

**Management Education & Research Institute (MERI)
Janak Puri, New Delhi - 110058**

APRENDEMOS – 2015

Proceedings of the 15th National IT Seminar on “Cyber Security – Issues and Challenges” Jointly Organized by MERI, Janak Puri, New Delhi and Computer Society of India, Delhi Chapter, Delhi on 10th October 2015

Venue: Auditorium, MERI Campus, 53-54 Institutional Area, Janak Puri, New Delhi

APRENDEMOS is a Spanish word for “Lets Learn”. Under the banner of APRENDEMOS MERI, Janak Puri, New Delhi organizes National Seminars on IT to continue its efforts to peek into the future of the IT Industry. The first National Seminar on IT was organized in 2001 and was graced with the presence of Mr. (Late) Kiran Karnik, the Former President, NASSCOM and thereafter, it is being organized and graced with eminent dignitaries every year to explore the emerging IT related topics. In the series, the 15th National IT Seminar on “Cyber Security – Issues and Challenges” was jointly organized by MERI, Janak Puri, New Delhi and Computer Society of India, Delhi Chapter, Delhi on 10th October 2015. The seminar was convened and coordinated by Dr. R. C Goyal, Dean-IT; Mrs. Ritu Aggrawal, MCA-Coordinator, MERI and Mr. Sumit Chauhan, Faculty, MERI. The seminar event was managed by the MCA students of MERI College.

Cyber Security – Issues and Challenges:

Internet is the primary computing platform for our day to day activities may be through, Standalone apps, Web-based apps and/or Cloud computing. The most frequently used computer applications these days includes Gaming, Search engines, Emailing, Texting, Facebook, LinkedIn, Twitter, Amazon, eBay, Word processors, Wikipedia, Google maps, Google Docs, SkyDrive, Google Drive, Evernote, Web browsers (HTTP)...largely becomes the Cyber Space.

For securing the cyber space, issues related to Cyber Security leads to major challenges for everybody in the world. For effectively facing the challenges, require not only innovations, but also collaborations among all communities (government, military, police, intelligence, legal, law enforcement, industries, academia, and the general public). Universities and Colleges play a central role in creation and strengthening the solution by producing the human workforce, R&D, and other related services.

Moreover, in addition to the cyber security challenges, the cyber-crimes impose a number of direct cost and indirect cost on the global organizations including that of financial assets, loss of intellectual property, violation of confidential information, cost of data recovery and damage to company reputation etc.

Management Education & Research Institute (MERI) Janak Puri, New Delhi; Computer Society of India, Delhi Chapter, Delhi; and Cyber Peace Foundation, Jharkhand have initiated a step towards integration and sharing platform for cyber security solutions.

Participation in the National Seminar:

S.No	Organisations	No. of Participants
1.	CSI & CSI Delhi Chapter (Management Committee office bearers and other members)	19
2.	Other Colleges/Institutes	11
3.	Faculty MERI-CET	4
4.	Faculty MERI-College	17
5.	Students MERI-CET	84
6.	MCA Students MERI-College (approx.)	180
7.	Students from other Colleges (approx.)	20
8.	Total Participation	325

Participation List:

1. CSI & CSI Delhi Chapter (Management Committee office bearers and other members)

S.No	Name	Organization	Phone No.	Email-ID	CSI Identity
1	Sh. G.I.S Chauhan	Superannuated	9717302437	gisc.delhi@gmail.com	I0011095
2	Sh. V.K Gupta	Hony Secretary CSI Delhi Chapter	9810135561	vijay_gupta_m@gmail.com	9911378797
3	Sh. Rajeev Kumar Sethi	CSI	9811619367	sethi.rajeevkumar@gmail.com	015029
4	Lt.Col Rajeev Chauhan	Deefence	9953774868	r13chauhan@gmail.com	1180505
5	Sh. Sumit Bhatt	University	8750599012	sumit.sharma83@gmail.com	I1500506
6	Sh. Yudhishter Sharma	Chairman CSI Delhi Chapter	8860193372	yudhishtersharmasj@gmail.com	60455
7	Dr. U C Sud	Director, IASRI, PUSA, New Delhi	25841479	Director.iasri@icar.org.in	
8	DR.R.C Agarwal	Reg. General PPV FRA, New Delhi	989900885	rg-ppvfra@nic.in	133601
9	Sh. A.K Sinha	Ind. Consultant	9811633531	anilsinha@line.com	7884
10	Dr. Sudeep Marwaha	IASRI, PUSA, New Delhi	8860415452	sudeep@iasri.res.in	
11	Sh. Akashdeep Singh	DCE, Gurgaon	9971054895	akashs019@gmail.com	
12	Sh. Ankit Sharma	DCE, Gurgaon	8506075445	ankit96sharma96@gmail.com	

13	Dr.Alka Arora	CSI,Delhi Chapter IASRI, New Delhi	9811038150	alkak@iasri.res.in	
14	Dr.Rashmi Jha	Gitarattan International Business School, Rohini	9968523303	rashmijha1909@g mail.com	0014012
15	Sh. Ritesh Bhardwaj	CSI, Delhi Chapter	9953818880	riteshbhardwaj91 @gmail.com	
16	Sh. Vijay Kumar Bansal	Vicrosoft Corp	9899754701	vicor- soft@yahoo.com	2387
17	Dr..Subhan Khan	Mewat Development Society(MDS)	9811024504	dsurbhankhan@g mail.com	15634
18	Dr. Nitu Agarwal	Member CSI MC Delhi Chapter, DR DO, New Delhi			
19	Sh. Shiv Kumar	Vice President Region –I CSI	9818168337	shivk1464@gmail. com	---

2. Other Colleges/Institutes participation list:

S.No	Name	Organization	Phone No.	Email-ID
1	Sh. H.N Tiwari	Indian Air Force	8503890027	india_harish07@yahoo.co .in
2	Sh. R.K Singh	Indian Air Force	9310152887	muksha50@gmail.com
3	Sh. A.K Pandey	Indian Air Force	9654032257	aruniat786@gmail.com
4	Lt. Vineet Kumar	Cyber Peace Foundation	9570000065	president@cyberpeacefou ndation.org
5	Sh. Rotit Kashmira	Indian Air Force	8826919406	rashmira.rohit@gmail.co m
6	Sh. Vinay Pandey	AIIMS, New Delhi	9868873025	vinaypande@yahoo.com
7	Sh. G.L Manchanda	EX – PNB	9818365500	glmanchanda@gmail.com
8	Ms. Rajni Grover	IASRI, New Delhi	9910615818	rgrover@iasri.res.in
9	Sh. S.N. Islam	IASRI, New Delhi	9868314499	sni@iasri.res.in
10	Sh. Dimple Chawla	DIAS, New Delhi	9868446445	chawladel@gmail.com
11	Sh. Deepak Sharma	BPIBS, New Delhi	9953178009	deepak@gmail.com

3. Faculty from MERI-CET

S.No	Faculty Name	College	Contact Number
1	Sh. Himanshu Kaushik	MERI -CET	9212207830
2	Ms. Preethi Dolly	MERI -CET	8743943053
3	Ms. Rimpay Singhla	MERI -CET	9416756871
4	Ms. Sneha Pratap Singh	MERI -CET	8447023683

Schedule of the National Seminar:

The National Seminar was organized as per the following schedule:

10-10-2015	Saturday
09.30 – 10.00	Registration
10.00 – 10.45	Inaugural Session <ul style="list-style-type: none"> • Lightening of Lamp • Felicitation of Guests: Floral welcome with bouquet presentation to all dignitaries on the dais by the students of MERI College • Welcome Address by Sh. I.P. Aggarwal, Founder President, MERI College • Inaugural Address by Chief Guest Prof. Arvind Kumar, Vice-Chancellor, Rani Lakshmi Bai Central Agricultural University, Jhansi • Address by the Guest of Honour Sh. Shiv Kumar, Vice President Region – I, CSI & Sh. Yudhister Sharma, Chairman, CSI, Delhi Chapter • Vote of thanks by Prof. Y. L. Grover, Director General, MERI
10.45 – 11.00	Tea break
11:00 – 12:15	Technical Session I <ul style="list-style-type: none"> • Deliberations by Eminent Invited Speaker Lt Vineet Kumar, President, Cyber Peace Foundation, Ranchi, Jharkhand.
12:15 – 13:15	Technical Session II <ul style="list-style-type: none"> • Deliberations by Eminent Invited Speaker Sh. Ravi Vijayvargiya, Sr. Technical Director & HoD, NIC(Hq), N. Delhi
13:15 – 14:00	Lunch Break
14:00 – 15:15	Technical Session III <ul style="list-style-type: none"> • Deliberations by Eminent Invited Speaker Dr. R.C. Agrawal, ARS, Registrar General, Protection of Plant Varieties & Farmers Rights Authority, Govt of India, New Delhi
15:15 – 15:30	Tea break
15:30 – 16.45	Technical Session IV <ul style="list-style-type: none"> • Inter College IT Quiz
16:45 – 17:00	<ul style="list-style-type: none"> • Valedictory Programme • Prize & Certificate Distribution • Vote of Thanks

10-10-2015 Saturday

Inaugural Session:

After the registration of participants, Inaugural Function of the 15th National IT Seminar on “Cyber Security – Issues and Challenges” was arranged in the Auditorium of MERI College. After welcome of the chief guest, eminent dignitaries and all guests witnessing the event; lightening of lamp was performed by the chief guest and other dignitaries.

Sh. I.P. Aggarwal, Founder President presided over the inaugural function. Prof. Arvind Kumar, Vice- Chancellor, Rani Lakshmi Bai Central Agricultural University, Jhansi was the Chief Guest along with other dignitaries Prof. Lalit Aggarwal, Vice President & Director, MERI; Prof. Y. L. Grover, Director General MERI; Sh. Shiv Kumar, Vice President Region – I, CSI; Sh. Yudhister Sharma, Chairman, CSI, Delhi Chapter and Dr. R.C. Goyal, Dean(IT) MERI were present on the dais. To convey emotions, all dignitaries on the dais were felicitated with bouquet presentation by the students of MERI College. On behalf of MERI Group of Institutions Sh I. P. Aggarwal, Founder President welcomed the chief guest and all the dignitaries present in the auditorium and narrated the importance and necessity of Cyber Security for the society.



The Chief Guest, Prof. Arvind Kumar, Vice-Chancellor, Rani Lakshmi Bai Central Agricultural University, Jhansi inaugurated the seminar. Prof. Kumar highlighted various issues and expressed that IT is becoming a necessity to provide latest technology to everybody in the world. Flow over sophisticated cyber-attacks are on rise, targeting social networking and institutional sites, corporations and financial institutions, besides attacks on intellectual property, sensitive data media outlets /de-facing organizations. The valuable asset is increasingly under attack affecting the business network and also putting national and economic security at risk. The recent survey of corporates by Lloyd’s of London found that cyber-crime ranked 3 among the risk contributing global businesses. NATO has included cyber space as the fifth domain of war in the organization Article V, clause on collective defense.

He also narrated that the growth of cyber-crime is due to global diffusion of the Internet with hi-speed broadband system, the ascent of mobile technology and cloud computing which has expanded the volume of sensitive business and information and the growing technological sophistication of cyber, cyber-attacks and have no physical boundaries. Often it is difficult to detect and respond timely for which efficient security system are needed to pre-empt or withstand these attacks.

He opined that Cyber-attacks can be minimized through International legislations against such crime, enhance Research and Development and reforms in Federal information management act of 2002. There is also need of public awareness and education to adapt essential internet security practices and to ensure protect against attacks. The cybercrime cost is highest in Germany and the cyber-crime is also growing in emerging economies where Internet penetration is rising with weak regulatory and legal structures. The Global annual cost of cyber-crime may be 15-20 % of the value of Internet related business worldwide. But the actual economic costs may be still higher due to under-reporting of cyber-attacks. The cyber-crime also creates major commercial opportunities for providers of cyber products and services. The market for cyber security has been estimated to be about 58 billion dollars. This includes equipment, consulting services, policy supports, web management, Internet firewalls, forensic analysis and human resource management and governance to cope up with the mounting cyber threat. In the years to come adequate investments are therefore needed for the cyber security and management including capacity building programmes in this area.



After inaugural address of the Chief Guest, Sh. Shiv Kumar, the Guest of Honour & Vice President Region – I, CSI, addressed the participants and explained the role of CSI in development of IT. He emphasised that everyone should be the member of CSI to join hands to meet the challenges of Cyber Security. Since 2015 is the Golden Jubilee year of the Computer Society of India (CSI) and the 50th Golden Jubilee Annual Convention is being organized by CSI Delhi Chapter during 2-5 December 2015 at India International Center New Delhi. He invited and requested to participate in the 50th Golden Jubilee Celebrations.

Sh. Yudhister Sharma the Guest of Honour & Chairman, CSI, Delhi Chapter thanked the MERI management for jointly organising the National Seminar and suggested to have similar activities in the future and also requested to join 50th Golden Jubilee Celebrations of CSI being organised by CSI, Delhi Chapter in Delhi.

Sh. I.P. Aggarwal, Founder President, MERI felicitated with a memento to Prof. Arvind Kumar, Chief Guest of the function. Prof. Lalit Aggarwal, Vice President & Director, MERI felicitated Sh. Shiv Kumar, the Guest of Honour & Vice President Region – I, CSI and Prof. Y. L. Grover, Director General MERI felicitated Sh. Yudhister Sharma, the Guest of Honour & Chairman, CSI, Delhi Chapter with a memento.



Prof. Y. L. Grover, Director General MERI proposed a vote of thanks and invited the participants to join over a cup of tea.



Technical Session I: Deliberations by Eminent Invited Speaker Lt Vineet Kumar, President, Cyber Peace Foundation, Ranchi, Jharkhand.

Keeping in view the Make in India program of Sh. Narinder Modi, Prime Minister of India, Lt Vineet Kumar, former CTO & Head, Cyber Defence Research Centre (CDRC), Jharkhand Police delivered his interactive session where in broadly the Cyber threats, Cyber Defence & operations, Case studies & Advisories were covered.



He discussed major terminologies like Vulnerability, Honeypot, Botnet (Bot + net) – Malicious Programs Vulnerability and Hacker VS Cracker in his talk. He demonstrated about, How Cyber Criminals Hack in? All the general steps that a hacker adopts; like he Locate the victim host by some scanning program; Identify the victim host vulnerability; Attack the victim host via this vulnerability and after break-in, use this victim host to hack or attack other network. He discussed various real case studies and also demonstrated about hacking at ATM machines.

He expressed that Hackers have lots of knowledge & experience and they are good guy and have strong ethics, never indulges in crime and catches the computer criminals where as Crackers have lots of knowledge & experience, but they are bad guys have low ethics and mostly indulges in Crime. . The Crackers are Computer Criminals. Finally, he advised the students that they may opt for cyber security for their career.

Technical Session II: Deliberations by Eminent Invited Speaker Sh. Ravi Vijayvargiya, Sr. Technical Director & HoD, Network Security Division, NIC(Hq), N. Delhi

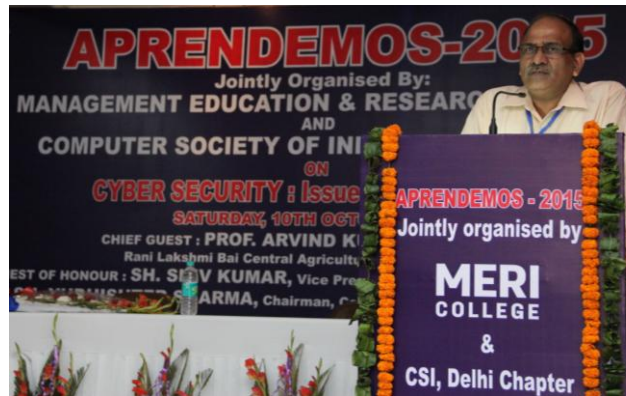
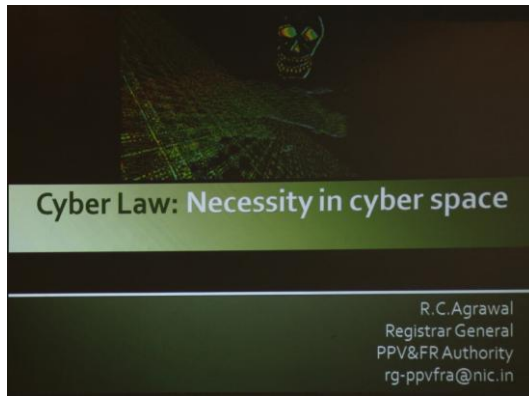
Shri Ravi Vijayvargiya who is a Cyber Security expert with graduation in Electronics engineering and post-graduation in Digital Communication engineering, delivered an interactive talk on Security Concerns for Student Community. He explained how the students and the youth together represent the largest user segment of the Internet in the country. The major cyber security concerns, this particular user segment must pay attention to, are pertaining to privacy, system infection and malware distribution. How loss of privacy and system compromise may affect the students was described. Social networking sites thrive upon millions of people voluntarily divulging accurate personal information. Lack of awareness may lead to compromise of the systems and malware distribution. The measures for safer browsing of Internet, password security and mobile security were also deliberated upon. During interaction the students raised several issues regarding malware.



Technical Session III: Deliberations by Eminent Invited Speaker Dr. R.C. Agrawal, ARS, Registrar General Protection of Plant Varieties & Farmers Rights Authority, Ministry of Agriculture, Govt of India, New Delhi

Dr. R.C.Agrawal, who is an IT expert and has PG Diploma in Cyber Law from Indian Law Institute, Delhi delivered talk on Cyber Law: Necessity in cyber space.

He described cyber law as that branch of law that deals with legal issues related to use of inter-networked information technology and briefly can be also known as that law which governs computers and the internet. The knowledge of Cyber Law becomes more important in today's world as the Internet has entered in everybody's day-to-day life and the use of Internet for e-commerce is increasing through a geometric progression.



With the increased use of Internet, many kinds of Cyber crimes like Stalking, Frauds, Pornography, Cyber Squatting have also evolved. The Indian Parliament passed Information Technology (IT) Act, 2000 in order to keep pace with the changing requirement for dealing with cyber crimes and to provide legal recognition for transactions carried out by means of electronic data interchange and other means of electronic communication, commonly referred to as "electronic commerce". This Act also facilitates electronic filing of documents with the Government agencies. He also discussed about the IT Act Amendments 2008 and some case studies of Cyber Crimes, the various provisions of Cyber Contraventions and Cyber Offences.

Technical Session IV: Inter College IT Quiz

In the Inter College IT Quiz, 9 teams of students from the following institutes/colleges participated:

1. Bhai Parmanand Institute of Business Studies, Opp. Madhuban Colony, Near Vikas Marg, Shakarpur, New Delhi – 110092
2. Ch. Brahm Prakash Government Engineering College, Jaffarpur, New Delhi, Delhi 110073
3. Delhi Institute of Advanced Studies Plot No 6, Sector-25, Rohini, New Delhi - 110085
4. Jagan Institute of Management Studies, 3, Institutional Area, Sector-5, Rohini, New Delhi-110085
5. Lal Bahadur Shastri Institute of Management, 11/07, Near Metro Station, Sector 11, Dwarka, New Delhi, Delhi-110075
6. Maharaja Surajmal Institute Of Technology, C-4 Janak Puri, New Delhi, Delhi 110058
7. Management Education & Research Institute, 53-54 Institutional Area, Janakpuri, New Delhi, Delhi 110058
8. MERI College of Engineering and Technology, Asanda Bahadurgarh (near Sampla), NCR Delhi, Haryana 124501
9. Shri Guru Tegh Bahadur Institute of Management and Information Technology, 24, Gurdwara Nanak Piao Campus G.T. Karnal Road, New Delhi - 110033

Inter College IT Quiz was arranged for all the 9 teams to participate simultaneously. The quiz was organized for the following 5 rounds:

- Round 1: Current Affairs
- Round 2: Language Based (C, C++, Java)
- Round 3: Subject Based (SE, DBMS , OS, Networking)
- Round 4: Cyber World
- Round 5: Puzzles Round



Result of Inter College IT Quiz:

1. First Prize, a cash prize of Rs.1500 – won by team of the MERI College of Engineering and Technology, Asanda Bahadurgarh (near Sampla), NCR Delhi, Haryana
2. Second Prize, a cash prize of Rs.1000 – won by team of the Jagan Institute of Management Studies, 3, Institutional Area, Sector-5, Rohini, New Delhi, Delhi 110085
3. The students participated in the quiz were honored with a participation certificate.

Valedictory Programme:

In continuation, after the Technical Session IV, the Valedictory Programme of the APRENDEMOS-2015 was organized in presence of all students and faculty in the Auditorium.

Prof. Y. L. Grover, Director General, MERI distributed the participation certificates to the participants from CSI, Delhi Chapter and other institutes/colleges.



Dr. Nitu Agarwal, Member MC, CSI, Delhi Chapter & Scientist E, DRDO, Matcafe House, New Delhi distributed Certificates of Appreciations to the student volunteers involved in organizing the seminar.

Dr. R.C. Goyal, Dean (IT) felicitated the winner teams of Inter College IT Quiz with Bouquets, Certificates and Cash Prizes and honoured the students who participated in the quiz with a participation certificate. He thanked all concerned individuals and the MERI college management for providing the necessary support. Finally, he thanked the management of CSI & CSI Delhi Chapter for jointly organizing and providing technical support for successful conduct of the APRENDEMOS-2015.

(R C Goyal)
Prof. & Dean(IT), MERI

(Prof. Lalit Aggarwal)
Director, MERI College