

# INFUSE

Innovations in Nutrition & Food for Unified Solutions and Empowerment





Organized by: ICMR- National Institute of Nutrition, Hyderabad

Date: 4-5 December 2025

Venue: ICMR-NIN Auditorium, Hyderabad

### About the Summit

The convergence of innovation and nutrition is critical for empowering communities and tackling pressing national challenges from food insecurity to today's concern about rising obesity and diet-related non-communicable diseases. The challenges of food security, chronic diseases, and personalized wellness demand bold, new solutions. To accelerate progress, we are inviting visionary innovators to our inaugural National Innovation Summit: The Future of Nutrition. This event is designed to connect groundbreaking ideas with the capital and expertise needed to bring them to a global scale. We're searching for innovations in four key areas that we believe will re-define the landscape of nutrition.



The National Innovation Summit on Nutrition & Food Technology aims to bring together innovators, researchers, startups, and industry experts to showcase transformative solutions addressing the challenges in making healthy diets accessible and affordable, low cost nutrient assessment, technological solutions for processing the foods to enhance their shelf-life and access across geographies without compromising on their nutritional values, personalized nutrition, and point-of-care diagnostics. This summit provides a unique platform for innovators to present/share their cutting-edge ideas, gain from expert feedback, and explore opportunities for collaboration, incubation, trail/implement and /or scale-up.

### Areas of Innovation

Innovators are invited to submit their concepts, prototypes, or commercially available solutions under the following focus areas:

# 1. Food Technology for healthy diets

We are looking for disruptive innovations that could transform the traditional food supply chain and enhance nutritional value. This includes novel food production methods, nutrient-dense food formulations, and technologies that extend shelf life while maintaining freshness and safety. We are excited to see disruptive solutions that will overhaul the conventional food supply chain. Possible areas include novel production/processing methods, nutrient-dense formulations, and intelligent preservation technologies that can boost health value, maximize freshness/safety/and ensure sustainable, universal access to quality nutrition.

- Novel technologies for food processing and preservation
- Innovative approaches in food fortification
- Sustainable food systems & value-added products
- Functional foods and nutraceuticals
- Reduction of food waste
- Novel technologies for promoting diet diversity or usage of diverse food groups to maximize the nutritional value

### 2. Nutrient Assessment

Accurate and real-time nutrient assessment is the foundation of personalized nutrition. We seek technologies that go beyond traditional methods. This could involve AI-driven image recognition to analyze food on a plate, non-invasive sensors that assess biomarkers from saliva or sweat, or advanced data models that predict an individual's nutritional status. The goal is to make nutrient tracking effortless and insightful.

- New techniques for rapid, accurate, and affordable nutrient profiling
- Portable and AI-assisted nutrient detection tools
- Integration of sensors, IoT, and machine learning for real-time nutritional assessment
- Simple to use diet tracking softwares/Solutions or technologies for rapid dietary assessment (both at clinic/community level)

### 3. Precision & Personalized Nutrition Apps

The future of diet is not one-size-fits-all. We are seeking app developers who can create intuitive and intelligent platforms for personalized and precision nutrition. We are interested in apps that use data from genomics, wearables, and user-input to create bespoke meal plans and dietary advice. Your app should not only track calories but also offer actionable insights and behavioural coaching to foster long-term change.

- AI/ML-powered applications for personalized diet planning
- Digital platforms integrating wearable data & biomarker-based recommendations
- Behaviour-change-driven nutrition tracking and monitoring solutions

### 4. Point-of-Care (POC) Devices

Rapid, on-site testing for nutritional biomarkers is essential for timely interventions. We're looking for innovative POC devices that can measure biomarkers related to nutrient deficiencies, inflammation, gut health, and metabolic function. These devices should be user-friendly, affordable, and provide accurate results outside of a traditional lab setting, empowering both consumers and healthcare professionals.

- Portable diagnostic devices for measuring biomarkers (e.g., Ferritin, CRP, Vitamin D, Iron, etc.)
- Non-invasive and cost-effective solutions for screening malnutrition and deficiencies
- Integration with digital health platforms for real-time monitoring

## Benefits for Selected Innovators

- Opportunity to present before an expert jury
- Access to funding through collaboration, and mentorship opportunities
- Networking with leading researchers and policymakers
- Potential collaboration with government and private stakeholders
- Validation studies in collaboration with ICMR-NIN Scientists

### **Submission Guidelines**

- Submissions can include concept notes, prototypes, or commercially launched products
- One applicant can submit a maximum of two innovations
- Shortlisted innovators will be invited to showcase their solutions at the Summit
- Submit your applications to: infuseinnovations@gmail.com
- Last date for submission: 10 November 2025



# Submission Proforma for Innovators



Title of Innova	tion:
Innovator Deta	ils:
Name:	Team Name (if applicable):
Email:	Phone:
Website/Portfo	lio (optional):
1. In	novation Category (check all that apply):
[] []	Food Technology Nutrient Assessment Precision & Personalized Nutrition Apps Point-of-Care Devices
2. Pr	oblem Statement (max 100 words):
	hat specific problem related to nutrition does your innovation solve? Describe the current up in the market or the challenge you're addressing.
3. Pr	oposed Solution (max 150 words):
	riefly describe your innovation, including the technology or methodology you are using. How bes it work?
Но	novation & Uniqueness (max 100 words):  ow is your solution unique or different from existing products or services? What gives you a impetitive advantage?
5. Ma	arket & Impact (max 100 words):
	ho are your target users or customers? What is the potential market size? Explain the potential apact of your innovation on human health and/or the nutrition industry.
6. De	evelopment Stage (check one):
[] []	Idea/Concept Prototype/Proof of Concept Working Product/Beta Testing Market-Ready/Early Commercialization
7. Po	otential Impact on Nutrition & Public Health (max 100 words):
8. Aı	ny Publications / Patents / Approvals (if applicable):
9. At	ttachments (Optional):
□ I	Images / Diagrams 🗆 Brochure 🗆 Video Link
is aco origi	aration: I/We confirm that the information provided curate and that the submitted innovation is our nal work. ature of Lead Innovator: