# *Nouvelle Liberation*

Department of Computer Applications
Chitkara University Institute of Engineering & Technology
Chitkara University, Punjab

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| **Newsletter**<br><br>**June, 2024** | |
| This newsletter has been edited and published by the Department of Computer Applications, Chitkara University, Punjab, India | |
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# Critical Thinking on ISTQB Foundation Level chapter series (Chapter-5)
# April 11, 2024

The CSI Student Chapter, under the aegis of Department of Computer Applications, arranged a thought-provoking "Expert Talk on Innovation in App Development using Flutter." The distinguished Founder of Zansh, Gauraansh, served as the talk's resource. Gauraansh informed the audience about the advantages of using Flutter, a ground-breaking cross-platform app development framework created by Google, during the expert talk. He gave a fascinating talk that clarified the always changing subject of app development, pointing out different approaches to the craft and offering advice to the students on how to get started. Gauraansh demonstrated how to create a simple Flutter app in a live presentation, giving attendees a hands-on learning opportunity. The expert discussion came to a successful end, giving the students the information and drive to learn more about the field of Flutter app development.
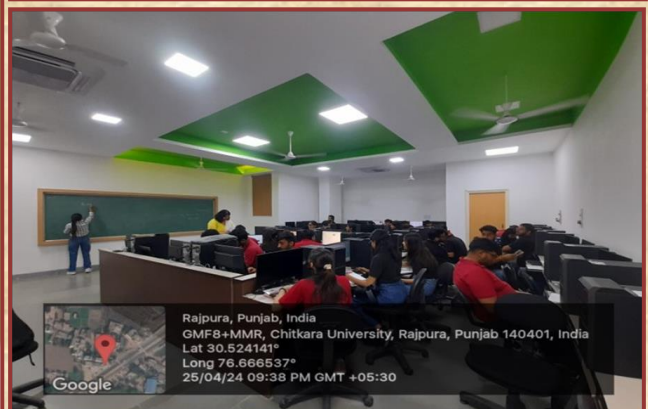
# Workshop on Innovations in Data Management
# April 25-26, 2024

A two-day workshop on innovations in data management was organised by the Department of Computer Applications' CSI Student Chapter. Dr. Deepika Chaudhary, a professor in the department of computer applications at Chitkara University in Punjab, served as the workshop's resource person. The resource person discussed methods, tools, and techniques for managing data in an effective and efficient manner. In addition to discussing cloud-based solutions, distributed databases, and advancements in data processing techniques like machine learning algorithms for predictive analytics and real-time data processing frameworks, she also talked about data storage solutions like databases and provided hands-on experience on data lakes to processing frameworks like Hadoop and Spark. She underlined that the need to successfully use data to produce corporate value and obtain competitive advantages is what propels innovation in data management.

## Testathon Competition: Project Testing and Innovation
## April 11-12, 2024

The Software Testing Club of the Department of Computer Applications at Chitkara University in Punjab organised the "Testathon Competition: Project Testing and Innovation" on April 11-12, 2024. The students had the chance to improve their critical thinking, problem-solving, and teamwork skills in a supportive yet competitive setting during the Testathon. It also provided a forum for students to practise applying their theoretical testing knowledge to real-world problems, which encouraged creativity and innovation. Students executed the projects using creative approaches and careful analysis to identify any faults. Students produced test reports and problem reports while working in teams to develop various kinds of test cases. The kids had the chance to improve their critical thinking, problem-solving, and teamwork skills in a supportive yet competitive setting during the Testathon. It also provided a forum for students to practice applying their theoretical testing knowledge to real-world problems, which encouraged creativity and innovation. Students executed the projects using creative approaches and careful analysis to identify any faults. Students produced test reports and problem reports while working in teams to develop various kinds of test cases. Dr. Rupinder Singh, Dr. Jaswinder Singh, and Dr. Nishu Bali have evaluated the students' work products.

# Venture Across Borders: Entrepreneurship and Tech Talk
# March 18, 2024

The Department of Computer Applications and the IIC jointly arranged a discussion session titled "Venture across Borders, Entrepreneurship and Tech talk" on March 18, 2024. The resource person, Divyansh Chauhan, CEO of TOWAIS pvt. Ltd., shared his inspiring and motivational path with those interested in entrepreneurship, strategy, and tech-tips. He offered his opinions on how tech researchers ought to conduct their work in order to manage successful innovations. India has seen a massive increase in the number of technologies in recent years. The goal of the session was to foster an entrepreneurial and tech-savvy culture among the university's student body. Students left the seminar with a greater sense of motivation and knowledge about entrepreneurship and how to develop creative and practical concepts. The session's goal was to disseminate knowledge about successful entrepreneurs in order to identify solutions.
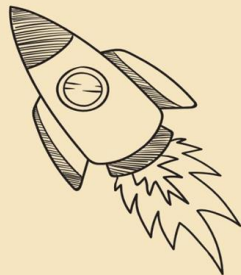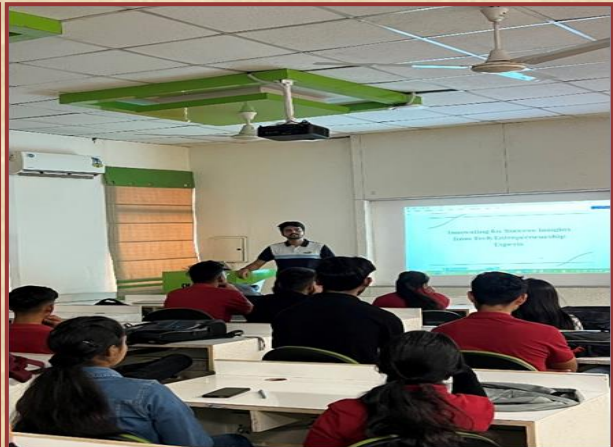
# Session on Next-Gen Cyber Defenders: Kickstarting your Innovative Career in Cybersecurity
## March 23, 2024

The "Next-Gen Cyber Defender: Kickstarting Your Innovative Career in Cybersecurity" session, which was organised by the Alumni Connect Team in collaboration with the Department of Computer Applications and IIC, took place on March 23, 2024, in Pierre Hall at Chitkara University Punjab. The goal of the event was to equip aspiring cyber defenders for the constantly changing cybersecurity landscape. Remarkable speakers Mr. Atinder Mann, Mr. GeetikNarula, and Mr. Jatinder Mann discussed cybersecurity innovation. The audience was captivated by Mr. Atinder Mann and Mr. GeetikNarula's comment, "Cyber security success is driven by innovation."Participants participated in useful workshops and conversations where they learned about new trends and industry best practices. After the talk, participants were motivated and prepared to start their careers as creative cyber defenders. The occasion served as a reminder of the value of creativity, teamwork, and lifelong learning in determining the direction of cyber security.

## Faculty Development Program on Introduction to Immersive Experience
## May 21-23, 2024

On May 21–23, 2024, the Department of Computer Applications at Chitkara University in Punjab hosted a three-day Faculty Development Programme on "Introduction to Immersive Experience" under the auspices of RISE.Dr. Jaiteg Singh, Pro-Vice Chancellor, Department of Computer Applications, gave the opening speech for the event. Mr. Vikram Singh, Assistant Professor, Department of Gaming and Immersive Technology, Chitkara University, Punjab, was the first expert. In addition to leading the participants in an entertaining word-thinking exercise, Mr. Singh described the procedures involved in developing a virtual reality system. These words were converted into a scenario that would eventually be used in the virtual reality system. Mr. Naveen Kumar, Assistant Professor, Department of Gaming and Immersive Technology, Chitkara University, Punjab, gave an introduction to 3-D modelling and how it's used to create virtual reality systems. Mr. Karthic Bala subramanium, an associate professor in the department of gaming and immersive technology at Chitkara University in Punjab, gave a speech on the third and last day of the event. He shared his experience using Unity Engine to create a virtual reality system. The participants thoroughly liked and savoured each and every session. The attendees expressed gratitude to the organizers for choosing a topic that was pertinent to the times and requested that more events of this like be suggested in the future.

# First International Conference on Advanced Network Technologies and Computational Intelligence
## April 5-6, 2024

The First International Conference on Advanced Network Technologies and Computational Intelligence (ICANTCI-2024) was held on April 5-6, 2024, at Chitkara University, Punjab, India in collaboration with City University, Malaysia and University of Wollongong in Dubai, UAE. The conference was a groundbreaking event, drawing attention to cutting-edge advancements and innovative practices in network technologies and computational intelligence.ICANTCI-2024 provided a platform to researchers, academicians, industry professionals, and students from the globe gathered to discuss, share, and explore contemporary advancements in network and computational intelligence. The theme of the conference focused on fostering innovation and computational intelligence to solve real-world challenges across various sectors, including healthcare, finance, manufacturing, and smart cities.The conference featured keynote speeches from distinguished experts in the field, including Dr. Tony Jan, Australia; Dr GwanggilJeon, Korea; and Dr SukhjitSInghSehra, Canada, Dr. S B Goyal, Malaysia, Dr. May ElBarachi, Dubai, and Dr.Manoj, Dubai.



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**ICANTCI 2024**
**1st International Conference on Advanced Network Technologies & Computational Intelligence**

Date: 5th - 6th April, 2024

*Conference Chair*
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City University, Malaysia

♦ **Dr. May ElBarachi**
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CITY UNIVERSITY MALAYSIA — UNIVERSITY OF WOLLONGONG IN DUBAI — CHITKARA UNIVERSITY

**Call for Papers** - ICANTCI 2024 is intended to serve as a platform for presenting, sharing ideas, and presenting the findings of high-quality research work in cutting-edge trends and technologies in the areas of Advanced Networking and Computational Intelligence. Prospective authors are invited to contribute high quality research papers (12 pages) describing original and unpublished results of conceptual, constructive, empirical, experimental, or theoretical work in all areas of Advanced Network Technologies and Intelligent Computing. 'It is planned to publish the peer reviewed and all selected papers of the conference as proceedings with Springer in their prestigious "Communications in Computer and Information Science" series (https://www.springer.com/series/7899). All submissions shall be handled through the Microsoft CMT portal at: https://cmt3.research.microsoft.com/ More information regarding paper format and guidelines for paper submission can be found at the conference website https://ca.chitkara.edu.in/icantci2024/

*Conference Tracks:*
**Track 1 :** Advanced Network Technologiess
**Track 2 :** Computational Intelligence
**Track 3 :** Computer Technology Trends

**IMPORTANT DATES/TIMELINE**
Last Date for Submitting Full Paper: **November 30, 2023**
Notification to Shortlisted Papers: **December 25, 2023**
Registration Deadline: **December 10, 2023**
Camera Ready Paper: **January 5, 2024**
Conference Date: **April 5-6, 2024**
Mode of Conference: **Hybrid**

**CONFERENCE FEES**

| Category | Student/ Research Scholar | Faculty/ Academician | Industry Professional | Co-author/ Attendee |
|---|---|---|---|---|
| Authors from India (INR) | 7000 | 8000 | 9000 | 2000 |
| Authors from Outside India (USD) | 100 | 150 | 160 | 50 |

For any queries,
Contact: Dr. Varun Malik (+91 8168108200)

Conference Website:- **https://ca.chitkara.edu.in/icantci2024/**
Conference email id :- **icantci2024@chitkara.edu.in**

Organised by Department of Computer Applications, Chitkara University, Punjab, India, in association with City University, Malaysia and University of Wollongong in Dubai, Dubai Knowledge Park, Dubai, UAE

# First International Conference on Advanced Network Technologies and Computational Intelligence
## April 5-6, 2024

# Research Publications

Vats, S., Khanna, M.S., Kukreja, V. and Mehta, S., 2024, March. Federated Learning CNN Empowers Precision In Agriculture: A Case Study in Soybean Leaf Disease. In 2024 IEEE International Conference on Interdisciplinary Approaches in Technology and Management for Social Innovation (IATMSI) (Vol. 2, pp. 1-6). IEEE.

Vats, S., Khanna, M.S., Kukreja, V. and Mehta, S., 2024, March. AI in Agriculture: A Federated Learning CNN Approach to Detecting Almond Leaf Disease. In 2024 IEEE International Conference on Interdisciplinary Approaches in Technology and Management for Social Innovation (IATMSI) (Vol. 2, pp. 1-6). IEEE.

Vats, S., Khanna, M.S., Kukreja, V. and Mehta, S., 2024, March. Strawberry Leaf Disease Severity Decoded for Agriculture: A Federated Learning CNN Approach. In 2024 IEEE International Conference on Interdisciplinary Approaches in Technology and Management for Social Innovation (IATMSI) (Vol. 2, pp. 1-6). IEEE.

Vats, S., Khanna, M.S., Kukreja, V. and Mehta, S., 2024, March. Emerging Trends in Agritech: Federated Learning CNN-Based Jackfruit Leaf Disease Severity Detection. In 2024 IEEE International Conference on Interdisciplinary Approaches in Technology and Management for Social Innovation (IATMSI) (Vol. 2, pp. 1-6). IEEE.

Kalra, A. and Mittal, R., 2024, March. Explainable AI for Improved Financial Decision Support in Trading. In 2024 11th International Conference on Reliability, Infocom Technologies and Optimization (Trends and Future Directions)(ICRITO) (pp. 1-6). IEEE.

Mittal, R., Malik, V., Aeri, M., Kaswan, K.S. and Singh, S.V., 2024, March. SSVBT: Secure Certificateless Aggregate Signature Scheme in VANETS with Block Chain Technology. In 2024 11th International Conference on Reliability, Infocom Technologies and Optimization (Trends and Future Directions)(ICRITO) (pp. 1-6). IEEE.

Malik, V., Mittal, R., Chaudhry, R. and Yadav, S.A., 2024, March. Predicting Purchases and Personalizing the Customer Journey with Artificial Intelligence. In 2024 11th International Conference on Reliability, Infocom Technologies and Optimization (Trends and Future Directions)(ICRITO) (pp. 1-5). IEEE.

Kumar, H., Kaushal, R.K., Kumar, N. and Malik, P.K., 2024. Comprehensive Analysis of Blockchain Frameworks and Their Usability in Various Applications. In Convergence of Blockchain and Internet of Things in Healthcare (pp. 243-262). CRC Press.

Kaur, A. and Kumar, S., 2023, December. Cosine elastic cluster scheduling algorithm for VM migration in cloud computing. In AIP Conference Proceedings (Vol. 2916, No. 1). AIP Publishing.

Kaushal, R.K. and Kumar, N., 2024, March. Convergence of Blockchain and Internet of Things Using Hyperledger Fabric. In 2024 International Conference on Emerging Smart Computing and Informatics (ESCI) (pp. 1-5). IEEE.

Chaudhry, R., Kaur, S., Singla, J., Mittal, R. and Malik, V., 2024, March. Fraud Detection and Prevention for a Secure Financial Future Using Artificial Intelligence. In 2024 International Conference on Emerging Smart Computing and Informatics (ESCI) (pp. 1-6). IEEE.

Chaudhry, R., Prakash, A., Gorowara, N., Mittal, R. and Malik, V., 2024, March. Artificial Intelligence with Streamlining Payments and Lending for a Simpler Financial Ecosystem. In 2024 International Conference on Emerging Smart Computing and Informatics (ESCI) (pp. 1-5). IEEE.

# Research Publications

Gorowara, N., Prakash, A., Correa, F.S., Malik, V. and Mittal, R., 2024, March. AI Personalizing Training and Reskilling Employees for the Digital Age. In 2024 International Conference on Emerging Smart Computing and Informatics (ESCI) (pp. 1-6). IEEE.

Gorowara, N., Singla, J., Chaudhry, R., Malik, V. and Mittal, R., 2024, March. Artificial Intelligence-Based Forecasting Market Trends and Guiding Investment Decisions. In 2024 International Conference on Emerging Smart Computing and Informatics (ESCI) (pp. 1-5). IEEE.

Kaur, P., Kaur, R., Kaur, A. and Sharma, V.K., 2023, November. Privacy Preservation and Secured Data Storage on Cloud Using Encryption Algorithms. In 2023 International Conference on Advances in Computation, Communication and Information Technology (ICAICCIT) (pp. 1374-1378). IEEE.

Learning, U.M., Kaur, P., Chaudhary, D. and Singh, J., 2024. 4 Analyzing the Social. Machine Learning in Healthcare and Security: Advances, Obstacles, and Solutions, p.63.

Nagpal, P., Chaudhary, D. and Singh, J., 2024. Design of Tea Ontology for Precision-based Tea Crop Yield Prediction Using Machine Learning. In Machine Learning in Healthcare and Security (pp. 52-62). CRC Press.

Chaudhary, D., Singh, J., Singh, J., Chahal, J. and Molla, K.Z., 2024, March. Data analytics to find impact of religion on tourism in India. In AIP Conference Proceedings (Vol. 2816, No. 1). AIP Publishing.

Khare, A., Vyas, V., Kumar, N., Kaushal, R. and Kumar, A., 2024, March. Designing distributed systems using aspect-oriented approach. In AIP Conference Proceedings (Vol. 2816, No. 1). AIP Publishing.

Kaur, A., Singh, V. and Sharma, S., 2023, July. A comprehensive study of trust management system in wireless sensor networks. In AIP Conference Proceedings (Vol. 2788, No. 1). AIP Publishing.

Sharma, S., Kaur, A., Gupta, D., Juneja, S. and Kumar, M., 2023. Dragon fly algorithm based approach for escalating the security among the nodes in wireless sensor network based system. SN Applied Sciences, 5(12), p.376.

Mittal, R., Malik, V., Goyal, S.B., Yadav, S.A., Srivastava, A.P. and Sankhyan, A., 2023, December. Spinal Cord Disease Identification Using Transfer Learning Techniques. In 2023 10th IEEE Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON) (Vol. 10, pp. 1192-1197). IEEE.

Malik, V., Sharma, S., Mittal, R., Rao, A.K., Martin, R.J. and Khan, A.K., 2023, December. Coronary Artery Disease Prediction Using Enhanced Multi-Layer DCNN. In 2023 10th IEEE Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON) (Vol. 10, pp. 1176-1180). IEEE.

Malik, V., Mittal, R., Singh, V., Mittal, A., Singh, S.V. and Diwvedi, S.P., 2023, December. Detection of Cyberbullying Using Modified Dense Framework. In 2023 10th IEEE Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON) (Vol. 10, pp. 1181-1186). IEEE.

Mittal, R., Malik, V., Singh, J., Gupta, S., Srivastava, A.P. and Sankhyan, A., 2023, December. Skin Cancer Detection Using Deep Block Convolutional Neural Networks. In 2023 10th IEEE Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON) (Vol. 10, pp. 1187-1191). IEEE.

Mittal, R., Malik, V., Kumar, M., Chaturvedi, P., Rao, A.L.N. and Khan, A.K., 2023, December. Bone Fracture Segmentation Using Cascaded Convolutional Neural Networks. In 2023 10th IEEE Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON) (Vol. 10, pp. 1170-1175). IEEE.

Mittal, R., Jeribi, F., Martin, R.J., Malik, V., Menachery, S.J. and Singh, J., 2024. DermCDSM: clinical decision support model for dermatosis using systematic approaches of machine learning and deep learning. IEEE Access.

# Students Achievements

| Name | Class(Sem) | Event | Organizers | Date | Position |
|------|-----------|-------|-----------|------|----------|
| Happy Yadav | BCA (2) | Vihaan 7.0 Hackathon | Delhi Technological University, Delhi | April 11-12, 2024 | 1$^{st}$Position |
| Prayag | MCA (2) | Codethon-igniting Innovative Ideas Through Code | CSI, Chitkara University, Punjab. | April 10, 2024 | 1$^{st}$Position |
| Hishita Gupta | BCA (2) | Hack Your Brain 7.0 | Coding Ninjas CUIET Chapter | March 18,2024 | 1$^{st}$Position |

# *A Brain Teaser*

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## Solution of Last Issue

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| 8 | 5 | 9 | 7 | 6 | 1 | 4 | 2 | 3 |
| 4 | 2 | 6 | 8 | 5 | 3 | 7 | 9 | 1 |
| 7 | 1 | 3 | 9 | 2 | 4 | 8 | 5 | 6 |
| 9 | 6 | 1 | 5 | 3 | 7 | 2 | 8 | 4 |
| 2 | 8 | 7 | 4 | 1 | 9 | 6 | 3 | 5 |
| 3 | 4 | 5 | 2 | 8 | 6 | 1 | 7 | 9 |

## Editorial Section

We present the current issue of our newsletter and we hope to get due feedback from our readers which can help us in improving our next issues.

"Happy Reading"

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