





2 June 2021

CySecK Research Development Programme

Proposals shortlisted for the 2nd round of evaluation

Government of Karnataka's K-Tech Centre of Excellence in Cybersecurity (CySecK) issued a call for research and development project proposals in the area of Cybersecurity on 18 March 2021.

In total, 53 proposals were received against the call for which last date was 10 May 2021. Based on scientific merit, value and relationship of the project to the society and complementarities of the project objectives, scientific strengths of the project coordinators, the CySecK RDP Panel of Experts have shortlisted 20 proposals for the 2nd round of evaluation.

The Project investigators and Co-Investigators of the shortlisted proposals are required to prepare and deliver a 10-minute presentation, not exceeding 10 slides, to the CySecK RDP Panel of experts.

The presentation must cover the below mentioned aspects at a minimum:

- Value and relationship of the project to the society
- Research design and methodology
- Objectives, targets and milestones
- Potential for application Provide an estimate of return-on-investment, in terms of money / public good / countering denial regime / self-reliance / national pride etc.
- Value Provide an estimate of infrastructure (HR, finance, time, policy, management) that would be required to scaleup, test and implement a usable solution.

Please email a copy of your presentation (in PDF format) and your proposal submission (in doc format) to <u>pm.cyseck@karnataka.gov.in</u> by 15 June 2021.

The presentations are tentatively scheduled for the 3rd week of June. The shortlisted PIs will receive an email communication with the detailed schedule.







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List of shortlisted proposals for round 2 evaluation

SI No	Project Title	Subject Area	PI's Institute	Name of PI	Name of Co-PI
1	Privacy enhanced federated vehicular network for intelligent transportation	Vehicular Ad- hoc Network	M S Ramaiah Institute of Technology	Dr Shilpa Chaudhari	Dr. Janamejaya Channegowda
2	Towards Light Weight Fully Homomorphic Encryption Algorithms and Methods in Internet of Things	Cryptography: Homomorphic Encryption	KLS Gogte Institute of Technology, Belagavi	Mr Gajendra Deshpande	Dr. Veena Desai
3	A Secure Lightweight distributed framework for auditing shared data of Smart applications using Fully Homomorphic Encryption in Cloud Storage	Cryptography, Cloud computing	M S Ramaiah Institute of Technology	Dr J Geetha	Mr Hanumantharaju R
4	A comprehensive SCI- MQTT dataset for detecting the malicious attacks in public utility systems.	Cyber Security in Smart Cities	BMS College of Engineering	Dr. R. Ashok Kumar	Mrs Nalini. M. K
5	Detection of AI generated fake influential images in Social media using GAN	Cyber security and Artificial Intelligence	RV College of Engineering	Dr. Mamatha G S	Prof. B K Srinivas
6	Development of a Novel forensics framework for Extracting knowledge from Mobile Devices to Perform forensically sound Investigations	Cyber forensics (sub domain- Mobile forensics)	SECAB INSTITUTE of ENGINEERING & TECHNOLOGY, VIJAYAPURAA	Dr Syed Zakir Ali	Mr Aslam Karjagi
7	Detecting and Preventing Phishing Email Using Machine Learning Techniques- MailSieve	Cyber Security	East Point College of Engineering and Technology	Dr. C Emilin Shyni	Dr T K Sateesh
8	Software solution for analyzing and visualizing Call Data Records	Cyber Security	RVCE Bangalore	Dr. Ashok Kumar A R	Dr. Ramakanth Kumar P







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9	Design and Development of model for Deepfake video detection by eye blinking rate detection using CNN & RNN	Multimedia Forensics Network	Sahyadri College of Engineering & Mngmt B M S Institute of	Dr G Ananth Prabhu	Mr Naitik S T Dr Sunanda Dixit
10	Study and analysis of hybrid covert channels using entropy analytics for detection	Forensics	Technology and Management	Dr Anjan Krishnamurthy	Di Sunanda Dixit
11	SWIN : Towards a Safer Wearable IoT Network	IoT Security	Siddaganga Institute of Technology	Dr.Pramod T.C	Dr N R Sunitha
12	Pattern based Anomaly Detection in Mobile Adhoc Networks using Computational Intelligence Techniques - PADMAN	Network Security, Cyber Security	M S Ramaiah Institute of Technology	Dr. Vijaya Kumar B P	Dr. Naresh E
13	Cyber Forensic Analysis and Investigation Using Raspberry Pie kit	Digital Forensic Analysis and Investigation	Government Engineering College, Hassan	Mr Annaiah H	Dr Chethan K C
14	Verifying the Authentication of health advisors audio using convolutional neural network	Cyber space audio security using machine learning	New Horizon College of Engineering	Dr.Senthil Kumar R	Dr S J Subhashini
15	Quantum Key Distribution Scheme for Securing Smart Grid Communications	Cyber Security	R V College of Engineering	Dr. B Sathish Babu	Dr. Sandhya S
16	Hate speech deters decision-makers from participating in public debate	Data Analytics	RNS Institute of Technology, Bangalore	Dr Prakasha S	Dr S Sathish Kumar
17	Design and Implementation of Security Service in 5G wireless Networks	Computer Network and Web Security	Basaveshwar Engineering College (Autonomous), Bagalkot	Dr. Shivakumar V	Dr. Sanjeevakumar M. Hatture







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18	Hardware Implementation of Network Intrusion Detection System using Artificial Intelligence.	Machine Learning and Deep Learning Techniques	Rao Bahadur Y Mahabaleswarappa Engineering College,	Mr Phanindra Reddy K	Mr Noorullah Shariff C
19	Trust Based Context Aware User Access Control System for IoT Application Security	Authentication and Access control for IoT Application	New Horizon College of Engineering	Dr R Thirukkumaran	Ms S Sridevi
20	Cyber Security Threat Detection in Smart Agriculture Using Machine Learning Approaches	Computer Network and Web Security	Basaveshwar Engineering College(Autonomous), Bagalkot	Dr. Sanjeevakumar M. Hatture	Dr. Shivakumar V