INTERNATIONAL JOURNAL OF RESEARCH IN COMPUTER APPLICATION & MANAGEMENT



A Monthly Double-Blind Peer Reviewed (Refereed/Juried) Open Access International e-Journal - Included in the International Serial Directories

Indexed & Listed at:

Ulrich's Periodicals Directory ©, ProQuest, U.S.A., EBSCO Publishing, U.S.A., Cabell's Directories of Publishing Opportunities, U.S.A.

Index Copernicus Publishers Panel, Polandwith IC Value of 5.09 &number of libraries all around the world.

Circulated all over the world & Google has verified that scholars of more than 2840 Cities in 164 countries/territories are visiting our journal on regular basis.

Ground Floor, Building No. 1041-C-1, Devi Bhawan Bazar, JAGADHRI – 135 003, Yamunanagar, Haryana, INDIA

CONTENTS

Sr. No.	TITLE & NAME OF THE AUTHOR (S)	Page No.
1.	THE LEADERSHIP PRACTICES OF COMBINED ARMY ACADEMY'S DEAN MATEBE TAFERE	1
2.	ELECTRONIC GROCERY SHOPPING: MODELS AND METHODS FOR THE URBAN CONSUMER DELIGHT AMOL RANADIVE & DR. HRUDANAND MISHRA	6
3.	STUDY ON IMPLEMENTING ASSOCIATION RULE MINING IN PARTICLE SWARM OPTIMIZATION T. BHARATHI & DR. P. KRISHNAKUMARI	10
4.	KEY FACTORS TO DEVELOP WOMEN ENTREPRENEURS IN NELLORE (DT), ANDHRA PRADESH A.M.MAHABOOB BASHA, P.SRI SUDHA & V.MADHAVI	18
5.	LAND USE AND LAND COVER DETECTION FOR THREE DECADES USING GIS AND RS -A CASE STUDY OF ERODE DISTRICT C. LALITHA & DR. S. P. RAJAGOPALAN	21
6.	APPRAISAL OF LIQUIDITY PERFORMANCE IN LANCO INDUSTRIES LIMITED: A CASE STUDY N. K. PRADEEP KUMAR & P. MOHAN REDDY	25
7.	ORGANIZATIONAL CULTURE AS A DETERMINANT OF CUSTOMER SERVICE DELIVERY IN LOCAL AUTHORITIES IN KENYA ROBERT K.W. EGESSA, PETER KIBAS & THOMAS CHERUIYOT	30
8.	EMPLOYEE JOB SATISFACTION: A CASE STUDY ON ONGC DR. MEGHA SHARMA	35
9.	SUPPLY CHAIN MANAGEMENT: A STUDY OF PADDY IN ANDHRA PRADESH DR. I. SAI PRASAD	39
10.	PERFORMANCE APPRAISAL PROCESS AT ANDHRA PRADESH STATE ROAD TRANSPORT CORPORATION (APSRTC) RAKHEE MAIRAL RENAPURKAR & DR. SUDHAKAR B INGLE	44
11.	DETECTION OF BRAIN TUMOR USING THRESHOLDING AND MORPHOLOGICAL OPERATIONS SHRIJA MADHU & T.M.SIRISHA	51
12.	ANTECEDENTS OF CUSTOMER RELATIONSHIP MANAGEMENT AND ITS IMPACT ON CUSTOMER LOYALTY IN BANKING SECTOR V.KRISHNAMOORTHY & DR. R. SRINIVASAN	54
13.	ASSESSMENT OF CUSTOMERS' SERVICE EXPECTATIONS AND PERCEPTIONS IN GEM HOSPITAL: GAPS MODEL V. KANIMOZHI & DR. R. ANITHA	60
14.	IMPACT OF CLOUD COMPUTING ON INDIAN SMEs: ADOPTION, BENEFITS AND FUTURE SCOPE NAZIR AHMAD & JAMSHED SIDDIQUI	64
15.	A STUDY ON THE EFFECTIVENESS OF TRAINING AND DEVELOPMENT PRACTICES ON THE BASIS OF LEVEL OF TRUST, COMMUNICATION AND MORALE OF EMPLOYEES AT LIBERTY SHOES LIMITED DR. VANDANA KHETARPAL & REETI ATREJA	67
16.	A SURVEY OF THE DIMENSIONALITY REDUCTION TECHNIQUES IN DATA MINING: A REVIEW PAPER TARANMEET KOUR, AMITPREET KOUR & DR. SANDEEP SHARMA	73
17 .	AN IMPERATIVE STUDY ABOUT HUMAN COMPUTER INTERACTION: TRENDS AND TECHNOLOGIES DR. ASHU GUPTA & SAKSHI DUA	76
18.	A REVIEW ON THE COST MANAGEMENT STRATEGIES ADOPTED BY AIRLINES GLOBALLY DR. BINDU NAIR	81
19.	APPLICATION OF ARTIFICIAL BEE COLONY ALGORITHM TO INDEPENDENT COMPONENT ANALYSIS AMRESH KUMAR SINGH	84
20.	ACTIVITY BASED COSTING & TRADITIONAL COST ACCOUNTING SYSTEM: A COMPARATIVE STUDY OF OVERHEAD COST ALLOCATION MONIKA KHEMANI	93
21.	E-MARKETING: CHALLENGES AND OPPORTUNITIES RUCHIKA NACHAAL	97
22.	PERFORMANCE EVALUATION OF TURKISH PENSION FUNDS BY USING ELECTRE METHOD HASAN UYGURTÜRK	100
23.	FROM CHANGE MANAGEMENT TO CHANGE READINESS: KEYS TO SUCCESSFULLY IMPLEMENTING CHANGE AJIT KUMAR KAR & LOPAMUDRA PRAHARAJ	108
24.	A STUDY TO MAXIMIZE INTERPERSONAL EFFECTIVENESS TO OVERCOME GENERATION GAP USING AURA AS A TOOL V. VAIDEHIPRIYAL & DR. N. RAMKUMAR	113
25.	APPLICATION OF ROLE OF PROFESSIONAL MARKETING MANAGERS IN A DYNAMIC BUSINESS ENVIRONMENT DR. ABDULSALAM JIBRIL & DR. MUHAMMAD ISA BAZZA	118
26.		122
27.	M-LEARNING CONTEXTS COUPLED WITH CONNOTATION OF 4G CONNECTIVITY B.AYSHWARYA & M.DHANAMALAR	130
28.		133
29.	VIRTUAL LEARNING ENVIRONMENT: ISSUES AND SUGGESTIONS SUNIL KUMAR SHARMA	136
30.	THE IMPACT OF INTEREST RATES ON THE PERFORMANCE OF BANKS: A CASE STUDY OF CANARA BANK AND HDFC BANK MANASA ELURU, SAHLE YEIBIYO ASGHEDE & SHIFERAW MITIKU TEBEKA	139
	REQUEST FOR FEEDBACK	142

CHIEF PATRON

PROF. K. K. AGGARWAL

Chairman, Malaviya National Institute of Technology, Jaipur
(An institute of National Importance & fully funded by Ministry of Human Resource Development, Government of India)
Chancellor, K. R. Mangalam University, Gurgaon
Chancellor, Lingaya's University, Faridabad
Founder Vice-Chancellor (1998-2008), Guru Gobind Singh Indraprastha University, Delhi
Ex. Pro Vice-Chancellor, Guru Jambheshwar University, Hisar

FOUNDER PATRON

LATE SH. RAM BHAJAN AGGARWAL

Former State Minister for Home & Tourism, Government of Haryana Former Vice-President, Dadri Education Society, Charkhi Dadri Former President, Chinar Syntex Ltd. (Textile Mills), Bhiwani

CO-ORDINATOR

DR. SAMBHAV GARG

Faculty, Shree Ram Institute of Business & Management, Urjani

ADVISORS

DR. PRIYA RANJAN TRIVEDI

Chancellor, The Global Open University, Nagaland

PROF. M. S. SENAM RAJU

Director A. C. D., School of Management Studies, I.G.N.O.U., New Delhi

PROF. S. L. MAHANDRU

Principal (Retd.), MaharajaAgrasenCollege, Jagadhri

EDITOR

PROF. R. K. SHARMA

Professor, Bharti Vidyapeeth University Institute of Management & Research, New Delhi

EDITORIAL ADVISORY BOARD

DR. RAJESH MODI

Faculty, YanbulndustrialCollege, Kingdom of Saudi Arabia

PROF. PARVEEN KUMAR

Director, M.C.A., Meerut Institute of Engineering & Technology, Meerut, U. P.

PROF. H. R. SHARMA

Director, Chhatarpati Shivaji Institute of Technology, Durg, C.G.

PROF. MANOHAR LAL

Director & Chairman, School of Information & Computer Sciences, I.G.N.O.U., New Delhi

PROF. ANIL K. SAINI

Chairperson (CRC), GuruGobindSinghl. P. University, Delhi

PROF. R. K. CHOUDHARY

Director, Asia Pacific Institute of Information Technology, Panipat

DR. ASHWANI KUSH

Head, Computer Science, UniversityCollege, KurukshetraUniversity, Kurukshetra

DR. BHARAT BHUSHAN

Head, Department of Computer Science & Applications, GuruNanakKhalsaCollege, Yamunanagar

DR. VIJAYPAL SINGH DHAKA

Dean (Academics), Rajasthan Institute of Engineering & Technology, Jaipur

DR. SAMBHAVNA

Faculty, I.I.T.M., Delhi

DR. MOHINDER CHAND

Associate Professor, KurukshetraUniversity, Kurukshetra

DR. MOHENDER KUMAR GUPTA

Associate Professor, P.J.L.N.GovernmentCollege, Faridabad

DR. SAMBHAV GARG

Faculty, Shree Ram Institute of Business & Management, Urjani

DR. SHIVAKUMAR DEENE

Asst. Professor, Dept. of Commerce, School of Business Studies, Central University of Karnataka, Gulbarga

DR. BHAVET

Faculty, Shree Ram Institute of Business & Management, Urjani

<u>ASSOCIATE EDITORS</u>

PROF. ABHAY BANSAL

Head, Department of Information Technology, Amity School of Engineering & Technology, Amity University, Noida

PROF. NAWAB ALI KHAN

Department of Commerce, AligarhMuslimUniversity, Aligarh, U.P.

ASHISH CHOPRA

Sr. Lecturer, Doon Valley Institute of Engineering & Technology, Karnal

TECHNICAL ADVISOR

AMITA

Faculty, Government M. S., Mohali

FINANCIAL ADVISORS

DICKIN GOYAL

Advocate & Tax Adviser, Panchkula

NEENA

Investment Consultant, Chambaghat, Solan, Himachal Pradesh

LEGAL ADVISORS

JITENDER S. CHAHAL

Advocate, Punjab & Haryana High Court, Chandigarh U.T.

CHANDER BHUSHAN SHARMA

Advocate & Consultant, District Courts, Yamunanagar at Jagadhri

SUPERINTENDENT

SURENDER KUMAR POONIA

1

CALL FOR MANUSCRIPTS

We invite unpublished novel, original, empirical and high quality research work pertaining to recent developments & practices in the areas of Computer Science & Applications; Commerce; Business; Finance; Marketing; Human Resource Management; General Management; Banking; Economics; Tourism Administration & Management; Education; Law; Library & Information Science; Defence & Strategic Studies; Electronic Science; Corporate Governance; Industrial Relations; and emerging paradigms in allied subjects like Accounting; Accounting Information Systems; Accounting Theory & Practice; Auditing; Behavioral Accounting; Behavioral Economics; Corporate Finance; Cost Accounting; Econometrics; Economic Development; Economic History; Financial Institutions & Markets; Financial Services; Fiscal Policy; Government & Non Profit Accounting; Industrial Organization; International Economics & Trade; International Finance; Macro Economics; Micro Economics; Rural Economics; Co-operation; Demography: Development Planning; Development Studies; Applied Economics; Development Economics; Business Economics; Monetary Policy; Public Policy Economics; Real Estate; Regional Economics; Political Science; Continuing Education; Labour Welfare; Philosophy; Psychology; Sociology; Tax Accounting; Advertising & Promotion Management; Management Information Systems (MIS); Business Law; Public Responsibility & Ethics; Communication; Direct Marketing; E-Commerce; Global Business; Health Care Administration; Labour Relations & Human Resource Management; Marketing Research; Marketing Theory & Applications; Non-Profit Organizations; Office Administration/Management; Operations Research/Statistics; Organizational Behavior & Theory; Organizational Development; Production/Operations; International Relations; Human Rights & Duties; Public Administration; Population Studies; Purchasing/Materials Management; Retailing; Sales/Selling; Services; Small Business Entrepreneurship; Strategic Management Policy; Technology/Innovation; Tourism & Hospitality; Transportation Distribution; Algorithms; Artificial Intelligence; Compilers & Translation; Computer Aided Design (CAD); Computer Aided Manufacturing; Computer Graphics; Computer Organization & Architecture; Database Structures & Systems; Discrete Structures; Internet; Management Information Systems; Modeling & Simulation; Neural Systems/Neural Networks; Numerical Analysis/Scientific Computing; Object Oriented Programming; Operating Systems; Programming Languages; Robotics; Symbolic & Formal Logic; Web Design and emerging paradigms in allied subjects.

Anybody can submit the **soft copy** of unpublished novel; original; empirical and high quality **research work/manuscript anytime** in **M.S. Word format** after preparing the same as per our **GUIDELINES FOR SUBMISSION**; at our email address i.e. **infoijrcm@gmail.com** or online by clicking the link **online submission** as given on our website (**FOR ONLINE SUBMISSION, CLICK HERE**).

GUIDELINES FOR SUBMISSION OF MANUSCRIPT

		DATED:
THE EDITOR		
JRCM		
Subject: SUBMISSION OF MANUSCRIPT	IN THE AREA OF	
(e.g. Finance/Marketing/HRM/General M	anagement/Economics/Psychology/Law/Comp	uter/IT/Engineering/Mathematics/other, please specify)
DEAR SIR/MADAM		
Please find my submission of manuscript er	ntitled '	' for possible publication in your journals.
hereby affirm that the contents of this mander review for publication elsewhere.	anuscript are original. Furthermore, it has neith	er been published elsewhere in any language fully or partly, nor i
affirm that all the author (s) have seen and	d agreed to the submitted version of the manusc	ript and their inclusion of name (s) as co-author (s).
	We agree to comply with the formalities as g	iven on the website of the journal & you are free to publish
contribution in any of your journals.	We agree to comply with the formalities as g	iven on the website of the journal & you are free to publish (
contribution in any of your journals. NAME OF CORRESPONDING AUTHOR:	We agree to comply with the formalities as g	iven on the website of the journal & you are free to publish (
contribution in any of your journals. NAME OF CORRESPONDING AUTHOR: Designation:		iven on the website of the journal & you are free to publish o
contribution in any of your journals. NAME OF CORRESPONDING AUTHOR: Designation: Affiliation with full address, contact numbe		iven on the website of the journal & you are free to publish
contribution in any of your journals. NAME OF CORRESPONDING AUTHOR: Designation: Affiliation with full address, contact numbe Residential address with Pin Code:		iven on the website of the journal & you are free to publish
contribution in any of your journals. NAME OF CORRESPONDING AUTHOR: Designation: Affiliation with full address, contact numbe Residential address with Pin Code: Mobile Number (s): Landline Number (s):		iven on the website of the journal & you are free to publish
Also, if my/our manuscript is accepted, ly contribution in any of your journals. NAME OF CORRESPONDING AUTHOR: Designation: Affiliation with full address, contact number Residential address with Pin Code: Mobile Number (s): Landline Number (s): E-mail Address: Alternate E-mail Address:		iven on the website of the journal & you are free to publish

- a) The whole manuscript is required to be in **ONE MS WORD FILE** only (pdf. version is liable to be rejected without any consideration), which will start from the covering letter, inside the manuscript.
- b) The sender is required to mention the following in the SUBJECT COLUMN of the mail:

 New Manuscript for Review in the area of (Finance/Marketing/HRM/General Management/Economics/Psychology/Law/Computer/IT/Engineering/Mathematics/other, please specify)
- c) There is no need to give any text in the body of mail, except the cases where the author wishes to give any specific message w.r.t. to the manuscript.
- d) The total size of the file containing the manuscript is required to be below **500 KB**.
- e) Abstract alone will not be considered for review, and the author is required to submit the complete manuscript in the first instance.
- f) The journal gives acknowledgement w.r.t. the receipt of every email and in case of non-receipt of acknowledgment from the journal, w.r.t. the submission of manuscript, within two days of submission, the corresponding author is required to demand for the same by sending separate mail to the journal.
- 2. MANUSCRIPT TITLE: The title of the paper should be in a 12 point Calibri Font. It should be bold typed, centered and fully capitalised.
- 3. **AUTHOR NAME (S) & AFFILIATIONS:** The author (s) **full name, designation, affiliation** (s), **address, mobile/landline numbers,** and **email/alternate email address** should be in italic & 11-point Calibri Font. It must be centered underneath the title.
- 4. **ABSTRACT**: Abstract should be in fully italicized text, not exceeding 250 words. The abstract must be informative and explain the background, aims, methods, results & conclusion in a single para. Abbreviations must be mentioned in full.

- 5. **KEYWORDS**: Abstract must be followed by a list of keywords, subject to the maximum of five. These should be arranged in alphabetic order separated by commas and full stops at the end.
- 6. MANUSCRIPT: Manuscript must be in <u>BRITISH ENGLISH</u> prepared on a standard A4 size <u>PORTRAIT SETTING PAPER</u>. It must be prepared on a single space and single column with 1" margin set for top, bottom, left and right. It should be typed in 8 point Calibri Font with page numbers at the bottom and centre of every page. It should be free from grammatical, spelling and punctuation errors and must be thoroughly edited.
- 7. **HEADINGS**: All the headings should be in a 10 point Calibri Font. These must be bold-faced, aligned left and fully capitalised. Leave a blank line before each heading.
- 8. **SUB-HEADINGS**: All the sub-headings should be in a 8 point Calibri Font. These must be bold-faced, aligned left and fully capitalised.
- 9. MAIN TEXT: The main text should follow the following sequence:

INTRODUCTION

REVIEW OF LITERATURE

NEED/IMPORTANCE OF THE STUDY

STATEMENT OF THE PROBLEM

OBJECTIVES

HYPOTHESES

RESEARCH METHODOLOGY

RESULTS & DISCUSSION

FINDINGS

RECOMMENDATIONS/SUGGESTIONS

CONCLUSIONS

SCOPE FOR FURTHER RESEARCH

ACKNOWLEDGMENTS

REFERENCES

APPENDIX/ANNEXURE

It should be in a 8 point Calibri Font, single spaced and justified. The manuscript should preferably not exceed 5000 WORDS.

- 10. **FIGURES &TABLES**: These should be simple, crystal clear, centered, separately numbered &self explained, and **titles must be above the table/figure**. **Sources of data should be mentioned below the table/figure**. It should be ensured that the tables/figures are referred to from the main text.
- 11. **EQUATIONS**: These should be consecutively numbered in parentheses, horizontally centered with equation number placed at the right.
- 12. **REFERENCES**: The list of all references should be alphabetically arranged. The author (s) should mention only the actually utilised references in the preparation of manuscript and they are supposed to follow **Harvard Style of Referencing**. The author (s) are supposed to follow the references as per the following:
- All works cited in the text (including sources for tables and figures) should be listed alphabetically.
- Use (ed.) for one editor, and (ed.s) for multiple editors.
- When listing two or more works by one author, use --- (20xx), such as after Kohl (1997), use --- (2001), etc, in chronologically ascending order.
- Indicate (opening and closing) page numbers for articles in journals and for chapters in books.
- The title of books and journals should be in italics. Double quotation marks are used for titles of journal articles, book chapters, dissertations, reports, working
 papers, unpublished material, etc.
- For titles in a language other than English, provide an English translation in parentheses.
- The location of endnotes within the text should be indicated by superscript numbers.

PLEASE USE THE FOLLOWING FOR STYLE AND PUNCTUATION IN REFERENCES:

BOOKS

- Bowersox, Donald J., Closs, David J., (1996), "Logistical Management." Tata McGraw, Hill, New Delhi.
- Hunker, H.L. and A.J. Wright (1963), "Factors of Industrial Location in Ohio" Ohio State University, Nigeria.

CONTRIBUTIONS TO BOOKS

Sharma T., Kwatra, G. (2008) Effectiveness of Social Advertising: A Study of Selected Campaigns, Corporate Social Responsibility, Edited by David Crowther & Nicholas Capaldi, Ashgate Research Companion to Corporate Social Responsibility, Chapter 15, pp 287-303.

JOURNAL AND OTHER ARTICLES

 Schemenner, R.W., Huber, J.C. and Cook, R.L. (1987), "Geographic Differences and the Location of New Manufacturing Facilities," Journal of Urban Economics, Vol. 21, No. 1, pp. 83-104.

CONFERENCE PAPERS

 Garg, Sambhav (2011): "Business Ethics" Paper presented at the Annual International Conference for the All India Management Association, New Delhi, India, 19–22 June.

UNPUBLISHED DISSERTATIONS AND THESES

- Kumar S. (2011): "Customer Value: A Comparative Study of Rural and Urban Customers," Thesis, Kurukshetra University, Kurukshetra.
- ONLINE RESOURCES
- Always indicate the date that the source was accessed, as online resources are frequently updated or removed.

WEBSITES

Garg, Bhavet (2011): Towards a New Natural Gas Policy, Political Weekly, Viewed on January 01, 2012 http://epw.in/user/viewabstract.jsp

VIRTUAL LEARNING ENVIRONMENT: ISSUES AND SUGGESTIONS

SUNIL KUMAR SHARMA RESEARCH SCHOLAR SAI NATH UNIVERSITY JHARKHAND

ABSTRACT

In the era of ICT and Internet it is important to keep pace with rapid changes in the technology that are taking place in the world, especially for developing countries with strong emphasis on the Education sector. For this, changes ought to be introduced in the teaching-learning process. The Use of Internet is becoming an engine of innovation in education. The Internet or indeed ICT and all its interactive elements are able to have an extremely positive impact to the learning potential of students as well as teachers. Virtual Learning Environment (VLE) is a web-based toolkit that facilitates learning through the provision and integration of online teaching and learning materials. This paper shows the concept of virtual learning environment, virtual community, characteristics of present virtual learning environment/classrooms; differentiate with traditional learning environment, demerits and suggestions of VLE, proposed model and some innovative initiatives by the government of India.

KEYWORDS

ICT, VLE, Collaborative Learning, Virtual community, Video Conferencing, e-Library, Virtual Classroom.

INTRODUCTION

s we know the field of Information and Communication Technology is a challenging field. The rapid growth and uses of Internet made in the field of ICT have led to a revolutionary shift in the field of education and training and the Open library plays a vital role. More and more learners/students are taking education via these open sources to relish their dreams. To cater to this large segment of learners, a number of institutions including the virtual institutions have started offering a wide range of courses on the web called web-based education tutorials or online courses or virtual courses. They can access these tutorials any time any where from the web. Thus, it acts as collaborator between the creators and learners of knowledge and formed a global knowledge network. Again the availability of free Open Source Software like ELMS[1] has also brought a drastic change the way how information is delivered and accessible freely. There are a number of universities in India which are working for creating such type of open learning system which can be freely accessed by anyone. Such advancements in ICTs have enabled to provide education by adopting maximum technologies in a Virtual Learning Environment (VLE). Modern library systems are also coming up to deliver their services in such an environment.

VIRTUAL LEARNING ENVIRONMENT (VLE)

A VLE is a virtual classroom that allows teachers and students to communicate with each other online. Class information, learning materials, and assignments are typically provided via the Web. Students can log in to the class website to view this information and may also download assignments and required reading materials to their computers. In a virtual classroom, the teacher may communicate with the students in real-time using video or Web conferencing. This type of communication is typically used for giving lectures and for question and answer sessions. If the teacher only needs to send out a homework assignment, he or she can simply post a bulletin on the class website. The students may also receive an e-mail notification letting them know a new assignment has been posted. If class members have questions about the homework, they can participate in online forums or submit individual questions to the teacher. Virtual learning environments are a popular method of e-learning, which refers to learning through electronic means. While a VLE cannot fully replace the traditional classroom, it can be a useful way of teaching students who reside in many different locations. VLE contains the online learning services. This is a learning platform that organizes and provides access to online learning services for the students, teachers and administrators. In VLE, the learner is at a far off place from the tutor or teacher or instructor. He/She uses some form of technology (obviously internet connected computer) to access the learning resource materials which are webbased and also interacts with the teacher/tutor or instructor and other learners.

VIRTUAL COMMUNITY

A virtual community or online community is a group of people who, initially or basically communicate via the internet, instead of face to face. Virtual community is computer mediated space where there is an integration of content and communication with an emphasis on member-generated content [2]. They usually utilize some type of collaboration software (social networking software) and adopt an appropriate name for their purpose, such as open source communities producing software in open code [3]. The web environment provides a number of opportunities to both the teachers and learners. In the environment, learner gets access and share a wide range of knowledge. They can develop new ways for learning. The web also provides support for high tech learning where teacher acts as a facility provider for the students.

Virtual Learning Environments are diverse n size, capability and service offered. There can be three models of Virtual schools i) Asynchronous, ii) Synchronous and iii) broadcast. According to Russell (2001) in Asynchronous model there is no direct communication between teacher and students, as they do not avail of chat or video conferencing facilities. Synchronous models usually involve more communication and collaboration through video conferencing and live chats. Broadcast models allow students to access lectures or broadcasts on the Internet [4]. All these models offer a wide range of learning flexibility in virtual environments that serve the individual needs of the learners regardless of their age, gender, religion, nationality or disability. Virtual learning with innovative applications of ICT has become today a boon. The University of Delhi set up an Institute of Lifelong Learning (ILLL) with major responsibility towards teacher training, development of learning material and delivery system. There are many other universities and IITs which are also working in the development of Virtual Learning Environment such as Indira Gandhi National Open University (IGNOU), Aligarh Muslim University, Jamia Hamdard University, Delhi University, Hyderabad University IIT Roorkee, IIT Kanpur and many more.

CHARACTERISTICS OF VIRTUAL LEARNING CLASSROOMS

Virtual classroom also needs equivalent equipment and tools in the form of network-based software application to allow a group of instructors and students to carry out the learning process. It facilitates self learning at the learner's convenient time and place. Electronic publication is cheaper and faster. It facilitates faster and cheaper delivery of the material. No physical boundary is required for getting access to virtual learning. Entire universe is the classroom. It enables to update learning materials speedily. The output of virtual teaching-learning process depends upon the factors like students' motivation for self-learning, subject expertise and communication skills of the teacher, on-line problem-solving facility, connectivity to e-library, and use of technology based lightly interactive multimedia, etc.

DEMERITS OF VIRTUAL LEARNING ENVIRONMENT AND SUGGESTIONS

Unlike formal school leaning, virtual learning is a collaborative process and emphasizes on cooperative effort and interactions. The medium of instruction in virtual learning in India is broadly restricted to English and Hindi languages, and occasionally some regional programmes are being telecasted. It would take some time to develop the software for teaching-learning in vernacular languages.

Basically, there are four principles to be kept in mind for successful teaching in the virtual classroom i) media richness, ii) timely responsiveness, iii) organization and iv) interaction.

In the traditional classroom learning environment, a pleasing voice, occasional jokes, dramatic gestures, eye contact with the teacher and the classroom interaction can help to bear a long lecture. But in virtual classrooms, there is only the computer screen and the printed pages. Even if the multimedia is there, long segments of lecture-type materials are boring. Hence, in order to maintain interest, the instructor should use written language in a skillful way by putting some humour and metaphors. It is better to active participation by the students and stimulate collaborative assignments that involve both social and task-oriented activities. The instructor should deliver small segments of lecture with print/pre-recorded materials accompanied with opportunities for students' participation. Secondly, unlike the traditional classrooms, the students in the virtual classroom will not receive an immediate response to their questions and comments. This can be very frustrating, especially if they are unable to solve a mathematics problem or project assignment in the middle. In this case, in order to encourage the students, the instructor can promote more active participation / interaction and provide the feedback to students in the virtual classroom more frequently/daily. Thirdly, unless the study materials of online courses/virtual classrooms get organized, students will become very confused. Therefore, the instructor must establish regular rhythms and schedules, based on dividing the course into modules which last a week, a week and half, or two weeks each so that the participants can plan ahead in terms of when they will need to sign online and when work will be due, and so that the group moves through the topics in an orderly manner.

Another strategy is for the instructor to enter the stimulus materials for each week's work on a regular basis, with new material predictably appearing at least twice a week. The most significant determinant of the students' satisfaction in the online courses/virtual classrooms is the amount and quality of interaction between the instructor and the students, and/or among the students. Collaborative learning is encouraged in case of virtual classrooms which emphasize group / cooperative efforts among faculty and students. In this context, knowledge is viewed as a social construct, and therefore, the educational process is facilitated by social interaction in an environment that facilitates peer interaction evaluation and cooperation [5, 6]. The "teacher" becomes primarily a facilitator who structures learning opportunities, serves as a resource, and encourages the students to work together to build a common body of knowledge. The virtual classroom/learning environment not only facilitates collaborative learning but also supports independent learning and generative, active learning techniques that are self-paced by each participant. Besides these, there are other drawbacks of virtual Learning Environment like:

- The teacher is not present physically. Thus, virtual classroom lacks the human touch. The virtual students seem more frustrated, not only from the technology but from the inability to ask the teacher questions in a face-to-face environment. As the virtual learning environment lacks human face-to-face interaction, critics are of the opinion that probably it has a long-term effect on the children's emotional development and interpersonal relationship when they would be grown up as adults in society.
- It is thought that children will miss out on the important friendships that are usually formed in traditional schools and this will lead to poor social skills in adulthood. Virtual classrooms are suitable for higher learning only, not for primary level children. For availing the facilities of virtual learning the learner has to be matured, self-motivated, computer literate and well versed with the components of virtual classroom. Primarily the teacher in the virtual classroom follows the Lecture-cum-demonstration method with multi-media use which is suitable for higher level courses.
- It is not suitable for lab-based and activity oriented courses. There is no scope for testing the entry level behaviors; thus a teacher cannot judge the degree of disparity among students.
- Also the differences in learning styles and ranging aptitude levels would result in further discrepancy.
- In a virtual classroom set up, the role of a teacher is significant but students' response is secondary. Hardly the teacher does have the scope to get an immediate feedback regarding his teaching.
- There is little scope for direct teacher-student intervention and two-way communication. The factors, like subject expertise, communication skill, expression through body language, personality, skill of holding students' interest and attention play a very crucial role in virtual learning and the success of the programming course primarily depends on these factors.

PROPOSED VIRTUAL LEARNING ENVIRONMENT MODEL

To boost the ICT based Virtual Learning Environment Education it is essential to adopt:

- Intensive and rigorous short term training courses.
- Continuing education programme.
- Workshops/conference/seminars.
- In-service training.
- Project based learning.
- Computer assisted instruction.
- Creation, storage and access the learning resources.
- Lesson planning and assessment.
- Manage access to learner's information and resources and also tracking of progress and achievement.
- Communication with learners via emails, notices, chat, blogs.
- Self assessment quizzes.
- Formal assessment functions such as examination, presentation of projects etc.
- Provision for necessary hyperlinks to create a unified presentation to the students.
- Interaction in vernacular language
- Integrate heterogeneous technologies and multiple pedagogical approaches.
- Upgradation of teachers' skills in developing and delivering the course content through networks.
- Developing intelligence learning technology by having self teaching guides or do it yourself series.

SOME INITIATIVES IN VLE BY IGNOU IN INDIA

E-GYANKOSH

It is a digital repository initiated by IGNOU to enhance the accessibility of knowledge to share its valuable resources with educational institutions and learners internationally. This national Digital Repository acts as a podium to store, index, preserve and share the digital learning resources developed by the Open and Distance Learning Institutions in the country [7].

GYAN DARSHAN

A satellite based TV channel devoted to educational and developmental needs of the society [8].

NODLINET (NATIONAL OPEN AND DISTANCE LEARNERS' LIBRARY AND INFORMATION NETWORK)

The Library and Documentation Division of IGNOU has started giving efforts to take higher education to the doorsteps of the hitherto un-reached through its various modes of Information and Document Delivery Services [9].

IUC-TFFFD

Inter University Consortium for Technology-Enabled Flexible Education and Development (IUC-TEFED) is the latest initiative of IGNOU which works as a nodal point to undertake all types of collaborative activities involving Open and Distance Learning, e-learning new knowledge creation, appropriate technology, etc. [10].

CONCLUSION

As an impact of the globalization and ICT revolution as well, there is generally an agreed implication that education and training should go in the tune of the same. Virtual Learning schools all over the world, as such, are accepting the new technologies. In this regard, India is lagging behind in comparison with other advanced counties like, US, UK, etc. The establishment of the Indian Training and Education Network for Development (INTEND) by the Ministry of Human Resource Development, Government of India is a good approach of the government. The initiatives taken up by IGNOU and other Universities are a good signal in the country. The future of virtual learning environments has many innovative and exciting possibilities. At the same time adventures in learning call for creative and potent environments where individuals share meaningful knowledge and experiences in constructing new information and ideas. These adventures foster mutual collaboration that allows learners to apply newly acquired learning in the design of insightful, cognitive processing without detachment/ obscurity from real-life situations. A judicious blend of both traditional and virtual learning environment with special attention to students' needs and satisfaction can create constructive and creative learners, teaching community and learned society. The use of new ICT by the Indian Schools/Universities should be encouraged to produce professionals to manage knowledge resources in the VLE.

REFERENCES

- 1. Bruffee K. A. (1984), Background and History to Collaboration Learning in American Colleges, College English 46, 7, 635-652
- 2. Chesbrough, H.W.and D.J.Teece (1996). When is virtual virtuous? Harvard Business Review.1; 65-7 3.
- 3. Hagel, J., & Armstrong, A. (1997). Net gain: Expanding markets through virtual communities. Boston, MA: Harvard Business School Press.
- 4. http://www.egyankosh.ac.in, accessed on 09/04/2013.
- 5. http://www.ignou.ac.in/ignou/aboutignou/icc/iuc/introduction, accessed on 09/ 04/2013
- 6. http://www.ignou.ac.in/NODLINET/aboutnodlinet, accessed on 09/04/2013
- 7. http://www.ignouonline.ac.in/Broadcast, accessed on 09/04/2013.
- 8. http://www.openelms.org/ accessed on 09/04/2013.
- 9. Russell, G. (2001) Virtual schools and educational futures. Educational Technology November-December.
- 10. Whipple W. R. (1987), Collaborative Learning: recognizing it when we see it, Bulletin of the American Association for Higher Education 40, 2, 3-7.



REQUEST FOR FEEDBACK

Dear Readers

At the very outset, International Journal of Research in Computer Application and Management (IJRCM) acknowledges & appreciates your efforts in showing interest in our present issue under your kind perusal.

I would like to request you to supply your critical comments and suggestions about the material published in this issue as well as on the journal as a whole, on our E-mailinfoijrcm@gmail.com for further improvements in the interest of research.

If youhave any queries please feel free to contact us on our E-mail infoijrcm@gmail.com.

I am sure that your feedback and deliberations would make future issues better – a result of our joint effort.

Looking forward an appropriate consideration.

With sincere regards

Thanking you profoundly

Academically yours

Sd/-

Co-ordinator

ABOUT THE JOURNAL

In this age of Commerce, Economics, Computer, I.T. & Management and cut throat competition, a group of intellectuals felt the need to have some platform, where young and budding managers and academicians could express their views and discuss the problems among their peers. This journal was conceived with this noble intention in view. This journal has been introduced to give an opportunity for expressing refined and innovative ideas in this field. It is our humble endeavour to provide a springboard to the upcoming specialists and give a chance to know about the latest in the sphere of research and knowledge. We have taken a small step and we hope that with the active cooperation of like-minded scholars, we shall be able to serve the society with our humble efforts.







