INIR N F C U S Enriching the innerself

August 2025 MNR's IN-HOUSE MAGAZINE



The visit of Mr. Gareth Wynn Owen, British Deputy High Commissioner to Andhra Pradesh and Telangana to MNRU was a milestone in strengthening international academic collaboration. His interaction with the leadership team of MNR University, Prof. Krishna Chalam (Vice-Chancellor), Prof. T.V. Satyanarayana (Registrar), Dr. R. Kiran (Dean, Engineering & Technology), Dr. K. Venkata Ramana (Dean, Medical & Allied Health Sciences) and other members emphasized opportunities for joint research, knowledge exchange, and student development through initiatives such as the UK's Healthcare Bootcamps.



MNR University hosted an academic delegation from St. Francis College, USA on July 8, 2025, to strengthen global academic collaboration and innovation. An MoU was signed, paving the way for long-term strategic engagement to nurture globally competent & industry-ready graduates. Dr. Gale Gibson Gayle, Ed.D., Vice-President of Academic Affairs for Graduate Education, Graduate Academic Dean, Accreditation Liaison Officer (ALO), Mr. Courtney Inniss, Assistant Vice-President, Graduate, Online and Professional Studies and International Admissions, Principal Designated School Official (PDSO), Responsible Officer (RO), Dr. John Edwards, Vice-President of Academic Affairs for Undergraduate Education & Programs and Academic Dean of Undergraduate Education & Ms. Nakesha Davis, Graduate Academic Advisor / Designated School Officer (DSO) and representatives of MNR University were present.



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INFOCUS

MNR's In-House Magazine

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Events @ MNR Higher Education and Research Academy (MNR-HERA) Campus, Sangareddy, Telangana.

ACTIVITIES @ MNR Dental College & Hospital

MNR Dental College and Hospital organized a Free Dental Camp at Kasturba Gandhi Balikala Vidyalaya, providing dental check-ups, oral health awareness and guidance on preventive care to the students





On the occasion of National Doctors' Day, the pre-primary students of MNR School of Excellence, Sangareddy, expressed their gratitude to doctors through engaging activities, songs, and creative presentations, celebrating their invaluable service to society

Dr. Ravindra S.V., Principal of MNR Dental College & Hospital, attended the prestigious D20 International Workshop on Advancing Oral Healthcare







When we think of what learning is, we may come to know that it is something we all do from the moment everyone takes shape in the mother's womb till the end of the life. (i.e., from womb to tomb) But, this learning is more intensively done by students when they are in a school or a college. Students assume that, because they have read the prescribed texts and memorized some facts, they have learned something. Even parents assume that, because their wards are regularly attending the educational institutions and making steady progress, the learners are learning as expected. Teachers also assume that, because they are 'teaching', students are learning. What do we expect the learners to learn in schools and colleges? 'Is the sophisticated Learning properly done by the students or not,' is a million-dollar question.

Recent studies in understanding human brain and learning have significant implications with regard to what the teachers have to teach and how students have to learn. Strictly speaking, the results of the research studies reveal that the current instructional practices are not at all fruitful and that many students are not learning anything properly. That is the reason why only the gifted students are going up the career ladder while the majority are in frustration.

New aspects of learning

These days parents as well as students focus MNR Infocus-1

on grades rather than learning. Research studies indicate that students fail to recognize the value of what they are learning and the teachers rely mainly on lectures for transmitting information. But strictly speaking, the prime job of the teachers as well as the main theme of any curriculum is 'how to learn'. If we wish to shape our students to become fittest citizens in future, we have to promote new kinds of learning that include developing skills in communication, team work and life long learning. Hence, the focus of education is now shifting from 'teaching' to 'learning' and the role of the teachers is shifting to 'facilitating' the acquisition of knowledge from 'transmitting' the same. The goal of education is also shifting from the emphasis on comprehensive coverage of subject matter to helping students develop their own intellectual tools and learning strategies. More importantly now students have to acquire the skill to learn on one's own. This single skill will empower the students for life time and the learners shall be made to acquire this skill when they are studying in schools and colleges and later in life, they won't look for guidance of anybody else.

Intentional Learners

Coming to student learning needs of 21st century and to prepare students for meeting the emerging challenges in day-to-day life and in the work place in the present-day interconnected world, we have to lay

emphasis on educating students to be 'Intentional Learners' who are self directed and purposeful. The self-directed learners are highly motivated, independent and strive towards self-direction and autonomy. They diagnose the learning needs, formulate learning goals, identify resources of learning, select learning strategies and evaluate learning outcomes.

In this regard, students should learn to

- Effectively communicate orally and in writing.
- Understand and employ quantitative and qualitative analysis to solve problems.
- Interpret and evaluate information from a variety of sources.
- Understand and work within complex systems and with diverse groups.
- Transform information into knowledge and knowledge into judgment and action.
- Consider learning is a lifelong commitment.

Kinds of Thinking and Learning

As per Bloom's Taxonomy of learning, the three learning domains identified are

- 1. Cognitive Domain
- 2. Affective Domain
- 3. Psychomotor Domain.

Bloom divided the Cognitive Domain into Six levels namely

- 1. Identifying and acquisition of Facts Knowledge.
- 2. Understanding the Facts comprehension
- 3. Applying the knowledge in new situations application
- 4. Organizing the knowledge analyzing
- 5. Creating new ideas on the basis of knowledge synthesis
- 6. Assessing the relative merits and validity of information or ideas evaluation.

With regard to the Affective Domain of learning the key idea is receiving information. More importantly, the learners respond to what they learn, they value it and organize it

and eventually use it to guide their life. The important part of this process is developing good attitudes towards learning and what the learners learn. Here motivation and values are also very important.

Although the affective domain of learning is very essential for learning, most teachers pay little attention to it. They are just satisfied with their focus on the Cognitive aspects of the teaching and learning. In real sense, the most important consideration of the Affective domain occurs when the learner assesses learner's own learning.

Apart from the Cognitive and Affective Domains of learning, the Psychomotor Domain of learning includes physical movement, coordination of heart, head and hand and developing motor skills and sensory skills. The Psychomotor Domain of learning is completely neglected by teachers in schools and colleges.

Significant learning

The Significant learning is the kind of learning that emphasizes that learning involves changes in the learners. It is characterized by the kind of lasting change that is important in terms of the learner's life. The significant learning includes the three new kinds of thinking - critical thinking, creative thinking and practical thinking. The critical thinking refers to the process of analyzing and evaluating, whereas creative thinking is the process of creating new ideas, designs, products or forms of expression. The practical thinking helps to answer questions, solving problems, or making decisions. In significant learning, the real intellectual power comes from integration of knowledge with other aspects of life, understand the implications of knowledge for self and others, care about learning and learn how to learn.

Surface Learning and Deep Learning

Surface learning is the kind of learning where learner's goal is to memorize the facts and information for assessment purpose.

Deep learning is the kind of learning where learners have an intention to understand. They engage in vigorous interaction with content, relate new ideas to old ones, relate concepts to everyday life experience relate evidence to conclusions and examine the logic of arguments. While doing this, the learners construct their own knowledge.

Learning and the brain

Human brain has a fundamental need to solve problems and understand its surroundings. Humans are born with a desire to learn. This learning is not limited to children and adolescents. It is a life long occupation Research. Studies reveal that human brain initially has an extensive mental network, but only those parts that are used are retained. Since the human brain is a dynamic organ, learning in individual and social contexts alone results in new patterns of the physical structure and improved functioning of the brain. Research studies indicate that the brain does not simply record information as it arrives. Instead, the brain reorganizes information for more efficient recall and later use.

Within the brain, knowledge is organized and structured in networks of related concepts. New knowledge is built upon a framework of existing knowledge. That means, learning involves building mental models consisting of new and existing information. The richer the links between the new and existing information, the deeper the knowledge and the more readily it can be retrieved and applied in new situations. If existing knowledge serves as a foundation for new learning, it is also essential that existing misconceptions, preconceptions and naïve conceptions are acknowledged and corrected during the learning process.

Critical Thinking

Sound reasoning is paid special attention in critical thinking. This tradition of critical thinking goes back to the time of Socrates who established the importance of evidence, questioning, and analysis utilizing 'Socratic Questioning'. Since then, many others have contributed to the development of tools for critical thought. Many scientists also have applied the tools of critical thinking to develop new models. The methods of critical thought are by no means limited to thinking in science, but have also been applied in virtually all disciplines. They involve both

cognitive and affective components. Mainly critical thinking is the intellectually disciplines process of actively and skillfully conceptualizing, applying, analyzing, synthesizing and evaluating information gathered from or generated by observation, experience, reflection, reasoning or communication.

Learning Experience and the learner

When a learning experience has a profound effect on the learner, it will result in a greater sense of caring for the subject, for themselves, others and learning in general. It can also lead to new interests, energy for learning and change in values. Finally, it also results in learning how to learn and how to be a self-learner. This certainly enables the learners to continue learning with greater effectiveness in the wake of explosion of Knowledge and Technology.

So, learners may be encouraged and guided properly by the teachers and parents to make independent study of the subject (content) with all reasoning and analysis and have their own synopsis Question Bank with answers which can very easily be memorized and registered in their brains. The things, thus, registered in the brain will not easily be forgotten by the learners, although 'forgetfulness is quite human'

All the above factors might have been felt, perhaps, by the teachers of olden days, though not in the same order, when they asked their students to prepare their own notes (synopsis) on what had been discussed in the class and when they asked the learners come prepared to the class so as to actively participate in the interaction / discussion. Teachers in those days used to say that a holiday is only to the institution but not for the learner and his learning activity. On any holiday(s) learners were asked to ruminate revise leisurely what all they had previously learnt and to have a preview of what would be going to be discussed next. This kind of guidance used to make learners go with their non-stop learning activity so as to enable them to become independent learners developing all the techniques of self-learning which might have shaped them as life long learners to make their mighty contribution for the development of the society, leaving behind their foot prints for the next generations.



In today's fast-paced world, metabolic disorders are becoming alarmingly common. Conditions like obesity, type 2 diabetes, metabolic syndrome, and non-alcoholic fatty liver disease (NAFLD) are affecting millions globally. These disorders are not just standalone issues — they are often interlinked, paving the way for severe complications like cardiovascular disease, kidney failure, and even certain cancers.

Why Are Metabolic Disorders on the Rise?

Sedentary lifestyles with minimal physical activity, highly processed diets rich in sugars and unhealthy fats, Chronic stress, Environmental toxins, and Genetic predisposition.

Modern nutrition science and traditional Ayurvedic practices are stepping up to offer solutions, sometimes separately, sometimes hand-in-hand, to prevent and manage these disorders effectively.

Ayurvedic Drinks: Ancient Elixirs for Modern Problems

Ayurveda, the traditional Indian system of medicine, views metabolism (Agni) as the cornerstone of good health. When Agni is imbalanced, it leads to the buildup of "Ama" (toxins), which can manifest as various metabolic disorders.

Popular Ayurvedic Drinks for Metabolic Health:

- 1. Triphala Tea: A combination of three fruits Amalaki, Bibhitakiand Haritaki. Triphala supports digestion, detoxification, and metabolic balance.
- 2. Methi (Fenugreek) Water: Soak overnight; fenugreek seeds in water help regulate blood sugar and improve lipid profiles.
- 3. Guduchi (Giloy) Juice: Known for its anti-inflammatory and immunomodulatory effects, it helps manage insulin resistance and oxidative stress.
- 4. Turmeric Milk (Golden Milk): Curcumin, the active compound in turmeric, has anti-inflammatory and anti-diabetic properties.
- 5. Cinnamon Water: Helps reduce fasting blood glucose and improves insulin sensitivity.

These drinks, rich in natural antioxidants, fibers, and phytonutrients, assist in detoxification, balance gut flora, modulate the immune system, and correct metabolic disturbances.

Modern Nutrition Methods: Science-Backed Strategies

Contemporary nutritional science emphasizes personalized nutrition and evidence-based dietary interventions for metabolic health.

Key strategies include:

- Low Glycemic Index Diets: Focusing on foods that do not spike blood sugar levels rapidly (like oats, legumes, and non-starchy vegetables).
- Mediterranean Diet: Rich in fruits, vegetables, whole grains, olive oil, and lean proteins, shown to reduce the risk of metabolic syndrome.
- Intermittent Fasting: Structured fasting periods that improve insulin sensitivity and promote fat metabolism.
- High-Fiber, Plant-Based Diets: Soluble fiber in oats, flaxseeds, and chia seeds improves gut health and lowers cholesterol.
- Probiotic and Prebiotic Foods: Maintaining

gut microbiota balance is critical in metabolic processes.

• Functional Foods and Supplements: Nutraceuticals like omega-3 fatty acids, chromium, magnesium, and berberine have positively affected metabolic parameters.

Combining Ayurveda and Modern Nutrition: A Synergistic Approach

- The future of metabolic health management may lie in integrating the wisdom of Ayurveda with the precision of modern nutritional science. Here's how:
- Preventive Care: Ayurvedic drinks can be included in daily routines for their preventive and adaptive benefits, supporting digestion and detoxification.
- Complementary Support: Ayurvedic interventions like herbal teas can complement evidence-based diets, enhancing their effects.
- Holistic Personalization: Ayurveda's emphasis on individual constitution (Prakriti) can inform personalized nutrition plans, making interventions more effective.
- Mind-Body Harmony: Stress management techniques from Ayurveda (like meditation and pranayama) paired with balanced diets can tackle metabolic disorders at their roots.

Statistical Analysis: Rise of Metabolic Disorders in Indian Population (Past Decade)

Disorder	Men (%)	Women (%)	Adolescents (10-19 yrs) (%)	Children (5-9 yrs) (%)	Change Over 10 Years
Obesity	12% → 21%	18% → 28%	6% → 12%	3% → 6%	Nearly doubled across all groups
Type 2 Diabetes	10% → 17%	8% → 14%	2% → 6%	<1% → 2%	Adolescents saw 3x rise
NAFLD	15% → 23%	12% → 19%	5% → 9%	2% → 4%	Linked to child obesity
Metabolic Syn- drome	22% → 32%	20% → 30%	4 % → 10 %	2% → 5%	Urban rise sharper
PCOD	-	8% → 22%	5% → 18%	-	Tripled
Hypothyroidism	7% → 12%	10% → 21%	2% → 5%	<1% → 2%	Doubled, especially among women

Sources: National Family Health Survey (NFHS-5, 2021), Indian Journal of Endocrinology and Metabolism, ICMR-INDIAB study, WHO 2023 Child Obesity Update.

Note: Urban India shows higher rates (1.5–2x) than rural areas due to westernized diets and sedentary lifestyles.

Why Are These Disorders Increasing?

- Nutrition transition: High shift toward calorie-dense, nutrient-poor foods.
- Environmental endocrine disruptors: Plastics and pesticides interfere with hormone balance.
- Stress and lack of sleep: Disrupt circadian rhythms, affecting insulin and cortisol.
- Sedentary lifestyle: Reduced energy expenditure promotes fat accumulation and insulin resistance.

Detailed Mechanisms: How Foods Correct Hindered Metabolism

Below, there are different disordered metabolic pathways and how specific foods act at the biochemical and cellular level:

Obesity and Impaired Fat Oxidation

Problem:

- In obesity, mitochondrial dysfunction reduces fatty acid oxidation.
- Chronic low-grade inflammation blocks fat-burning pathways (AMPK, PGC-1α).

Foods and Actions:

Food	Mechanism
Green Tea (Catechins)	Activates AMPK, enhancing mitochondrial fat burning.
Capsaicin (Chili Peppers)	Induces thermogenesis via TRPV1 receptor activation, boosting energy expenditure.
Legumes (Fiber)	Increase satiety hormones (GLP-1, PYY), reducing appetite and total calorie intake.

Insulin Resistance in Type 2 Diabetes and PCOD

Problem:

- Cells become less responsive to insulin → higher blood glucose.
- In PCOD, high insulin worsens androgen excess.

Foods and Actions:

Food	Mechanism
Cinnamon	Upregulates insulin receptor substrate proteins, improves insulin signaling.
Fenugreek Seeds	Slow glucose absorption stimulates insulin secretion via 4-hydroxy-isoleucine.
Flaxseeds (for PCOD)	Reduce testosterone levels by binding to sex hormone-binding globulin (SHBG).

NAFLD (Fatty Liver) and Impaired Lipid Metabolism

Problem:

- Excess fat is deposited in liver cells.
- Oxidative stress and inflammation cause hepatocyte injury.

Foods and Actions:

Food	Mechanism
Broccoli (Glucosinolates)	Induce Phase 2 liver detoxification enzymes (like GST).
Coffee (Chlorogenic Acid)	Reduces hepatic fat accumulation and fibrosis risk.
Turmeric (Curcumin)	Downregulates the NF-кВ pathway, lowering liver inflammation.

Thyroid Dysfunction and Altered Hormone Synthesis

Problem:

- In hypothyroidism, iodine deficiency or autoimmunity hampers T3 and T4 production.
- Hypothyroidism slows metabolism, promoting weight gain and fatigue.

Foods and Actions:

Food	Mechanism
Seaweed (lodine)	Provides iodine necessary for T3 and T4 synthesis.
Brazil Nuts (Selenium)	Essential for deiodinase enzyme activity (T4 \rightarrow T3 conversion).
Ashwagandha (Ayurveda)	It regulates the HPT (hypothalamic-pituitary-thyroid) axis and naturally enhances T3/T4 levels.

Oxidative Stress and Inflammatory Metabolic Damage

Problem:

• Chronic oxidative stress damages pancreatic beta-cells, liver, endothelium, and mitochondria.

Foods and Actions:

Food	Mechanism
Berries (Anthocyanins)	Scavenge free radicals, upregulate the Nrf2 pathway for antioxidant defense.
Amla (Vitamin C)	Directly neutralizes oxidative species and supports collagen synthesis (vascular health).

Ayurveda + Modern Nutrition: An Integrative Action Plan

Disorder	Modern Nutrient	Ayurvedic Intervention	Combined Effect
Obesity	Green Tea	Triphala	Thermogenesis + Gut cleans-ing
Diabetes	Cinnamon, Fenugreek	Gudmar, Methi seeds	Blood sugar regulation
PCOD	Inositol foods, Flaxseeds	Shatavari, Ashoka bark	Hormonal balance
NAFLD	Broccoli, Coffee	Kutki, Punarnava	Liver detox, fat metabolism
Thyroid	lodine, Selenium foods	Ashwagandha, Kan- chanar Guggulu	Hormone balance



Brief Description of Goddess Varalakshmi Vratham

Eight forces or energies are recognised and they are known as Sri (Wealth), Bhu (Earth), Sarasvati (learning), Priti (love), Kirti (Fame), Santi (Peace), Tushti(Pleasure) and Pushti(Strength). Each one of these forces is called a Lakshmi and all the eight forces are called the Ashta Lakshmis or the eight Lakshmis of the Hindus. Vishnu is also called Ashta Lakshmi Padhi which is equivalent to saying that he is the asylum for the eight-Lakshmis or forces. In fact, Vishnu representing the preservative aspect of the universe, radiates these forces from him. These forces are personified and worshipped as Lakshmi, since abstract force is beyond the comprehension of the ordinary people. As health, wealth and prosperity depend upon the rhythmic play of these forces, the worship of Lakshmi is said to be to obtain these three. Only a woman can sympathise with women. Lakshmi is a woman. So she will more readily sympathise with women. Hence this festival is observed largely by women, invoking the blessings of Lakshmi on them, their husbands and their children.

The Story behind Varalakshmi Vratham

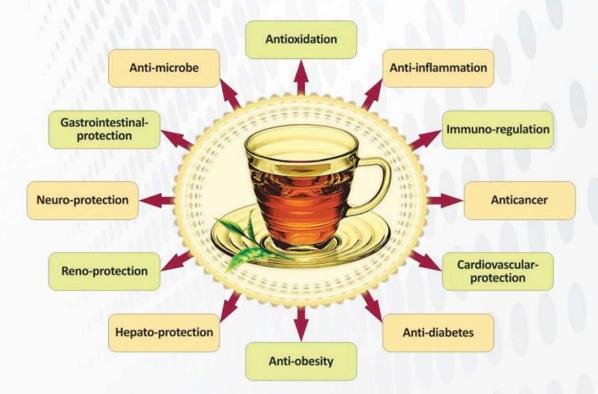
The story happens in a beautiful town called Kundinagaram located in the Kingdom of

Vidarbha (Vidarbha Rajyam). In that Kundinagaram town, Goddess Adilakshmi, being pleased by her devotion tells Charumathi in a dream and directed her to perform the vrata to enable Her to fulfil her desires. Charumathi wakes up and tells her husband about the dream. Charumathi along with some neighbourhood women takes bath in the wee hours and prepare a mandapam and invites Varalakshmi Devi. She recites the following sloka along with other women with utmost faith and devotion.

Lakshmi Ksheera samudra raja Tanya sri ranga dhameswareem. Dasi bootha samastha deva vanitham lokaika deepamkuram. Sri manmanda kataksha labdhi vibhat brahmendra gangadharam . Twam trayamlokya kutumbhineem sasija vande mukunda priyam.

Then she wore nine threads Thoranam to right hand and offers neiveidyam to Goddess Lakshmi Devi. On the completion of the first circumstance, she heard she found Gajelu, Andelu and other ornaments. On the second circumstance, they found kankanams made of navaratnams to their hands. On completion of the third circumstance, they found immense wealth. Then Charumathi offers Tambulam to the brahmin priests and distribute the vrata prasadam to the relatives and lead a happy life. Since then, Hindu women perform this vrata with utmost faith and trust till today. With this, Lord Eswara concludes telling the story to Goddess Parvathi.





BIOLOGICAL EFFECT OF TEA



Tea, a globally cherished beverage, is more than just a drink; it's a cultural touchstone with arich history and diverse preparations. Originating in China, it has spread worldwide, adapting to local tastes and costumes, from the Japanese tea ceremony to Indian chai. All the three most popular types of tea, green (unfermented), black (fully fermented), and oolong (semifermented), are manufactured from the leaves of the plant Camellia sinensis. Beyond its social and cultural significance, tea offers a range of health benefits including relaxation, increased focus and potential heart health improvements. Tea possesses significant antioxidative, antiinflammatory, antimicrobial, anticarcinogenic, antihypertensive, neuroprotective, cholesterollowering, and thermogenic properties.

ORIGIN OF TEA IN INDIA

India is the second largest tea producer in the world. The East India Company was the first one to introduce the Chinese varieties of tea in an attempt to break the Chinese monopoly on tea. Maniram Dewan(1806-1858) was the first

Indian planter to establish the first commercial plantations of the Assamese variety of tea(Assam Tea). In 1841, Arthur Campbell began the Tea planting in Darjeeling. And that's how the Tea culture started in India.

POSITIVE BIOLOGICAL EFFECTS

1. Antioxidant Properties:

Tea, especially green tea, packed with antioxidants like catechins that combat cell damage from free radicals which can help protect against aging and various diseases.

2. Cancer risk reduction:

Tea consumption may be associated with a reduced risk of certain cancers, like oral cancer, and potentially breast, endometrial and liver cancers.

3. Heart health:

Black tea has been linked to improved heart health by reducing LDL cholesterol levels and improving blood vessel health.

4. Improved Brain Function:

Caffeine is the reason for enhancing alertness and cognitive function. Additionally, Theanine, an amino acid in tea promotes relaxation and reduce anxiety.

5. Bone Health:

Increases the bone mineral density, potentially reducing the risk of fractures.

MODE OF ACTION

Caffeine is a Central nervous system stimulant which is a world's most widely consumed psychoactive drug. It primarily works as an antagonist by blocking adenosine receptors in the brain leading to more awake and alertness.

IS IT SAFE?

Well, it has both pros and cons in its consumption.

NEGATIVE BIOLOGICAL EFFECTS

1. Constipation:

Theophylline in tea can contribute to dehydration and constipation, especially when consumed in large quantities.

2. Blood Pressure Fluctuations:

Excessive consumption of milk tea, in particular, especially for individuals with preexisting high blood pressure may cause blood pressure fluctuations and imbalances.

3. Caffeine Dependence:

Regular tea consumption can lead to caffeine dependence, and abrupt cessation can cause withdrawal symptoms like headache and fatigue.

4. Heartburn and Acid reflux:

Caffeine can relax the oesophageal sphincter and increases stomach acid production, potentially leading to heartburn or worsening existing acid reflux.

5. Sleep Disruption:

The Caffeine in tea can interfere with sleep patterns leading to insomnia and poor sleep quality.

6. Anxiety and Nervousness:

Excessive caffeine intake can exacerbate anxiety and nervousness in some individuals.

7. Iron Absorption Issues:

When consumed with meals tea can inhibit iron absorption. This can be a concern for individuals at risk of iron deficiency.

8. Pregnancy Complications:

Excessive caffeine intake during pregnancy may increase the risk of miscarriage and low birth weight.

TEMPERANCE IS ESSENTIAL

While tea offers numerous health benefits, it's crucial to consume it in moderation to avoid potential sideeffects. Pay attention to your body's response and adjust your intake accordingly.



Sanskrit: The Language of the Divine



Introduction

Sanskrit, often referred to as Samskrutam, is one of the oldest languages in the world and holds a special place in the linguistic, cultural, and philosophical history of India. The name Sanskrit itself means "perfected" or "refined," indicating its structured and systematic nature. Considered the language of ancient scriptures, literature, science, and philosophy, Sanskrit continues to influence various domains, including modern artificial intelligence and medical science.

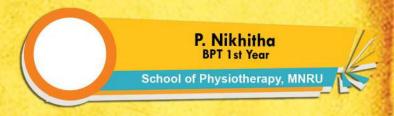
Origin and History

Sanskrit belongs to the Indo-Aryan branch of the Indo-European language family and has a history spanning over 3,500 years. The earliest form, Vedic Sanskrit, was used in the composition of the Vedas, the most sacred Hindu texts, dating back to 1500-1200 BCE. The four main Vedas—Rigveda, Yajurveda, Samaveda, and Atharvaveda—contain hymns, rituals, and philosophical teachings.

Classical Sanskrit, standardized by the great grammarian Panini in his Ashtadhyayi around the 4th century BCE, became the medium for renowned literary works, including the Ramayana, Mahabharata, and texts by scholars like Kalidasa. Over time, while spoken Sanskrit declined, its influence remained strong in religious, literary, and academic spheres.

Sanskrit's Role in Ancient and Modern India

In ancient India, Sanskrit was the primary language for religious, philosophical, and scientific discourse. Many early mathematical, astronomical, and medical treatises were written in Sanskrit, contributing significantly to



global knowledge.

Even today, Sanskrit holds relevance in various fields:

- Linguistic Studies: It forms the foundation of many Indian languages and is widely studied by scholars.
- Religious Practices: Sanskrit remains integral to Hindu rituals, Buddhist scriptures, and Jain teachings.
- **Cultural Heritage:** Studying Sanskrit provides access to a vast repository of Indian literature and wisdom.
- **Technology & Al:** Its structured grammar has attracted researchers exploring its applications in artificial intelligence.

Famous Sanskrit Books and Their Authors

Some of the most well-known Sanskrit literary works include:

- Panchatantra Vishnu Sharma
- Arthashastra Kautilya
- Ramayana Valmiki
- Bhagavad Gita Ved Vyasa
- Abhigyan Shakuntalam Kalidasa
- · Kadambari Banabhatta
- Natyashastra Bharata Muni

Sanskrit in Artificial Intelligence

The potential of Sanskrit in AI was first explored

by researcher Rick Briggs in the 1980s. He recognized its precise grammar and logical structure as an ideal linguistic model for Al and computational linguistics.

Contributions of Sanskrit in Al

- 1. Natural Language Processing (NLP): The systematic rules of Sanskrit grammar assist in language modelling and machine translation.
- **2. Semantic Precision:** Its rich vocabulary aids in improving Al comprehension and contextual understanding.
- **3. Knowledge Representation:** Ancient Sanskrit texts contain extensive information that can be structured for Al applications.
- **4. Speech Recognition:** The clear pronunciation rules of Sanskrit help refine Aldriven speech recognition tools.

Recent projects like Susiddha Al, SanskritShala (IIT Kharagpur), and SanTran have worked on integrating Sanskrit with Al for better computational analysis and translation models.

Sanskrit in Medical Science

Sanskrit has played a crucial role in the development of traditional Indian medicine. The legendary physician Sushruta, known as the "Father of Surgery," wrote the Sushruta Samhita in Sanskrit, detailing various surgical procedures. Similarly, Charaka Samhita and Ashtanga Hridayam remain fundamental Ayurvedic texts.

Key Contributions of Sanskrit in Medicine

- **Ayurvedic Texts:** Ancient manuscripts provide a deep understanding of anatomy, physiology, and herbal medicine.
- Medical Terminology: Many Sanskrit terms describe human anatomy, diseases, and treatments.
- Yoga & Meditation: Sanskrit terminology is integral to these holistic healing practices.
- Mantras for Healing: Certain Sanskrit chants are believed to have therapeutic

effects.

Modern Advancements

- The Sushruta Project focuses on translating and analysing ancient Sanskrit medical texts.
- Traditional Knowledge Digital Library (TKDL) digitizes and preserves Ayurvedic manuscripts to prevent biopiracy.

Conclusion

Sanskrit is not just a language of the past but a bridge to the future. From its ancient role in shaping Indian civilization to its modern applications in AI and medicine, Sanskrit continues to be a subject of global interest. With ongoing efforts to revive and integrate Sanskrit into technology and research, its legacy remains vibrant. As we embrace modernity, preserving and promoting Sanskrit ensures that its profound knowledge and wisdom continue to benefit generations to come.

Activities @ MNR Golden Kids (Navi Mumbai)

Guru Pournami & Friendship day Celebrations
@ MNR Golden Kids G27, Mumbai



Guest Lecture Activity and Yellow Day

@ MNR Golden Kids G01, Mumbai



Field Trip Activity and World Emoji Day

@ MNR Golden Kids G12, Mumbai



Yellow Day & Guru Pournami Celebrations
@ MNR Golden Kids G02, Mumbai



Activities @ MNR Group of Schools

Doctor's Day Celebrations

@ MNR I-Exceed School, JNTU



Bonalu Day Celebrations

@ MNR School of Excellence, BHEL



Investiture Ceremony

@ MNR School of Excellence, Kamothe



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Friendship Day Celebrations
@ MNR Golden Kids G-5

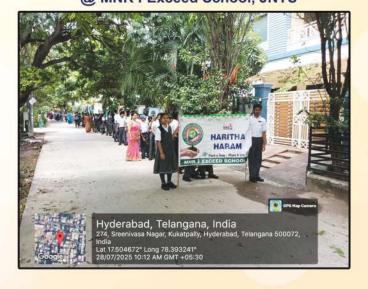


Violet & Purple Day

@ MNR School of Excellence, BHEL



Haritha Haram Celebrations
@ MNR I-Exceed School, JNTU



Activities @ MNR Group of Schools

Doctor's Day @ MNR High School, Chintal



Yellow Color Day Celebrations @ MNR High School, BHEL



Bonalu Festival Celebrations @ MNR School of Excellence, Mehadipatnam



Spell Bee Intra School Competition Activity @ MNR School of Excellence, Sangareddy



Bonalu Festival Celebrations @ MNR School of Excellence, Sangareddy



Guru Pournima & Kargil Vijay Diwas Celebrations @ MNR International School, Palaspe



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Events @ MNR Higher Education and Research Academy (MNR-HERA) Campus, Sangareddy, Telangana.

ACTIVITIES @ MNR COLLEGE OF PHARMACY

Students participated in a visit to the Edu Fair organized by i20fever, where they explored global higher education opportunities



A One-Day Webinar on "CPCSEA Guidelines for Laboratory Animal Facility in Experimental Research" was organized to create awareness about ethical practices, regulatory compliance and proper care in laboratory animal research

© GPS Camera A One-Day Seminar on "B.Pharm to Breakthroughs: My Journey, AI in Pharma, and Mastering Knowledge in the AI Age" was conducted to inspire students by highlighting career pathways, the impact of Artificial Intelligence in the pharmaceutical field and strategies for excelling in the AI-driven era





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Collaborations and MoUs with Key Stake Holders











