

Update on **GLOBAL VECTOR CONTROL RESPONSE**

Rajpal Yadav
WHO/NTD

E-mail: YadavRaj@who.int

Global **Malaria** Programme
Department of Control of **Neglected Tropical Diseases**
Special Programme for **Research and Training** in Tropical Diseases



Overview of presentation

- Resolutions: HQ and regions
- WHO's central coordination
 - Normative actions
 - Capacity strengthening
 - Research support
- Progress across regions
- Challenges
- Future plan

World Health Assembly Resolution

RESOLUTION: adopted in May 2017

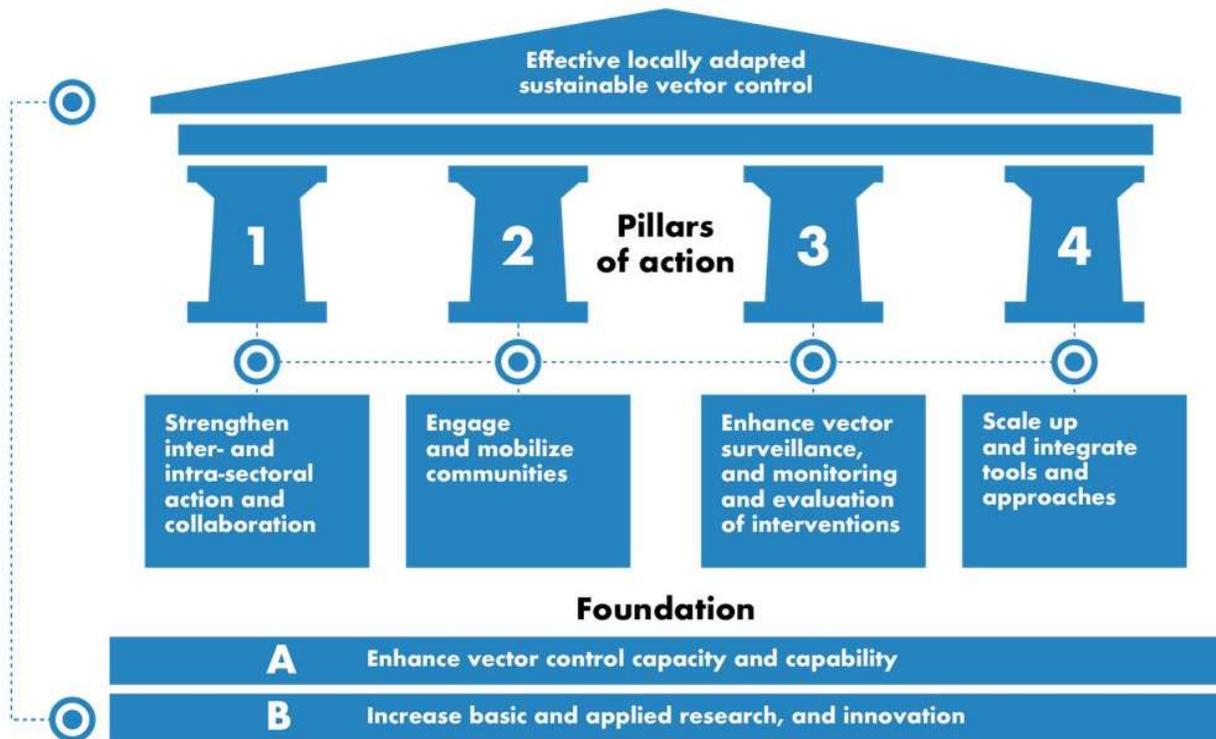
VISION: A world free of human suffering from vector-borne disease

AIM: Reduce the burden and threat of vector-borne diseases that affect humans, through effective, locally adapted, sustainable vector control

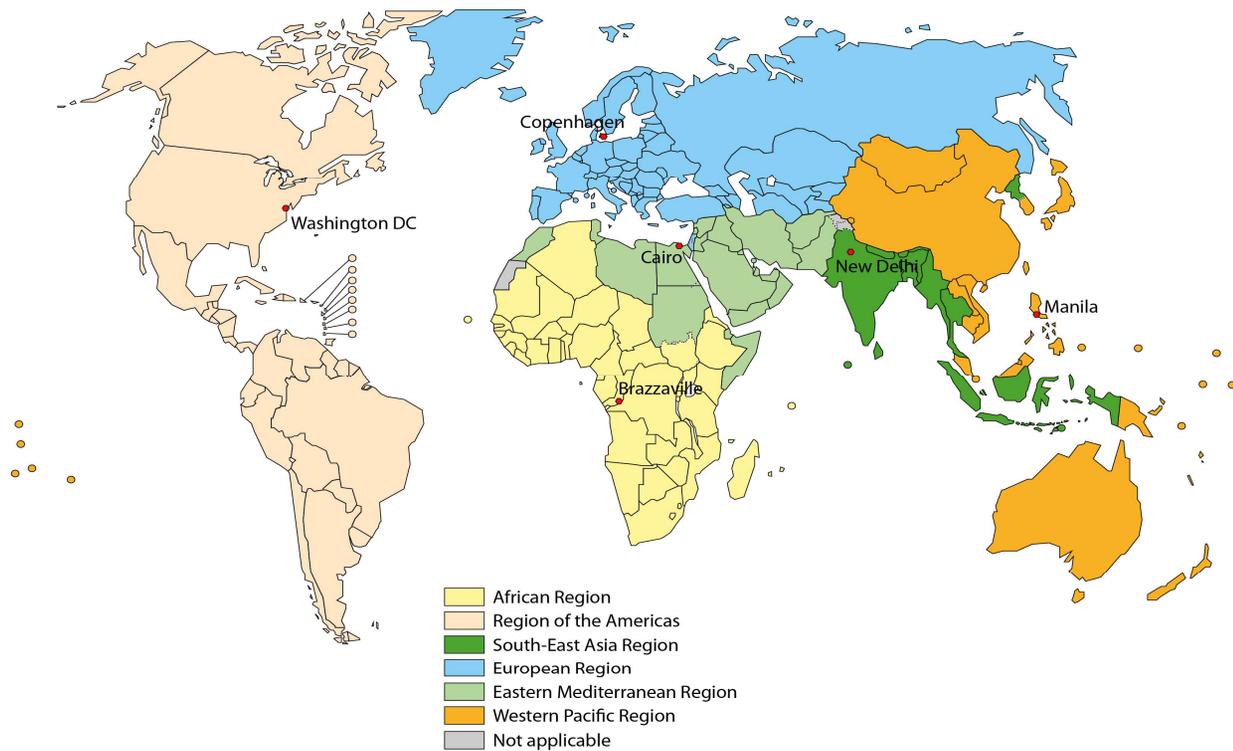


Enabling factors

- Country leadership
- Advocacy, resource mobilization and partner coordination
- Regulatory, policy & normative support



Policy decisions: Regional Committee resolutions/work plans



Central coordination

Establishment of Joint Action Group

- Facilitated in development of regional GVCR policy
- Supporting priority countries for VCNA
- Regional workshops on vector surveillance & IRM
- Documentation of implementation of GVCR
- Advocacy and resource mobilization
- To set up an Expert Advisory Group on GVCR

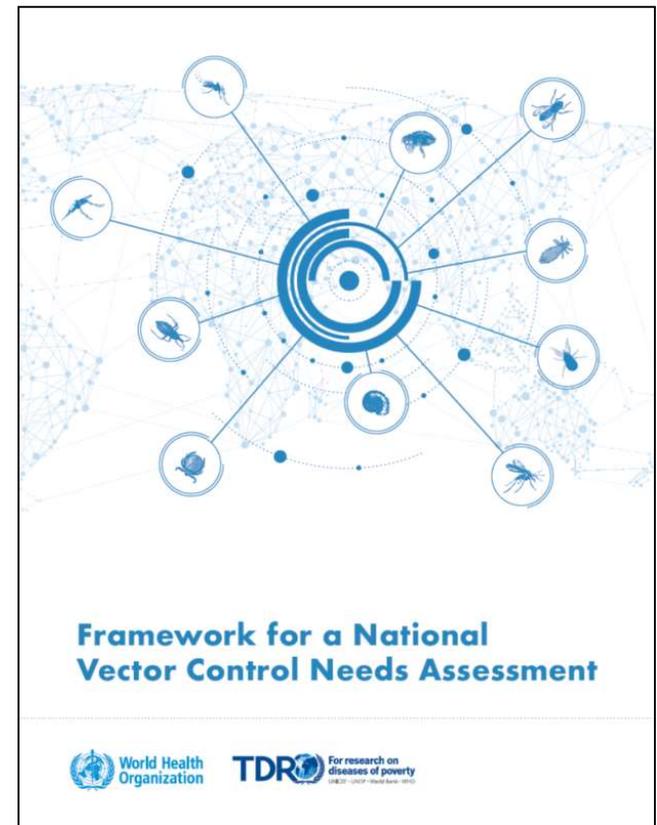
Central coordination

Improving visibility of vector control

- Created a specific webpage on vector control (<https://www.who.int/vector-control/en/>)
- GVCR Conference, Wageningen, June 2019
- Networking: vector control post-list, global networks (e.g. WIN)
- Position paper: VC at points-of-entry to update IHR (WHA 2020)
- Malaria Threats Map (online platform); updated with invasive spp.

Normative guidance and support

- Guidelines for policy and programme implementation
- Vector Control Needs Assessment
- Guidelines and SOPs for product testing
- New guidelines under development
 - vector surveillance and control for leishmaniasis
 - vector control at points-of-entry
 - aircraft disinsection procedures
 - indoor residual spraying
 - pesticide management

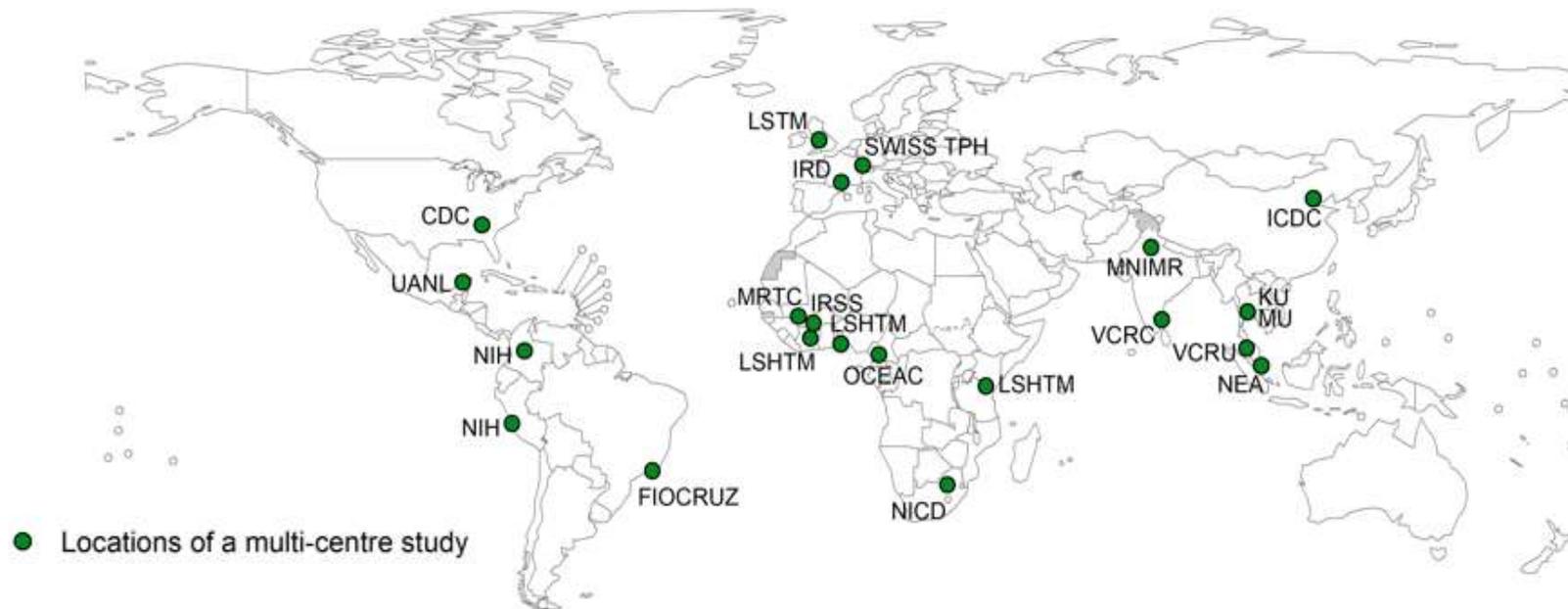


Capacity strengthening

- Regional training of trainers
 - Indoor residual spraying
 - Pesticide management
- Training of GLP sites
 - Study design
 - Test procedures
- Generic DHIS2 modules for entomology data rolled out
 - The Gambia
 - Madagascar
 - Mozambique

Research support

- MOU with IAEA on Sterile Insect Technique
- Multi-centre validation of discriminating concentrations for insecticide resistance monitoring



GLP sites for product testing

| | Region | Sites |
|----------|-----------------|---|
| IVCC led | West Africa | Institut Pierre Richet, Institut National de Santé Publique, Cote d'Ivoire* |
| | | Institut de Recherche en Sciences de la Santé, Centre Muraz, Bukina Faso |
| | East Africa | CREC, Cotonou (in collaboration with LSHTM), Benin |
| | | Centre Suisse de Recherches Scientifiques en Cote d'Ivoire, Cote d'Ivoire |
| WHO led | Western Pacific | Kilimanjaro Christian Medical University College, Moshi, Tanzania* |
| | | Ifakara Health Institute, Bagamoyo, Tanzania |
| | | National Institute of Medical Research, Muheza, Tanzania* |
| | South East Asia | *in collaboration with LSHTM |
| | | Vector Control Research Unit, USM, Penang, Malaysia |
| | | Institute for Medical Research, Kuala Lumpur, Malaysia |
| | Americas | International Centre for Disease Control, Beijing, China |
| | | WHO CC - National Institute of Malaria Research, Delhi, India |
| | | WHO CC - Vector Control Research Centre, Puducherry, India |
| | | Universidad Autonoma de Yucatan, Merida, Yucatan, Mexico |
| | | Oswaldo Cruz Foundation, Fiocruz, Rio de Janeiro, Brazil |
| | | Centro de Investigaciones de Plagas e Insecticidas, Buenos Aires, Argentina |

GLP certified sites are shown in red

Progress across WHO regions

Key activities identified in Regional resolutions

| | GVCR | SEARO | PAHO |
|------------------|--|--------------------------------------|----------------------------|
| Foundation | Vector control capacity and capability | Cross border, IR data | PH entomology |
| | Basic /applied research and innovation | Evidence based, case studies | Support new tools |
| Technical | Inter and intra-sectoral collaboration | Empower ISTF | Inter-ministerial TF |
| | Community mobilization | Subnational ownership and planning | |
| | Enhance Vector surveillance | Utilization of data; sharing of data | Enhance VS and M&E |
| | Scale up and integrate tools and approaches | Locally adapted tools | Elimination where possible |
| Enabling factors | Country leadership | Political commitment | Strong commitment |
| | Advocacy, resource mobilization and partner coordination | Advocacy | |

American Region

- Regional Plan of Action on Entomology and Vector Control 2018-2023 aligned with the GVCR road map
- Regional IRM network: established in August 2018
- Pilot implementation of *Wolbachia* in Colombia reviewed
- Entomological surveillance & IVM course, Honduras, Nov. 2019
- VCNA work to be started in 2020

African Region

- Regional framework for GVCR implementation
- A costed roadmap for GVCR in collaboration with ANVR
- **NSPs revised:** Angola, Botswana and Uganda
- **NSPs under development:** Namibia, S. Africa & Swaziland
- **Outbreak response support:** Congo, Burundi, Cape Verde and Tanzania
- **Arbovirus vector surveillance support:** Cape Verde
- **Arbovirus surveillance regional training:** Dakar (2019)

Eastern Mediterranean Region

- Regional plan for GVCR implementation, 2018
- Regional network on IRM established, June 2018
- VCNA conducted: Iraq, Iran, Morocco, Sudan, Yemen
- National IVM strategies aligned with GVCR: Iraq, Morocco
- Studies on *An. stephensi* being coordinated: Iran
- VC trainings: 12 countries (malaria and leishmaniasis)

European Region updates

- Regional plan for GVCR implementation being developed
- Workshop on **Vector Borne Disease Operational Readiness:** October 2019
- EU-EMR cross-border collaboration meeting, against re-establishment of malaria prevention: Tajikistan, Nov 2019
- Manual on **prevention of establishment and control of mosquitoes of public health importance** (with special reference to invasive mosquitoes), January 2019

South-East Asia Region

- Strategic action plan for vectors of diseases in South-East Asia Region is under development
- Strategic plan on IVM for Maldives, 2017–2021 under review
- Country support on IVM: Bangladesh, Nepal
- Training courses on dengue control in Nepal and Maldives, 2019
- A pictorial vector identification key in SEA Region: in final stage
- Supported international review of the VL programme in India

Western Pacific Region

- Using the regional action framework for malaria 2016-2020 to implement GVCR
- Regional meeting of programme managers, Aug 2018
- Regional workshop on vector surveillance & IRM, Singapore, Oct 2019
- Situation analysis on malaria VC in Greater Mekong Subregion, 2019:
 - Cambodia, Lao People's Democratic Republic, Viet Nam
 - Myanmar, Thailand

Reporting templates under development

- Detailed event-based reporting system to analyse progress / deficiencies
- Indicators of monitoring GVCR implementation

| GVCR targets | | February 2020 | | | | | | December 2020 | | | | | |
|--|--|---------------|------|------|------|-------|------|---------------|------|------|------|-------|------|
| Priority activities | | AFRO | EMRO | EURO | PAHO | SEARO | WPRO | AFRO | EMRO | EURO | PAHO | SEARO | WPRO |
| National and regional vector control strategic plans developed/adapted to align with global vector control response | | | | | | | | | | | | | |
| FOUNDATIONS | National vector control needs assessment conducted or updated and resource mobilization plan developed (including for outbreak) | | | | | | | | | | | | |
| | National entomology and cross-sectoral workforce appraised and enhanced to meet identified requirements for vector control | | | | | | | | | | | | |
| | Relevant staff from Ministries of Health and/or their supporting institutions trained in public health entomology | | | | | | | | | | | | |
| | National and regional institutional networks to support training/education in public health entomology and technical support established and functioning | | | | | | | | | | | | |
| National agenda for basic and applied research on entomology and vector control established and/or progress reviewed | | | | | | | | | | | | | |
| PILLARS | National inter-ministerial task force for multi-sectoral engagement in vector control established and functioning | | | | | | | | | | | | |
| | National plan for effective community engagement and mobilization in vector control developed | | | | | | | | | | | | |
| | National vector surveillance systems strengthened and integrated with health information systems to guide vector control | | | | | | | | | | | | |
| | National targets for protection of at-risk population with appropriate vector control aligned across vector-borne diseases | | | | | | | | | | | | |

Challenges

- Resource generation at three levels
- Need for improved coordination mechanisms

Suggested future directions

- Enhanced country implementation support (RO/CO to lead)
- Documentation of case studies
- Expert Advisory Committee being constituted
- Working across diseases, country focus, integrated surveillance

Planned

- **Case studies:** to highlight GVCR success stories
- **VCNAs:** to assess needs and develop national plans
- **Technical trainings:** to promote capacity building in surveillance, IRM, clinical management
- **New reporting system:** to improve analysis of progress and identify deficiencies and target planning
- **Regional meetings:** to promote networks, share challenges progress, etc.