### **The Threat of Vector-Borne Diseases**

A double whammy during COVID 19 pandemic

# WHAT WE KNOW?

- Vector-borne diseases account for more than 17 per cent of all infectious diseases globally, and cause more than 700, 000 deaths annually.
- Most vector-borne diseases are preventable through protective measures and community mobilisation



\$4bn

Burden of vector-borne diseases in India1

### Missed

Deadline for elimination of neglected tropical diseases (NTDs)India<sup>2</sup>

<1.5%

Of GDP, government spends on Healthcare<sup>3</sup>

#### **IMMEDIATE ACTION**



### **Discover**

First gather what is, and isn't working

- Have we ignored the risks from malaria, dengue and chikungunya?
- Did the COVID-19 lockdown help curb vector-borne pathogens?



### **Plan** for Pandemic

- Effective management of resources
- Establish Public Private Partnership to utilize sectoral expertise and resources in a powerful manner
- Encourage and leverage non-profits for social entrepreneurship
- Focus on community engagement



### **Design** Solutions

- Enforce integrated preventive measures for SARS-CoV-2 and existing pathogens
- Focus on human Biomics to balance microbial ecology through transformations in human lifestyles

Interventions for malaria, dengue and chikungunya have been pushed back in 2020 due to COVID-19 outbreak. States such as Bihar and Uttar Pradesh still contribute 80 per cent of the Kalaazar cases in the country<sup>4</sup>.

### STRATEGIES FOR AN ONGOING PANDEMIC

### Change

### Management

- Develop and deploy a roadmap to sustain acceleration and determine what can be done to stay the course towards the vision
- Enforce cultural and behavioral shift.
   Ensure prevention as a way of life
- Educate oneself and those around about the upcoming or available vaccine

### Audit & Adapt



Pulse surveys, regular audits and ongoing engagement

- Develop mechanisms to capture useful feedback from society, medical fraternity and academia to gauge the impact of efforts
- Foster innovations to transform singular healthcare approaches into an integrated health management framework

### LOOKING TO A RE-IMAGINED FUTURE



## **Re-Invent** Public Health Strategy

- Explore innovative models of no-frill healthcare facilities, ambulatory care and home healthcare
- Re-define governance and accountability
- Monitor indicators of zoonotic diseases



# Model your New Normal 'Policies'

 Multi-sectoral policy development and implementation should be foundational pillars of prevention, early detection and response in future

Transforming and reinventing a large and complex health care system in India to deal with multiple threats simultaneously is a hurricane task. COVID-19 reminds us about the urgency to priorities healthcare.

(UN) SHIELDED AMID COVID 19

Source: 1. http://origin.searo.who.int/india/mediacentre/events/world\_health\_day/VBD\_Fact\_Sheets.pdf 2. https://indianexpress.com/article/opinion/columns/coronavirus-covid-19-lets-not-forget-the-epidemic-during-the-pandemic/ 3. https://www.indiaspend.com/india-spent-1-of-gdp-on-public-health-for-15-years-result-is-vulnerability-to-crises/ 4. WHO-SEARO study 2019