

EDUCATION RESEARCH AND ANALYSIS

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Vijaygarh Jyotish Ray College
In Collaboration With:



Kalyani Foundation For Media Sciene & Community Research

Kolkata, West Bengal, India

Best Possible Practices of Teaching in Higher Education in India

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Abstract: Ministry of Human Resource Development (MHRD) has claimed a growth in higher education scenario. It has shown growth in Gross Enrolment Ratio (GER), number of universities, number of higher educational institutes and in number of faculties. But the fruitfulness of such quantitative growth depends largely on its qualitative outcome which mainly depends on the way of imparting knowledge. After describing the higher education scenario in India, this paper tries to locate the best possible way of higher education teaching in India. Firstly, it states the different approaches of teaching methods. Then it tries to highlight a composite way of different approaches, like teacher centered with student centered and high technology with low technology to get the best way suitable for Indian paradigm. It ultimately comes to a conclusion that the method should not be generic and prescriptive by any particular authority but it should be specific and composite keeping the constraints in mind for the particular case.

Keywords: Autonomous Institutions, University Grants Commission, Higher Education in India

1. Higher Education in India

Higher educationsystem of India is the third largest in the world, next to the United States and China. The main governing body at the tertiary level is the University Grants Commission, which enforces its standards, advises the government, and helps coordinate between the centre and the state. Accreditation for higher learning is undertaken by 15 autonomous institutions established by the University Grants Commission (UGC). The education system of India falls broadly under the Ministry of Human Resource Development (MHRD). In the branches of the MHRD, the Department of Higher Education is responsible for overseeing the growth of the higher education sector. The aims of the Department are to improve quality of and access to higher education for all sections of the population. The majorobjective of the Department is to increase the Gross Enrolment Ratio (GER) in higher education to 30% by 2020. Some of the other objectives of the department include: extension of institutional base, greater inclusion of minorities, eradication of regional disparities, infrastructural improvement and increased global participation.

2. Challenges in Higher Education

India's Higher education faces problems ranging from income and gender disparities in enrolment, to poor quality of faculty and teaching and even to a general lack of motivation and

higher education. The basic criteria of higher education are to deliver the deeper knowledge of the subject not only fulfilling the market requirement or to produce a knowledgeable surplus. It has to develop a critical mind to generate inquisitiveness for advancement. The best possible method of teaching higher education in India depends on using the low to moderate technology with a student centered approach to create a questionable mind for heading towards a prosperous future.

So the conclusion is, to ascertain the best possible method by developing a composite approach as deemed necessary for the purpose, judging the availability of educational resources. Last but not the least, the number of more universities (903 of 2017-18 to 993 of 2018-19) does not justify the betterment of the higher education scenario and the best possible method of teaching higher education should not come as a prescription of higher authority like, NAAC or UGC but it may be developed for a particular state, university or institute, keeping the constraints and the normal approaches in mind.

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Innovations and Best Practices – A Study of Best Practices Followed in Vijaygarh Jyotish Ray College

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Abstract: Even though the higher education is developing its quality base in India, it is lagging behind the world class institutions. However, the Ministry of Human Resources Development (MHRD) and the University Grants Commission (UGC) is providing grants and facilities to the higher educational institutes on the basis of certain benchmark. The most reliable benchmark of quality of any institution depends on the best practices that an institution follows. In order to acquire certain degree of administrative and academic excellence, every institution must follow certain quality standards. According to National Assessment and Accreditation Council (NAAC), in order to achieve quality enhancement in education best practices must be advocated. The benchmarking is a system of measuring and comparing the processes adopted by an institution with those of others which is widely used in the academic circle. In this paper we will discuss the various aspects of best practices in context of Vijaygarh Jyotish Ray College and also recommend a few initiatives which may be taken up by the college.

Keywords: Best Practices, Academic Excellence, Benchmarking, Quality Enhancement. Objectives

- To understand the meaning of Best Practices prescribed by NAAC.
- To assess the parameters involved in BestPractices
- How to apply Best Practices in different stages in different Higher Educational Institutions(HEIs)
 - To study the Best Practices followed by Vijaygarh Jyotish Ray College(VJRC)
 - To make an analysis of steps taken and make necessary suggestions.

Introduction

In order to introduce quality in the higher education, the growth opportunities into the education sector is being looked into from a broader and global perspective. Knowledge is one of the determining

- f) Cultural programmes and prize distribution ceremonies are organized by the NSS unit of the college where the children of the socially deprived area participated
- g) Pronam' an inclusion programme for the elderly has been organized by the college NSS unit in collaboration with KolkataPolice.
- h) The college is giving self-defense training to the female students of the college in collaboration with the Kolkata Police under the 'Sukanya'programme.
- i) The institution organizes various National events like Independence Day, Republic Day, commemorating death/birth anniversaries of renowned Indian Luminaries.
- 8) The institution has organized various rallies and candle march honouring the sacrifice of our fallen soldiers, in case of national disasters, etc.
- 9) The college has been regularly participating and winning prizes in various inter-college competitions, quiz programmes, sportsevents.
- 10) The college has a medicinal herb garden which is maintained by the Department of Botany. The college has a 0.84 acres campus most of which is littered with shrubs, herbs, green fruit-bearing trees which create a soothing ambience forall.
- 11) The Green Consumer Club of VJRC and DRCSC organized a Green consumer fair to make the students socially aware of the environment and instill a culture among them to use ecofriendly materials like jute bags, plates made out of coconut leaves, etc.
- 12) The college has an active Kanyashree Cell which is in continuous collaboration with the Govt. of West Bengal to make the Kanyashree scheme an ongoing success in VJRC. Recently the college held a 'Kanyashree Udjapan' ceremony in the college along with KMC.

Conclusion

With keeping in mind the current environmental and ecological needs, the college has taken all the necessary steps which are fulfilling the needs of the society. As a responsible member of the community, it is expected that every individual should contribute to the betterment of the society, and thus fulfilling the overall objectives of the institution. Best practices can be called 'best' only when the society is benefited from these. Thus, more active engagement by the HEIs in tandem with different NGOs will create further awareness and a sense of belonging among the stakeholders of the community.

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Non-relativistic reduction of spinors, new currents and their algebra

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Abstract

A specific mapping is introduced to reduce the Dirac action to the non-relativistic (Pauli - Schrödinger) action for spinors. Using this mapping, the structures of the vector and axial vector currents in the non-relativistic theory are obtained. The implications of the relativistic Ward identities in the non-relativistic limit are discussed. A new non-abelian type of current in the Pauli - Schrödinger theory is obtained. As we show, this is essential for the closure of the algebra among the usual currents. The role of parity in the non-relativistic theory is also discussed.

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1. Introduction

The low energy effective description of a system usually requires the study of a non-relativistic (NR) field theory. In general, however such theories and their symmetries are difficult to handle due to the occurrence of a universal time so that a systematic covariant formulation is no longer available. Possible ways are to construct the galileo invariant wave equation adopting Dirac's procedure [1] or, alternatively, to abstract the NR limit of the corresponding relativistic theory

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Analysis of Best Practices-With Reference To Different Institutions

Dr. Laxmi Saha

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Abstract: The mission of higher education department is to expand the access and qualitative improvement in the higher education by providing opportunities with equity to all and specially to the vulnerable sections, by initiating new policies to strengthen research and innovations, by promoting the quality of higher education by investing in infrastructure, faculty and improving governance and institutional restructuring by the inclusion of deprived communities etc. To meet these various goals new practices and innovation are being adopted by the higher education institutions (HEIs). The department of higher education has been given various grants, facilities and benefits to develop the higher educational institutions. The institutions are being given accreditation by NAAC on the basis of its performance. NAAC has provided 100 points to innovations and best practices.

Keywords: NAAC, Globalization, Educational Institutions

Introduction

Though India is having one of the largest education system in the world, it now is facing new challenges of new era with changing dimensions. Therefore, the educational institutions are adopting various mechanisms to sustain in the tide of globalization. The world class famous institutions use technology for giving need based quality education to all. The goal of these institutions is not only to reach the masses but to give adequate knowledge for implementing all those in their future lives. That is why the famous universities of the world are providing knowledge to the students with the help of technology. The use of technology has helped students to enhance their skills using various digital learning process and it has changed the face of education and provided more opportunities to the students. Technology increased students' engagement and motivation towards learning. The main use of technology is to have online classes and it also enables students to gain need based quality education. The best Universities of abroad embraced the "flipped classroom" format where students get video lectures which they can use at home and in their classrooms they apply their knowledge solve problems and discuss examples. Naturally these online video classes give extra knowledge to them. The top class Universities make their video lectures available to the world through online so that any one from anywhere can access to those all and other countries are also being encouraged with these policies.

India has developed well system of higher education following the process of modern Universities. But the ultimate goal of reformations is yet to meet. The outcome of higher education agencies is

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Institutional social responsibility, its outcome: Students developed organisational skills, improved communication, initiative for conducting events, common room, day care centre increased satisfaction levels of female staff.6

Conclusion:

After seeing the different grades and scores of different colleges it has now become clear that colleges who undertake best practices have positive impact on their assessment and accreditation process earning them expected scores and grades. Some best practices have global effect and it helps to increase the overall fame of aninstitution. These practices add extra value to students' life and it also helps to make them socially and morally aware.

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FULLLENGTHARTICLE

Interrelationship using molecular markers amongst varieties of *Plantago ovata*. forsk, Plantaginaceae

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Plantago ovata Forsk, known, as isabgol in India is an important medicine for all kinds of digestive ailments, and has a wide demand the world over. It is widely recommended in the treatment of constipation, dysentery, and stomach ulcers. The plant is also important as fodder, in ice cream making and also as a common gelling agent. The jelly-like mucilage (Arabinoxylan) is produced when psyllium is soaked in water. The measurement of genetic diversity in plant germplasm has been revolutionized by the use of molecular markers. Several methods enable the genetic characterization of cultivars. Various methods have been developed for the identification and typing of prokaryotic and eukaryotic organisms at the DNA level (RAPD; a PCR based technique, RFLP; based on unique patterns of restriction sites etc.). These methods differ in their ease of use, cost, and reproducibility of results. The ideal genotyping method produces results allow unambiguous comparative analyses and the establishment of reliable databases. Among the newest and promising methods is amplified fragment length polymorphism (AFLP) analysis and Internal Transcribed Spaces (ITS) are important. The present authors have used five different varieties of Plantago ovata to draw the genetic relatedness through AFLP studies along with data obtained from Internal Transcribed Spacer (ITS) studies. Their data proved to be in accordance with earlier work done using random amplified polymorphic DNA (RAPD) by the same lab. The molecular technique on specific sequenced based data proved to be trustworthy, appropriate and more detailed characterization for ascertain the taxonomic relationships.

Key Words: Internal Transcribed Spacer (ITS), external transcribed sequence (ETS), non-transcribed spacer (NTS), amplified fragment length polymorphism (AFLP), Basic Local Alignment Tool (BLAST).

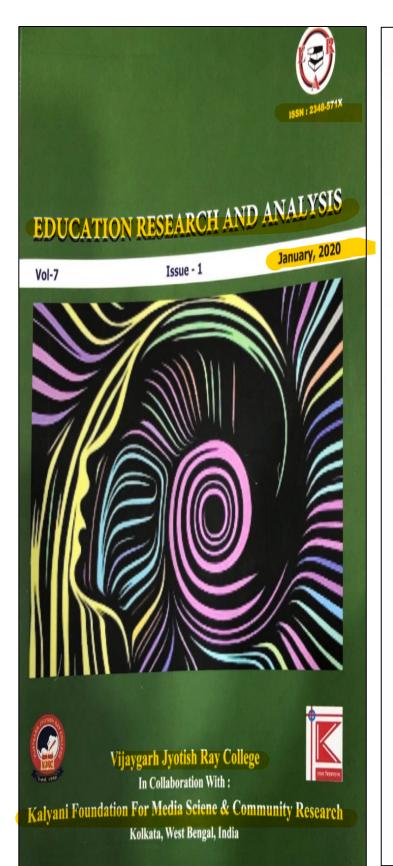
INTRODUCTION

Isabgol, the common name in India for *P. ovata*, comes from the Persian words *isap* and *ghol*, meaning "horse ear," which describes the shape of the seed. India dominates the world market in the production and

export of psyllium. *Plantago ovata* is an important medicine for many kinds of digestive ailments and has a wide demand the world over. It is widely recommended in the treatment of constipation, dysentery, and stomach ulcers.

Molecular markers that present at specific locations of the genome are specific fragments of DNA that can be identified within the whole genome. Individuals can

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BEST Practices for a Better Future

Urmi Roy

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Abstract: Many different types of practices are used to maintain the quality of an Institution. Best practice or method gives better result to any other alternatives. Any institution should follow best practices to maintain quality of the students as well as of the institutions. The assessment of student achievement is the basis of effective teaching and learning. Maintaining the quality of an institution not only means the educational quality of the students but also the environment of the institution. A person working in an organization, will gain inspiration for the environment of the workplace that should be maintained and can be improved by following possible best practice. All the departments should follow few protocols continuously to improve their environmental performance. Organizations should follow new modifications to get inspiration for their environmental work and to protect the environment.

There are few practices which can be followed in regular basis to get better environment at college or teaching institutions. Any teaching institution should follow techniques to save energy and remodel their laboratories to make it more energy efficient. There are different approaches which can be considered as best practices like waste recycling, water conservation, paper saving etc. These practices will guide the students and members of the colleges for the continuous improvement in environment within the college and also the community.

Keywords: Best Practices, Environment, Saving Paper, Saving Electricity and Saving Water, Recycling.

Introduction

Education helps people and societies with the equipped skills, knowledge and perspectives to live in a changing world. Quality education is a key element for the overall development of the educational institution. 2005 to 2014 have been declared as the Decade of Education for Sustainable Development (the UN). But there have been very few studies on the costs and benefits of different forms of education within the fields of environmental conservation and sustainable development. There are very limited number of projects quantified for the conservation and sustainable development of educational institutions. Without quantitative data it is almost impossible to translate theoretical research concepts into practical actions. The conservation and sustainable development strategies need practical implementations to succeed.

The funding for conservation is limited. So it is very important to deciding where to invest, how



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Roof Top Rainwater Harvesting

Mahua Bhattacharya

Assistant Professor, Department of Botany, Vijaygarh Jyotish Ray College, West Bengal, India

Abstract: In consonance with the present day objective of attainment of quality in higher education in diversified manners through adoption of various new concepts and in order to in-still confidence, ingenuity and creativity amongst all associated with the institution, lot of good practices are being adopted by different institutes which add admirable values. NAAC encourages these efforts of innovativeness in devising concepts and their implementation.

The rapid increase in population and intensification of urbanisation and industrialisation, rapid depletion and decline of storage of freshwater has become a major and serious challenge worldwide and it is now an urgent need to formulate new water management strategies to devise ways for other sources of water in addition to the existing resource. The use of water collected from Rainwater Harvesting is one of such areas that can be of additive value to our requirement of freshwater. At present we only use 36% of total runoff. Rainwater harvesting means collection of rainwater for effective use instead of going it as waste as runoff. This can be done in any area, both at individual and community level.

Keywords: Catchment, Collection System, Utilisation System

Introduction:

The greatest challenge that we confront during our time is the rapid decline in the availability of fresh water and if we are not aware of this threat, in future there will be scarcity of water. This is definitely a major constraint for future development.

Increase in population, urbanisation, industrialisation at a faster pace and more and moreareacoverageforirrigating the agricultural landstoin crease food productivity are the major reasons for higher quantity of use of freshwater. India's urban population will grow to about 52% by 2050. So there will be enormous pressure on the resource of water due to escalating demand.

Water as resource:

To understand the gravity and severity of the present nature of crisis in India we need to go through the following information: (considering area)

	g and a married (Constacting area)	
1.	Total Surfacewaterresources	1880km^3
	Total usablegroundwaterresources	$418 \mathrm{km}^3$
3.	Total usable surfacewaterresources	690km ³
4.	Total usable waterresource (2+3)	1108km^3

Source: Central Water Commission

Impleting Best Practice Among College Students Through 'MEDITATION'

Dr. Samiparna Rakshit

[Assistant-Professor of History, Vijaygarh Jyotish Ray College, West Bengal, India]

Abstract: This paper enumerates an example of best practice that will help in constituting excellence in college teaching. This instance of best practice will represent thebroad range of effective action that a teacher should follow, and would make requisite conditions that teachersestablish, to facilitate learning. This would help to serve more as a reference to the scope of excellent teachingtechniques than as a source of enlightenment.

Keywords: Meditation as Best practice, Historical Sanction of Meditation, Utility of Mediation, Scientifically Proven Facts of Meditation

Introduction

Best practices benchmarking is the initiative of the National Assessment and Accreditation Council (NAAC). It also sets the stage for a discussion of the identification, sustenance, dissemination and adaptation of best practices and of their transference from one system to the other. Benchmarking is an increasingly popular tool in industry and is used extensively byboth manufacturing and service organisations. In order to be applied effectively to education, benchmarking may be seen as anongoing systematic means for determining the best practices of the best-in-classinstitutions, and using the information as basis for goals, strategies and implementation. More simply best practices benchmarking for quality enhancement would be 'finding and implementing the best practices which would lead to significant improvement in the quality of educational provisions'.'

Establishing benchmarks through best practices is not a new concept in highereducation in the foreign countries. It has already been tried by the Association of Commonwealth Universities(ACU). In 1996 Commonwealth Higher Education Management Service (CHEMS), a sub system of ACU launched an international "University ManagementBenchmarking Club" for universities from the Commonwealth. 2

Climate Setting of a Class

Before going into narration of the adverse situation a college teacher usually faces in a huge class I would opt for explaining the term 'Climate Setting'. 'Climate Setting' is a very much familiar term among the educationists nowadays. It means to regulate the physical and mental climate of the students before starting off the teaching process. A large portion ofteaching effectiveness involve setting the stage. We should solve comfort issues first and make the learning path smoother. Research shows that successful teachers spend 10% of classroom time optimizing the arrangement of the physical

Some Innovative and Best Practices for Colleges with Respect Environmental Consciousness and Sustainability

Dr. Saswati Gayen

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Abstract: Environmental pollution is the unfavourable alteration of our surrounding wholly or largely as a by product of man's actions, through direct or indirect effects of the wholly or largely as a by product of the changes in the energy pattern, radiation levels, and chemical and physical constitution is a global problem on the and abundance of organisms. Environmental pollution is a global problem and is common to both developed as well as developing countries, which attracts the attention of human beings for its severe long-term consequences. The decline in environmental quality as a consequence of pollution is evidenced by loss of vegetation, biological diversity, excessive amounts of harmful chemicals in the ambient atmosphere and in food grains, and growing risks of environmental accidents and threats to life support systems. It should be the responsibility of every institution to enhance learning by students and faculty of the environment in which they live and to improve the quality of the environment of their campus and the communities around them. Whether motivated by enforcement actions or own consciousness colleges and universities are spending more resources than ever before to comply with their environmental, health and safety obligations as well as explore their opportunities to improve environmental performance and sustainability. A green and pollution free campus provides an ideal environment for student and the employee to work with. This review paper will focus on the various best practices that can be implemented by higher education institutes for management of environmental issues and move the institution towards sustainability. Some innovative and best practices implemented by institutions across India are also discussed.

Keywords: Environment, Pollution, Sustainability, Best Practices.

Introduction

With higher education becoming an international service, there is a growing concerning world about its quality, standards and recognition. India has one of the largest and diverse education systems in the world. Privatization, widespread expansion, increased autonomy and introduction Programmes in new and emerging areas have improved access to higher education. At the sales led to a state of the sales led to a sales led to a state of the sales led to address these concerns the New York and relevance of the higher education. address these concerns, the National Policy on Education (NPE, 1986) and the Programme of Action (NPE, 1986) and the Programme (PoA, 1992) spelt out strategic plans for the policies, advocated the establishment of an independent of the policies of the policies of the policies of the policies of the establishment of an independent of the policies of the policies of the policies of the establishment of the policies of the policies of the policies of the establishment of the policies of the establishment of the policies of National accreditation agency. Consequently, the National Assessment and Accreditation Country

The Best Practice in Higher Education and The Empowerment of ICT in Teaching-Learning system

Dr. Sampa Debnath

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Abstract: The responsibility of Higher Education Institutes (which include University and College) is to provide higher level education by enhancing the scope of study after completion of basic level of education. To carry out this responsibility, the higher Education Institute (HEI) should adopt some innovative practices which can initiate value education and the awareness of social responsibility and good citizenry. These good practices are called best practices. The best practice benchmarking is essential for systematic implementation of best practice in the institution and up gradation of quality initiation. Quality has become the mile stone of education in the 21st Century in the context of new social realities. Quality in higher education is a multi-dimensional, multilevel, and a dynamic concept. Ensuring quality in higher education is amongst the foremost challenges being faced in India today. Identification of best practice which is suitable for specific HEI, is very much important. The best practice depends upon the background of the HEI.. In this 21st century "Empowerment of Information and Communication Technology (ICT) in teaching-learning System" is one of the good practice. Due to smooth implementation technique by the HEI and wide acceptance by the students, this technique is becoming more and more popular day by and wide acceptance of ICT in teaching-learning system results the maintenance the quality. The role of best practice is to focus the quality sustenance and enhancement and management, faculty have a critical role in implementation of best practice. Finally, students, for whom the whole system is designed, should desire and demand the best.

Keywords: Best Practice, Higher Education, ICT

Introduction:

Information and communications technology (ICT) is an extensional term for information technology (IT) that stresses the role of unified communications[1] and the integration of telecommunications (telephone lines and wireless signals) and computers, as well as necessary enterprise software, middleware, storage, and audio-visual systems, that enable users to access, store, transmit, and manipulate information. ICT can be accessed via internet. Information and communication technology (ICT) has changed many aspects of the way of our

Approaches and Methodologies of Best Practice in Research, Consultancy and Extension in Higher Education

Dr. Shilajit Barua

[Assistant Professor, Dept. of Microbiology, Vijaygarh Jyotish Ray College, West Bengal, India]

Abstract: Academic system in our country had assumed research and teaching as mutually exclusive activities. Such bifurcation was because, research here is considered to be an intellectual isolation by certain group of academicians and placed above teaching with respect to academic status. The National Assessment and Accreditation Council (NAAC)had aptly identified the integral connection between teaching, research, research extension and consultancy. Throughout the world, in renowned academic institutions, teaching, research extension and consultancy has been considered as a platform for research, wherein, research-industry linkage, research-service amalgamation and researcheducation technology inter-dependence are increasingly realized. Such approach could be the foundation of development in developing countries like India. Furthermore, considering fast development in all sectors of human activities it will be deleterious for research to stagnate in confinement. This article focuses on the aspects of best practices in research, consultancy and extension in higher education.

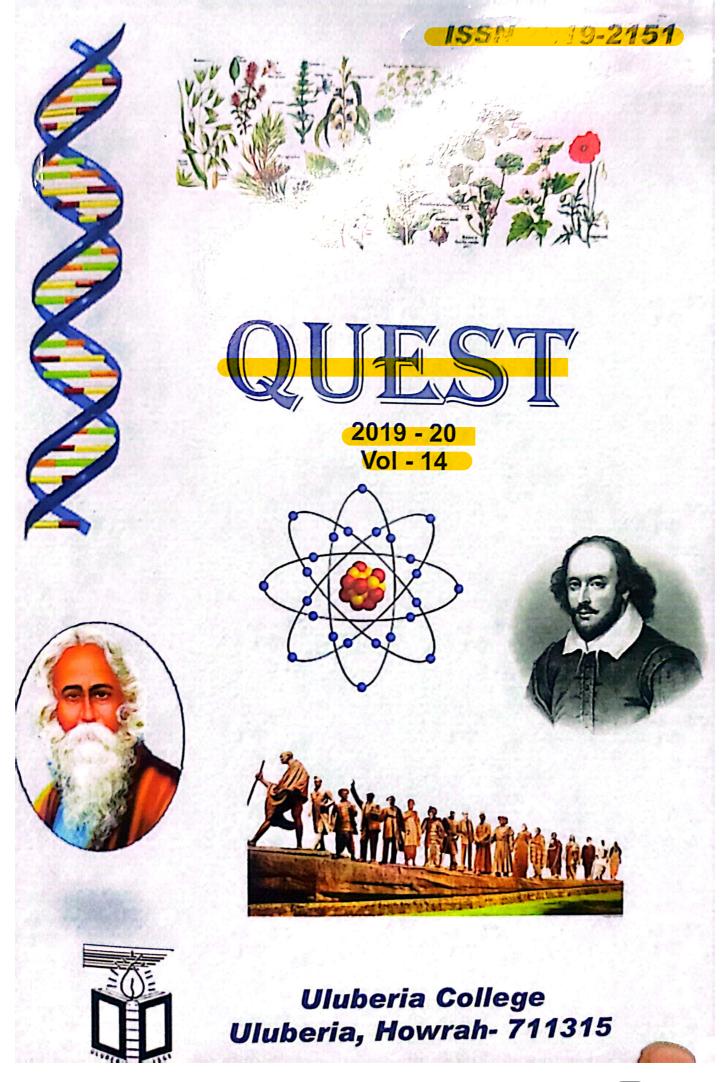
Keywords: Best practice, Research, Consultancy, Extension.

1. Introduction

Progress and development of a nation depends on the standard of excellence set by its institutions of higher learning, because centers of academic excellence are measure of human development which speeds up national growth by generating creative talents. Democratizing excellence through adopting best practices brings out quality enhancement that contributes to advancement of the society. It has become essential to adapt best practices in research to make it comparable to global standards.

Like research, consultancy and extension are also of equal importance. Gone are the days when necessity was the mother of all inventions. Globalization, liberalization and privatization have now made many inventions celebrated as mothers of new necessities. Therefore, successful societies now are those who can adapt themselves to changing lifestyles and technologies. Information, innovative knowledge, creative skills and wisdom are nowadays considered as pillars of national development. Abilities in earning consultancies are being measured as measure of efficiency of research and extension.

An ideal higher educational institute and associated personels should contribute to building of new knowledgebase and disseminate to its end users, i.e, an excellent teacher has to be a good



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Real Time RT- PCR: The First Platform for

Corona Virus Detection

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Abstract

For the detection of Corona virus present in human being, there are mainly two types of clinical tests available till date — Firstly, RT-PCR and Secondly, the Serological or Antibody test. RTPCR is the most common test to identify people currently infected with SARS-CoV-2. It works by detecting a segment of the virus's genetic material (RNA) present in nasal or throat swab of a suspected person. The accuracy of clinical test is determined by sensitivity and specificity. Sensitivity denotes the ability of a test to detect true positive where as specificity focuses on accurately identify people without the disease i.e. true negative. In this aspect, RT-PCR is considered as the gold standard for detecting many viruses in ideal condition where as antibody test takes about 1-2 weeks to detect the patient positive because antibody against SARS-CoV-2 or any other infection cannot be synthesized in patient's body immediately after infection.

Keywords:

SARS-CoV-2, RT-PCR, Serological test, RNA, Specificity, Sensitivity

Fruits against diseases - a review

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Abstract

In this world of microorganisms, fruits play a pivotal role in the lives of people from ancient times. Various studies have revealed that nutritional and medicinal roles of fruits play an important part in human life. Apart from being used as coloring agents, flavoring agents, preservatives and food additives, they are also involved in treatments of various human diseases. Earlier, people used home-grown fruits to cure different types of diseases, but nowadays antibiotics are taking their place. However, unnecessary usage of antibiotics leads to evolution of multi-drug resistant microorganisms. Many phytochemicals from fruits have been identified that are reported to possess medicinal activities. This review aims to provide insights about such potential medicinal activities of various bioactive components found in some well- available indigenous tropical fruits.

Keywords: phytochemicals, alkaloids, saponins, flavonoids, cardiovascular disease

Introduction

Day by day the rate of spreading of diseases among human populations is increasing and the medicines used for their treatment are getting tolerant. Prolonged use of drugs results in development of MDR (Multi Drug Resistance) along with different side-effects. Diseases are of two types- communicable and non-communicable and the latter includes cardiovascular diseases (CVDs), diabetes, cancers, chronic respiratory

diseases etc. It is mainly responsible for increasing the mortality rate. NCD (Non-Communicable Diseases) risk factors globally are raised blood pressure, tobacco use, high blood glucose, physical inactivity, overweight and obesity. All these lead to complications in human lives, limit productivity and decrease the quality of life [1]. Moreover, costly treatments implicit social burden and adverse health financing outcome for individual, family and country as well [1]. On the other hand, natural products are found to be more reliable, cost effective and safe to obtain medicinal values from them for combating infectious diseases. Different plant parts like fruits, bark, leaves, stem, root, twig, and sap are used as traditional medicines. These parts have been widely used as folk medicines by local communities for centuries for treating several diseases, including cough, fever, asthma, diarrhea, indigestion, and skin diseases. Extracts of different plant parts including fruits are in use in modern medicine also for their benefits as antifungal, antimicrobial, anti-atherosclerotic, anti-hypercholesterolemic, anti-leukemic, anticlastogenic, and anti-proliferative agents [2]. Fruits in general, are also rich sources of many vitamins and minerals. Consumption of fruits reduces risk of chronic diseases such as cardiovascular disease and cancer. Some biochemical molecules called phytochemicals are found in fruits which are thought to be the major bioactive compounds for the health benefits [2].

This review discusses about some fruitbearing plants which are commercially cultivated



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Implementation of Digital Media in Indian Development Communication

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Abstract The concept of sustainable development can be construed in many different ways, but at its core is an approach to development that looks to balance different, and often contending, needs against an awareness of the environmental, social and economic limitations we face as a society. India makes up 2.4 percent of the world's land, while supporting 16 percent of theworld's population. Currently, India is facing problems regarding health care, poverty reduction, good governance, socio-economic and cultural development, rapid and widespread environmental degradation at alarming rates. This has serious repercussions for the livelihoods of hundreds of millions of Indians that live off the land. For the sum-up these challenges, media plays a vital role especially the new media because it trending the youth in a very passionate manner. Now in this paper I am going to empirically testify the trends and scenario of the sustainable developmentand the implementation of new media for development communication in India.

Keywords: Development Communication, New Media, Sustainable Development, Government Projects, Mass Media

Introduction:

Development cannot happen in isolation whether it may be in micro or macro level. So there is a need for a strong tool to connect people instantly so that the knowledge transfer is never ending and instant. Media for sustainable development uses to convey messages on issues such as health care, poverty reduction, good governance, environmental protection and community development, socio-economic and cultural development. Today the world is becoming a small place to live in and share knowledge, ideas and passing over valuable culture to the next generation, all the above said things is possible through social networking and new digital media. It allows users to share and interact with online content and to connect with like-minded people. Its strengths are rapid dissemination and amplification of content. New digital and social media tools can be some of the most rewarding and informative

Chemicals in the Environment

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Abstract: Chemicals, in one form or other, are present in the environment. Basic abiotic components of the environment like water, air and soil attained a state of equilibrium in respect of chemical ingredients and behaviours, through evolutionary processes of thousands of years and became congenial for evolution and sustenance of life on earth. These are getting badly polluted through deforestation, urbanisation, industrialisation, desertification, indiscriminate disposal of wastes etc. In fact pollution is the consequence of depletion of essential chemicals or accumulation of toxic chemicals in the environment.

Key Words: Chemicals, Deforestation, Urbanisation, Industrialisation

Introduction: Air, besides its normal components like nitrogen, oxygen, carbon dioxide, water vapour etc. is said to contain about three thousand undesirable chemicals released from automobile exhaust, industries, domestic smoke etc which are responsible for causing blurred vision, headache, unconsciousness, irritation of eye and throat, breathing trouble and even death. Chemicals like oxide of nitrogen, sulphur cause acid rain which pollutes air, water as well as soil. Increase of carbon dioxide concentration in air is regarded as the major factor for causing global warming.

Water is getting polluted by domestic wastes, municipal sewage, industrial effluents, chemical fertilisers, insecticides, herbicides etc. Reported presence of arsenic in water in different localities is of great concern, since arsenic is a deadly poison. Water is said to be responsible for about 60% diseases of Indian people.

A living system can be considered as a very sophisticated chemical laboratory, where many chemical reactions take place to sustain various life processes. Different chemicals enter human body through air, water, food etc and lead to disorder in normal physiological functioning, causing health hazards. Many undesirable chemicals consumed in minute amounts might not manifest their adverse effects instantaneously but cumulated effects of continuous intake of such chemicals may be dangerous.

Besides air and water human being require food consisting of carbohydrate, protein, fat, vitamin and minerals. These are derived through foodstuffs. Even natural food is not free from harmful chemicals always. Fertilizers, pesticides, herbicides applied to plants find their way to vegetables, fruits, betels etc. Moreover, coal-tar based synthetic dyes are being indiscriminately applied to vegetables, fruits, fish, meat, pulses, spices, sweets etc to give

A Comparative Study:

Between the Views of David Drummond and William Ward Against the Spread of English Education

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David Drummond

David Drummond was born at Fipeshine of Scotland in 1785/87. Scotland became the shrine of new ideas and revolutionary dreams when Drummond stepped into his youth. Drummond was greatly influenced by Hume's confusion, Pen's "Age of Peason ", Campbell's 'Pleasures of Hope' and Burn's fiery dreams.

On 2nd June. 1813, David Drummond started his journey from Portsmouth to India by ship. After reaching Calcutta, he went to Berhampur being a guest office friend Mr. Christy. He again came back to Calcutta on 14th january,1814, Drummond joined 'dharmatala academy' conducted by Mr. Walsh and Mr.majors, as a teacher. His annual salary was 150 pounds including fooding and lodging. After few days, Mr. Walsh withdrew himself from the executive committee of the school and Drummond became one of the owners of Dharmatala Academy along with Mr. Majors.

David Drummond concentrated on the syllabus, teaching method examination procedure of the school and brought many changes. Previously, Dharmatala academy was a classical school, but now the emphasis was given on science and commerce. He took some significant measures to widen the domain of education. They were-1) including english as a compulsory subject, 2) introducing Roman classics in the syllabus, 3) including english grammar in the syllabus to learn the language properly, 4) use of globe as a tool of teaching geography, 5) introduction of annual examination, 6) arithmetic, book-keeping, geography, astrology. Geometry, trigonometry, algebra and drawing were parts of the syllabus. Drummond also emphasised on logic, debate and analysis,7) Drummond brought a drastic change in the teaching method of Book-keeping. He wanted the students to learn the subject while playing and arranged accordingly. 'He converted hours of relaxation into profit.'

8) Drummond put extra-curricular activities like dance, music, recitation and acting in the syllabus for recreation of the students. 9) Drummond wanted to ensure a liberal environment in the school. He took necessary measures to ensure no discrimination between the Christian students and the native students.

The announcement of this new revised syllabus was made in the Govt. Gazette on 12th January, 1826. English, French, Latin, Greek and Bengali were the languages included in the syllabus.

David drummond was an educationalist in its true sense. He taught his students 'True Kowledge'. He taught his students how to reach the truth through analysis. He taught Derozio

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Insurance Sector

in India

Today's Reality and the Path Ahead



THE INSTITUTE OF COST ACCOUNTANTS OF INDIA

(Statutory Body under an Act of Parliament)



GLOBAL FINANCIAL CRI -A-POST DE CADE STUD OF ITS IMPACT AND RECURRENCE



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Abstract

The importance of the changed regulation due to the Global Financial Crisis (GFC) was always felt. This paper tries to visualise what has changed or what has not changed so far. In the way of changing scenario it also critically examined how the perpetrators are treated who allured the subprimes to cumulate their greed. The paper ends with throwing lights over the possibilities of future crisis with some noted changes in regulation in India's real estate sector.

he importance of the years 2020, as per the opinion of the experts (Roubini and Rosa 2018), is the year of reappearance of financial crisis. This paper re-examined what has changed and what has not changed even after the Global Financial Crisis (GFC) in financial paradigm. With the several burning issues, it also discussed the

process of handling the perpetrators who flouting the rules, allured the subprime lenders and engineered the derivatives to cumulate their lust. Before ending with the possibilities of future crisis, it also highlighted the condition of India after the crisis in brief.

Former UK Prime Minister Gordon Brown said in September, 2018 that world economy was "sleepwalking into a future crisis".

I. Change of Financial scenario of the world

Global growth has recovered since the Global Financial Crisis (GFC) and the recession caused by it. The world is on track for 3.9 per cent growth in 2018 according to IMF(2019).