. Because it was built in the middle of a lake, it is also called Talyatla Ganpati. The Baug and the temple also have some historical significance as they were built during the time of the Peshwa as most of the temples and other monuments around here.

The lush green lawns are well-maintained and benches which were strategically placed were full of people of all ages. People can also walk around the entire park through well-paved pathways. The surroundings were very clean. It has a little pond with plenty of lotus flowers of different colours. It had a very relaxed ambience and I went round it savouring the sights. It appeared to be a very popular lung space in the middle of this bustling city.

On the way to the airport I had a brief dekho at Kirkee war cemetery which was created to receive Second World War graves from the western and central parts of India where their permanent maintenance could not be assured. The cemetery contains 1,668 Commonwealth burials of the Second World War and also few from the First World War. At last a final resting place for these warriors.

PRAYERS GO UP AND BLESSINGS COME DOWN SETALURI PADMAVATHI

We all live in the hope that we'll remain safe and comfortable as we approach the age when dependence on others can become inevitable.

I stayed on an island where medical facilities were limited. If someone becomes defectively sick, he/she had to go to a nearby island for better treatment. Due to this, all islanders try to protect themselves with precautions and a good diet. I met many teachers from different nations and enjoyed working with them, though I had to face a few difficulties with unkind, selfish, and irresponsible humans. I used to ask myself – "Do people dodge their duties and run away from helping others?" I realized that some people miss their homely atmosphere, love from relatives, and comfort though they're very rich, in a place where I work to ease my life financially.

One fine day, while I was getting ready for school, I heard the news of a very old teacher who was sick and admitted to the hospital and was in a serious condition. He suffered from Blood Pressure, Diabetes, and sudden body pains at his workstation for a long time. He came to my workplace, as he did not get proper medical amenities, better service in the hospital, and treatment. He was resting in the bed and looking pale. I approached and asked him, "How are you, Sir? Are you hungry? What do you like to eat at the moment?" He was extremely happy to see me as I am from his native place and was speaking the same language which he speaks. He really enthralled to see me and appreciated my kindness. As I understood his feelings, I immediately provided him with some delicious food and a cup of tea.

He realized that someone would help him in his sickness, though it is a new place where many strangers survive around him. He told his companion with extreme happiness that I was from his place and talked the same language. In fact, we love our mother tongue and may have a special love for the people who are from our native. It's my personal assumption or feeling. Finally, I could assist him and spend an hour with him, enquiring about his difficulties, diseases, and treatment procedures. He felt that he was in a comfortable place amidst efficient doctors and good medical facilities. It gave him a nice feeling.

Thereafter, the old man thanked me for my generosity and friendly talk to him at that moment. He said, "How difficult to get warmth and a friendly person in an unknown place, and when I suffer from health issues?" Finally, I could see him smiling with ease. He blessed me, "May the almighty give you happiness and health always." I was happy to get his blessings. After the treatment, the doctors advised him to rest at his residence for a few months, until he becomes alright. He was sent to his place by the school authorities. In the end, I knew his name, residential address, and phone number and assured him that I would visit him one day.

During the annual vacation, I tried to find out his address and speak to his daughter-in-law. She explained that he expired within a month after reaching home, though he was under medication. I felt very sad as I couldn't visit him for the second time. I recalled his blessings and affection. Many people say that blessings may work on us and give us a pleasant feeling. "Those blessings are sweetest that are won with prayer and worn with thanks."

POETRY



MAJESTIC ALTRUIST BHAGYASHREE MISHRA

Between then and now
Reposes the bridge, benign and beautiful
Millions of molten memories
Cocooned within its mighty deck Of how the city transformed over years
Of times, when breath was a freebie
And beings walked around, without an iota of fear
Of days, when generosity charged no fare
And true beauty was more than mere glare

Adjoining distant portions
Stands firm, the bridge, glorious and golden
Locks of love clinging to the fences
Exemplify endearment as an elixir of life
Narrate tales of togetherness and persistence
Of those who never gave up on each other
While the tides rose high, winds gushed in
Rather persevered for the storm to pass
To construct their castles yet again

Unifying two distinct worlds
Resides an omniscient bridge, firm and fearless
Witnessing white lies and shadowed truths
Of the impecunious and affluent ones
The silent spectator has seen it all Nostalgia embracing their hearts and souls
The agonies, joys, scars and smiles
Bruised a thousand times, yet the majestic altruist
Strives each day to diminish worldly disparities.



WAR JAYALAKSHMI

War, the barbaric mishap that teardown existence

Woeful tragedy stagnate continents.

Life is for preservation, never for devastation.

Love and compassion innate human passion.

Blessed with vigour and wisdom we the saviours of this globe.

Sentient we, committed to guard and guide.

War, the blind persecution, butchery and bloodshed.

Who we to take the lives of our co-beings

Ruthlessly bomb and blast our green earth?

To live and let live in freedom our birthright

Why to sacrifice life for greed and ego of ruthless rulers?

Focus brainy techniques to perish our siblings?

Spread universal brotherhood against war and rivalry.

For mother earth is a gift of almighty.

For lives to share in love and peace eternally.



THE JOURNEY JELLIE N.WYCKELSMA

Life is a circle
A journey's end flows into
The beginning of the next
Not knowing when and where
The journey will truly end as it circles on
Of our concern it is totally unaware.

When we are young,
Life looks without any ending
Exciting, exhilarating
While we continue to
Climb mountains' highest peaks
Swim in the deepest seas
Without fear we do

Years rush on and on
We wonder if we could be
On a journey that never ends
Because when the circle of our life will break
We still are unable to predict or see ...



THE BEACH PHOTOGRAPHER JELLIE N.WYCKELSMA

Her eyes see the beauty of each Single pebble on the pristine beach The restless waves landing ashore The dunes with grasses, slender to the core

The pier that stretches far into the sea
A lonely fisherman with rod and reel
The pier the only place for him to be.
A lonesome seagull resting on a post
The rising sun, giver of eternal light
Disappearing from her view again at night

A trail of footprints in damp sand Where did it start, where will it end ...

A moving multi-coloured array
Of woolly clouds above
Through her eyes the camera must obey
Click and record
The beauty she discovers every day.



BE HAPPY

KAMAR SULTANA SHEIK

Be Happy. She always said...

Whenever I had a long face:

"Think of those less fortunate than you..

At least you have food to eat..!"

And as if symbolically emphasizing

A sweet or a tidbit of something I love to eat

Would be left on my study table

In an oval tray that read, "Be Happy".

Sometimes, a fortunate guest

Would get served on that tray too,

Especially if they came to lament

About something unfortunate in their lives..

This was her way of consolation

Her two pence worth of effort at cheering the world

And today I wouldn't exchange it

For a million rupees...

The tray stays at my bedside,

With my water jug on it every night,

So if I need to drink of her medicine,

It is right there...

And every morning before I greet the sun,

The sun's rays shine eversilver,

"Be Happy", they say.

There she is beside me

Every day and every night

In a way I never thought she would be!.

Be Happy!



ROCK MEMENTO

LATHA PREM SAKHYA

My childhood haunt,
With my siblings I trekked
The vast expanse of cultivated land
Careful we did not step on the tiny heaps
On which the tapioca stems were planted recently.
We would make a beeline for the rock
Our Mount Everest, we climbed it arduously
Sat on its peak triumphantly,
Like great mountain climbers.

All five of us siblings atop,
In our midst the toddler
So he wouldn't fall.
We would then take out the berries
And fruits we collected on the way
Munching contently we watched
The azure clouds at play
Chased by the wind,
Playing hide and seek.

A memory sweet, tucked away Surfaces now when I look at the rock. My wall and sentinel, protecting The southern side of my cottage Keeping the wilderness away. Even now our star attraction. My children and grandchildren Scramble up and sit atop, The same triumphant look Glinting in their eyes Making me glad My choice to let it be Screaming to stop the bulldozer When its huge bucket hand Stretched towards it ... When the land was straightened Letting it stand tall and straight, My proud possession, A relic of the past I inherited, a memento Of my childhood.



I AM EVERYTHING THAT DARKNESS COULD NOT KILL LEENA THAMPI

Reflections subtle, sweet nothings,

Left me feel like a queen who has lost her kingdom,

I am not a pawn in a game controlled by others.

I want to tread alone, whether over the grass or thorns.

Not everyone will have the capacity to appreciate others.

The most beautiful work of art in this world is ignored,

The sweetest and rarest of delicacies will never be cherished.

Every true word spoken or written is misinterpreted, not inscribed.

Restless eyes, the need to feed blether,

Missing the pleasure to watch me bleed.

Does the ache reverberate?

Nope, now it hardly penetrate.

Cause I am like that deep emotionless sea, which nobody would dare to dive.

And this spark called ME continues to burn the yesterdays,

Sans debris I move forward fresh with vigour, passion and innocence.

Once like a cloud I floated aimlessly, just to rain, evaporate and rise again.



MARGHERITA PIZZA MIHIRA AMARA

Cheese
Dough
Basil leaves
Fresh red tomatoes
Five hundred fifty Fahrenheit
Fifteen minute bake
For pizza
To fill
Up
Kids



CAFE AMORE

Food
Love
Cafe
Sweet pastries
Lovers meet at morn'
Infatuated with coffee



HUSTLE BUSTLE OF SCHOOL LIFE K.MONIKA

The deafening noise of alarm makes up a daily routine

And arousing up early makes up a absurd scene.

Prepping to go to school on time

As the school bell strictly chime on time

Going with an untied shoelace

And with a dishevelled face.

Going with a half filled tummy

And with a bag full of books which is extremely crummy.

Finally leaving the place with an improper hairstyle

And face full of fake smiles.

And the bell rings, rushing to reach the classroom

To sort away all the gloom.

Getting the blessings from the god

With our friend's squad.

The English teacher starts the class with a noun

While Tamil teacher with a homework leaves out with a frown.

The Maths teacher comes up with add and subtract

And with Science teacher reiterating all scientific fact.

The Social teacher comes in with a lesson in history

While Physics teacher with her derivation putting us all in a mystery.

With all chatterbox and jukebox

The class gets over with loads of fun

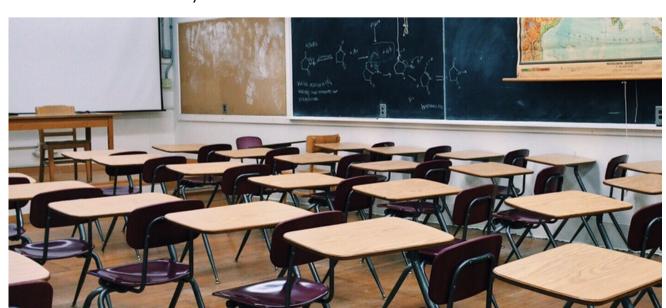
School days, the halcyon days of our life

Where every child's wings fly

Above the glinting sky.

Days may pass and turn into years

But School life memories every time make us to fall into tears.



LIFE **NEHA S CHAKRAVARTHI**

Life is predictably unfortunate.

To do as it bade is wise.

It might as well foster filth;

Be insolent to human beliefs;

Foul play through roughs 'nd toughs;

Entice innocence to rot;

Engage in gamble

With unfurling trust and betrayal;

Or even, be lost from sight into thin air.

But.

Life is a fair game of billiards-Wherein you can invite upon yourself Antonyms of its dark hues. May love be acknowledged;

May there be calm post storms;

May smiles heal wounded hearts;

May there be happy endings

To forsaken paths;

May there not be a mayhem

In the floret called life.



HOVERCRAFT RAJANI MULA

Honour is harvested by being Halloween of humility Humbleness is hovering over the hallucinations of need of the hour Hate speech's hustle bustle is humiliating humaneness

Heavenly hope is hanging itself horribly Horrific humans are heading headquarters of humanity How can we have heavenly hours of homeliness?

How can we have hearty homes of happiness?
How can we hum hymns of health and wealth?
He who hampers harmony is hiding behind the house of hush!



SELF- KNOWLEDGE ROOPA SUBRAMANI

Who am I?, this fundamental question

plaguing the mind in an incessant unconscious obsession

with suffering fuelling this painful sublimation

only for Grace to extend it's helping hand with a perfectly good intention

under the auspices of a Higher Self witnessing this powerful transformation

for Self-Knowledge is the ultimate graduation

from duality to oneness that is one's own inherent possession

abiding in the heart of all things in silent observation

in a blissful absorption!

waiting to grace it's victim with the highest realization



PAIN BEHIND A SMILE SETALURI PADMAVATHI

Tara, a toddler lives in a luxurious cage that always raises her uncontrollable rage She stares at folks with a request for constant help to do the best!

Her immovable feet shake in the bed
The irresponsive brain doesn't move ahead;
Her soul feels the feel, unopposed
but the body remains calm and composed!

Her lips and tongue speedily move Her brain gives no order to prove; Her beautiful eyes speak with no comma, The listener identifies her pain and trauma!

Tara smiles elegantly with bliss
Her expression, no one can miss;
She hides pain behind her smile
while travelling each and every mile!
I love her fun when she's in a swing
that moves up and down with a string;
Her smile enhances her facial beauty
but an inability avoids her real duty!

TECHNO SAPIENS

THIRUPURASUNDARI C J (DAZZLE)

A glimpse, Our gadgets, a blessing for sure, A world without technology, Ah! Beyond our wildest dreams, Expedite competitive world, it organizes our life, Enhances our quality time with our dear ones.

At right time, with the correct temperature, the proper food kept, Allows nothing to spoil, preserves my snacks, Oh! Visualizes every bake I make-the huge cold box.

I whisk and bake to my heart's desire, With joy spreading cream between the cake layers, As the microwave door opens, Oh! The aroma, any soul to dislike?

Press the right button, Mixing, grinding, pureeing, mincing, Anything just right before you, Wow! In awe of the mixer grinder.

Smart watches surveil our calories, Air conditioners ensure better sleep. Rooms with no traces of dirt. Our vacuum cleaners do assist. An unlimited assemblage of appliances, Oh! Many are in dire need.

Bidding bye to back pain, No more special stone troughs, no scrubbing daily, Not to worry if laundry accumulates, Oh! Our washing machine takes care.

Sit back, relax, enjoy and cherish, Music at our beck and call. MP3 Players, i Pods, Bluetooth does it all



Business, banking, bill payments, Movie watch, home tutoring, All in a single click, Save and retrieve gazillions of resources, No stockpile of manual documentation, Leaves no clutter on desks, Magical is it not!

Sweet aren't they, Several we emotionally connect to, Am I melodramatic! Hope not, These incredible devices, Our integral component indeed, Dwindles the tension in muscles and nerves, Mitigates the stress in minds, Many confront the problems of mankind.

Cookery, economy, lifestyle, disease, Astronomical, meteorological, astrological prophecies, whatnot! Oh! They have impacted our lives, Technology, yes technology, Tech clearing every test, Shapes our society, modulates our thoughts, Leaves a stamp, But hold on!

Meticulously plan, monitor your budget Save your space, respect tech ethics, Keep abreast of its environment amicability, Not to hoard, let it not devastate our health and mind, Be mindful and get connected for real.



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