

श्री चित्रा तिरुनाल आयुर्विज्ञान और प्रौद्योगिकी संस्थान, तिरुवनन्तपुरम- 11, केरल
Sree Chitra Tirunal Institute for Medical Sciences and Technology, Thiruvananthapuram- 11, Kerala
(भारत सरकार के अधीन राष्ट्रीय महत्व का संस्थान)
(An Institute of National Importance under Government of India)
टेलीफॉन नं./Telephone No. 0471-2443152 फाक्स/Fax 0471-2446433
ई-मेल/E-mail :sct@sctimst.ac.in वेबसाइट/ Website : www.sctimst.ac.in

Invitation to attend the AMC Seminar

We are pleased to invite you to attend the AMC seminar:

by

Dr Suresh Munuswamy
Deputy Director and Additional Professor
Public Health Foundation of India (PHFI) for Technology Innovations

Topic:

**" At Home Primary Health Care - COMPREHENSIV –
Concept "**

*Date: 26 October 2023
Time: 3:00 PM to 4:00 PM,
Venue: AMC Seminar hall,*

You may also join electronically at

<https://us02web.zoom.us/j/89970301017?pwd=aG9wL2MzSDlRZFNVNVR3l0THBNSVd6dz09>

Meeting ID: 899 7030 1017

Passcode: amc

A brief description of the talk and speaker's bio-sketch are enclosed.
We look forward to your participation in this seminar.
Yours sincerely

डॉ. बिजू सोमन/ Dr. BIJU SOMAN
प्रोफेसर और वभिगाध्यक्ष /Professor & HOD
एएमसीएचएसएस/AMCHSS

Profile of the speaker – Dr.Suresh Munuswamy

Dr Suresh Munuswamy is a medical doctor, scientist and a start-up entrepreneur. He studied M.B.B.S in Chennai, M.P.H in Oxford and PhD in Tokyo. He was the first Indian to be selected for the Public Health Leadership Doctorate Program fully sponsored by the Government of Japan.

Presently he is the Deputy Director and Additional Professor at Public Health Foundation of India (PHFI) for Technology Innovations; Director at Hi Rapid Lab –PHFI's first faculty led start-up company; and the coordinator for India's first integrated MSc and PhD Health Informatics program at IIPH- Hyderabad. Previously he was part of the team that started India's first School of Public Health in a private university at SRM near Chennai.

He has 6 years of clinical experience, 7 years of public health experience and over 10 years of experience in design, development of comprehensive software, hardware and mobility platforms for delivering universal primary health care screening and treatment at home.

The platform developed by Dr.Suresh, integrates several design and technology approaches, including graphic icons and AR for UI, wide spectrum images (within and beyond visual) for automated feature identification, iterative looped logic and artificial intelligence for decision making, custom configured ground (two and four wheeler) and unmanned aerial vehicles/drones for product supply chain. He has about 10 design and process patents to his credit. Several components of the platform, are currently being field tested in several locations for several applications.

For the idea of home based primary health care to be sustainable and become part of the health system, he is continuously working on creating an innovation led service ecosystem bringing together public health experts, technologists (software, hardware, automobile, aerospace), designers, donors, regulators, bureaucrats, field managers, students of various back grounds and grassroot level service providers with the purpose of providing primary health care at home. Further information about his work is available on www.hirapidlab.com or you can simply search his name on google.

A brief on the talk
AT-HOME PRIMARY HEALTH CARE -COMPREHENSIV - CONCEPT

The vision of COMPREHENSIV is to provide @ home universal primary health care through a trained and empowered local Community Health Care Personnel (CHCP). COMPREHENSIV has three interactive platform's—the ENGAGEMENT platform, the MOBILITY platform and the TRIPLE AI platform.

The ENGAGEMENT platform is a software application, available on an android mobile phone that can screen, manage in real time several early stage disease conditions across several age categories with due consideration to socio demographics, economics, Water, Sanitation, Hygiene (WASH) issues, nutrition and disability status. The screening is done by innovative (patent pending) language neutral Icon and image based screening software that can be used by any local field health care worker universally with rapid training. On screening the signs and symptoms, the application can in real time arrive at risk profile, differential diagnosis and suggest management that include comprehensive, convergent and customized health promotion, first line treatment, advise on collection of samples for diagnostics, telemedicine connect, facility referral and livelihood guidance. Supporting the ENGAGEMENT platform is the Multi Sensor hand held device. The ENGAGEMENT platform is designed to reach 100% of population and facilitate Universal Health Care.

The MOBILITY platform is a collection of hardware products, comprising transport and payload options to facilitate medical products reach or collect medical samples from point of need. It is a bi directional service, with custom configured two wheeler transport platform and 8 temperature controlled payload boxes; a custom configured drone platform and 4 temperature controlled payload boxes. Unique features of the platform are: (1) modularity – same box that can carry medicines, vaccines, blood/ urine/sputum/any samples...in different temperatures; (2) high safety – custom designed dividers and holders inside the box holds all samples in place; (3) custom designed two wheeler to carry 8 boxes and a high payload long range drone to carry 4 boxes at a time. The Mobility platform is designed to deliver 100% of population and facilitate Universal Health Care.

The TRIPLE AI platform works at three levels. First (feature AI), as a series of computer vision algorithms that can auto identify specific features in specific images and link them to appropriate interventions in real time. Second (network AI), to guide the work flow of the CHCP by scheduling, routing, optimising the work flow, pre ordering, networking for field work and inventory management. Third (context AI), by identifying emerging patterns across the service ecosystem for continuous improvement in comprehensiveness, convergence and customization.

In combination – the ENGAGEMENT, MOBILITY and TRIPLE AI platforms make COMPREHENSIV a true CHCP deliverable primary health service that can provide “comprehensive, convergent and customized” @ home universal primary health care, irrespective of language limitations and location/ access limitations.

<https://hirapidlab.com/concept/COMPREHENSIV>