

The Eye, CSEA

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FinTech Cybersecurity Event Proposal

Proposal by:

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Proposed Dates

Date: September 20 - September 22

Date: September 27 - September 29

Maximum # of Participants: 150 Participants

Eligibility Criteria: Open to All Departments and Years of PSG College of Technology.

Pre-Requisites

- Knowledge in basic Coding Concepts
- A brief history showcasing the individual's interest in either Coding, Security, or Finance

Day 1 (Friday | 4:30PM - 6:00PM)

<Guest Speaker Workshop/>

Possible Speakers Available

- Hussain Buhamad https://www.linkedin.com/in/hussain-buhamad-64b100161/
- Angelina Tsuboi https://www.linkedin.com/in/angelina-tsuboi-322028211/
- Subash Jaganathan https://www.linkedin.com/in/subash-j/
- Maharaj M https://www.linkedin.com/in/maharaj-m/
- Venugopal Kozhipurath https://www.linkedin.com/in/venugopalkozhipurath/
- Harsh Shah https://www.linkedin.com/in/theharshguy/

Day 2 (Saturday | 9:00AM - 4:00PM)

10:00AM - 12:00PM → Workshop by The Eye

- What is a CTF?
- What is a OSINT?
- Introduction to Finance Security (Session by Finverse?) [11:00 11:30]
- Secure Coding Techniques, GitHub and GitGuardian (Session by Coding Club?) [11:30 -12:00]
- Intro to the Case Study.

1:45PM - 5:00PM → Case Study

- Give hints
- Conduct Events [non technical] during Case Study

Day 3 (Sunday | 9:00AM - 12:30PM)

9:00AM - 1:00AM → Speed Run Hackathon

• Full access to internet and all copying allowed **including ChatGPT** except copying Built-in code from **GitHub**.

1:00PM - 2:00PM → Internal Evaluation of Project

2:00AM - 2:30PM → Valedictory Function and Prize Distribution

- Participation Certificate Distribution
- Prize Distribution



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FinTech Cybersecurity Budget Proposal

Proposal 1: With Sponsorship

| Item | Cost (INR) | Details |
|---------------------|---------------|---|
| Prize Pool | 15,000 | 7.5K for case study, 7.5K for hackathon |
| - First Prize | 4,000 | - |
| - Second Prize | 2,000 | - |
| - Third Prize | 1,500 | - |
| - Runner-Up | 1,500 | Stickers and goodies |
| Goodies | 5,000 | Pens, notebooks, lanyards, custom tees |
| Customized Pens | 1,500 | 80 pens (https://www.printland.in/customize/L131- Highway-Satin-Finish-PenBlack- 95133.html) |
| Refreshments | 2,500 | Enhanced refreshments for 80 participants |
| Venue Payment | 2,000 | Payment for premium venue |
| Certificates | 1,000 | Hard copy for 150 participants and 8 winners |
| Hosting Expenses | 0 | Self-Sponsored |
| Total | 28,500 | - |

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On Saturday, from 10:00 AM to 12:00 PM, The Eye hosts a workshop covering Capture The Flag (CTF) challenges, Open Source Intelligence (OSINT), and Finance Security, with possible sessions by Finverse and the Coding Club on Secure Coding Techniques, GitHub, and GitGuardian. The morning will conclude with an introduction to a Case Study, followed by non-technical events and hints during the Case Study from 1:45 PM to 5:00 PM.

Sunday features a Speed Run Hackathon from 9:00 AM to 1:00 AM, with full internet access and use of resources like ChatGPT allowed, except for copying GitHub code. After the hackathon, an Internal Evaluation of Projects takes place from 1:00 PM to 2:00 PM, followed by a Valedictory Function and Prize Distribution from 2:00 PM to 2:30 PM, where participants will receive certificates and awards.



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FinTech Cybersecurity Budget Proposal

Proposal 2: Without External Sponsorship

| Item | Cost (INR) | Details |
|---------------------|---------------|---|
| Prize Pool | 7,500 | Total for case study and hackathon |
| - First Prize | 4,000 | - |
| - Second Prize | 2,000 | - |
| - Third Prize | 1,500 | - |
| Goodies | 5,000 | Pens, notebooks, lanyards, custom tees, stickers |
| Customized Pens | 1,500 | 80 pens (https://www.printland.in/customize/L131- Highway-Satin-Finish-PenBlack- 95133.html) |
| Refreshments | 1,000 | Basic refreshments (10 INR juice + 5 INR biscuit) for 80 participants |
| Venue Payment | 0 | Utilizing free or low-cost venue options (e.g., university facilities) |
| Certificates | 0 | Not allocated |
| Hosting Expenses | 0 | Assumed free |
| Total | 15,000 | - |

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FinTech Cybersecurity Detailed Case Study Proposal

Case Study: The Death of a Fintech Visionary

Background:

In the fast-paced world of fintech, innovation is both celebrated and fiercely contested. The booming fintech industry in India, driven by technologies such as Unified Payments Interface (UPI) and BHIM, has not only transformed the financial landscape but also become a battleground for dominance. This case study revolves around the mysterious death of Rajiv Mehta, the charismatic CEO of FinSecure, a leading fintech company, and the subsequent investigation that exposed a sinister web of corporate espionage, betrayal, and murder.

The Incident:

Rajiv Mehta was found dead in his luxurious penthouse in Mumbai, just days after announcing a revolutionary UPI-based product that promised to disrupt the digital payments industry. Initial reports suggested a heart attack, but suspicions were raised as his body was washed off the shores and could not be found. The enigmatic circumstances of Mehta's death led to an extensive investigation, uncovering a story as twisted and gripping as a thriller movie.

Investigator Access:

- Documents on our own internet hostpost
- Access to interview/investigate one suspect (Kiran Thakur) if asked for

Investigation Overview:

The investigation into Mehta's death became a landmark case, heavily reliant on Open Source Intelligence (OSINT). Investigators meticulously pieced together the puzzle using various openly available documents and online resources.

Phase 1: Digital Footprint Analysis

1. Social Media Scrutiny:

Purpose: To uncover any recent threats or unusual interactions.

Sources: LinkedIn

 Findings: Several posts hinted at rising tensions between Mehta and competitors, particularly with executives from a rival fintech startup, PayWave, headed by the ambitious and ruthless CEO, Kiran Thakur.

2. Corporate Filings and Press Releases:

- Purpose: To track business moves and identify potential motives.
- o **Sources:** Ministry of Corporate Affairs (MCA) website, news archives.
- Findings: Mehta's recent announcement of a groundbreaking UPI product threatened to upend PayWave's market position, providing a clear motive for Thakur and his associates.

3. Patent Filings:

- Purpose: To learn more about potential motives.
- Sources: IPIndia website.
- Findings: FinSecure has filed a patent for a fingerprint based UPI payments system for the world and, in their patent, has explicitly mentioned how it is better than a face recognition based system. PayWavehas filed a patent for a face recognition based UPI payments system for the world before FinSecure.

Phase 2: Financial Forensics

1. Transaction Histories:

- Purpose: To trace any suspicious financial activities.
- Sources: UPI and BHIM transaction logs found online by using Google Dorks
- Findings: Large sums of money were transferred from accounts linked to PayWave to various shell companies, suggesting the funding of illicit activities.

2. Stock Market Movements:

- Purpose: To observe any unusual trading patterns.
- Sources: National Stock Exchange (NSE) data.
- Findings: A sudden spike in short-selling FinSecure's stock indicated foreknowledge of Mehta's death and its anticipated impact on the company's market value.

Phase 3: Corporate Espionage Unveiled

1. Leaked Emails and Documents:

- Purpose: To find direct evidence of conspiracy.
- Sources: Internal email servers of PayWave (internal IPs will be given by organizers with Zimbra mail client set-up). These email servers would be vulnerable to SQLi through which they would find Thakur's password.
- Findings: Emails between Thakur and his top executives revealed discussions about "neutralizing" Mehta and appropriating his fintech innovations..

Phase 4: The Culmination

1. Surveillance Footage:

- Purpose: To track movements and interactions.
- o **Sources:** CCTV footage from Mehta's penthouse and surrounding areas.
- Findings: Footage showed a known associate of Thakur (identified from the email) entering Mehta's residence on the night of his death, providing a critical piece of the puzzle.

The Finale:

As the investigation neared its conclusion, a shocking twist emerged. An anonymous tip led investigators to a hidden recording of a meeting between Thakur and his closest confidants, where they discussed the meticulous planning of Mehta's murder. This damning evidence not only confirmed Thakur's direct involvement but also revealed the extent of the conspiracy within PayWave.

Phase 5: The Unexpected Revelation

1. ICAO Database:

- Purpose: To uncover the truth behind Rajiv Mehta's disappearance.
- Sources: International Civil Aviation Organization (ICAO) flight plans database.
- Findings: Investigators cross-referenced flight plans and discovered a private jet registered under a shell company. This jet had departed Mumbai around the time of Mehta's supposed death.

2. FlightRadar24:

- o **Purpose:** To trace the flight path and determine the final destination.
- Sources: FlightRadar24
- Findings: The aircraft made several stops across various countries before ultimately landing on a remote Caribbean island known for its privacy and lack of extradition treaties.

3. Tracing the Location:

- Purpose: To hack into the CCTV Camera of the current airport of the jet on land,
 and then find the
- Sources: Google Dorking for IP Camera with Fictional Airport name (TRED -Taured)
- Findings: The compiled information confirmed Mehta's orchestrated disappearance and his presence on the island. Zooming into the card on his hand gives details of his venue.

4. The Location:

- o **Purpose:** To hack into the CCTV Camera of the hotel Mehta is at.
- o **Sources:** Google Dorking for IP Camera with Fictional Hotel name
- Findings: We can find his room #. The final address is submitted to the organizers to complete the challenge, along with a proper compiled case report.