

Response to Outbreaks

Integration of scientifically robust research as part of the response

Dr Ana Maria Henao-Restrepo
Lead WHO R&D Blueprint for Epidemics
World Health Organization

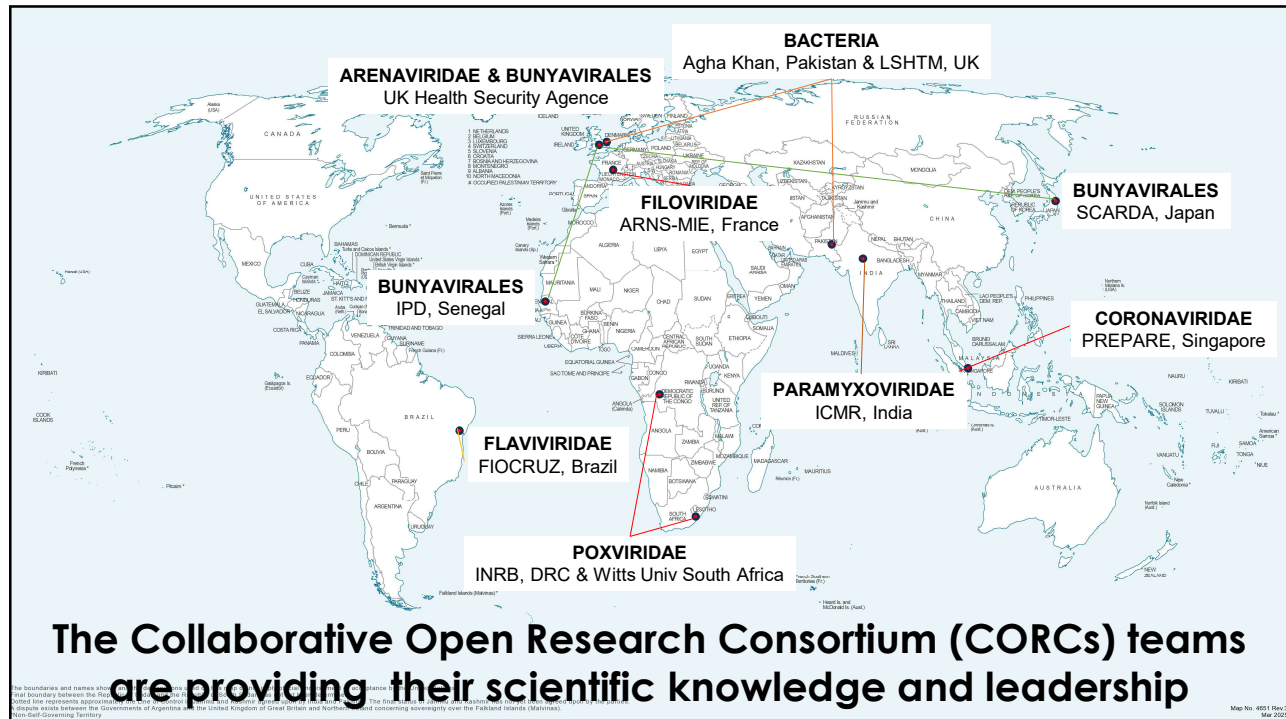


R&D Blueprint
Powering research
to prevent epidemics

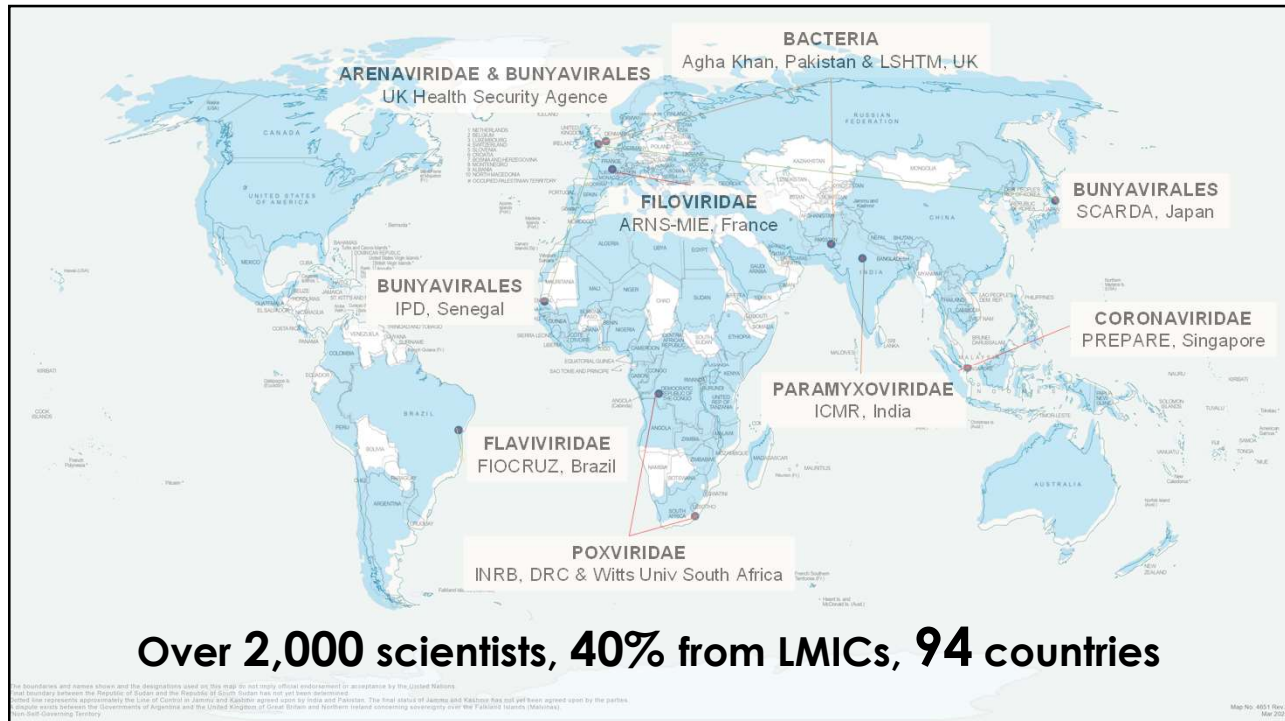


World Health Organization

1



2



3

The pathogen Family R&D Roadmaps are here!

Priority Family	R&D Roadmap	OPEN presentation R&D Roadmap
Arenaviridae	YES	15 April 2026
Bacteria (5 Bacteria)	YES	29 April 2026
Bunyavirales (4 Families)	YES	5 May 2026
Coronaviridae	YES	15 April 2026
Filoviridae	YES	27 April 2026
Flaviviridae	YES	3 June 2026
Paramyxoviridae	YES	24 April 2026
Poxviridae	YES	10 June 2026

Nearly 100 consultations including some of thematic areas preceded the preparation of these Family R&D Roadmaps

<https://www.perplexity.ai/computer/a/who-r-d-blueprint-pandemic-pre-U6sBQhiuS7SjQB5iLaslBg>

4

A decade of building the network of networks.

Since WHA68.10 in 2015 when the WHO R&D Blueprint for Epidemics was created by the WHA — and reinforced by the Pandemic Agreement in May 2025 — we have moved from pathogen-by-pathogen preparedness to a family-level, collaborative research architecture.

9

CORCs convening priority pathogen Families

2,000+

scientists engaged across the CORC networks

40%

of CORC scientists based in LMICs

12 + 5

priority viral families and bacterial pathogens

The scientific architecture is in place. The infrastructure that lets it operate as one ecosystem needs reinforcement — day-to-day and in crisis — we are nearly there.

CORCs + Donors Meeting - April 2026 2 / 9

5

Navigator's approach to pandemic R&D

Examples of some of the TOOLS, not all are represented here

Comprehensive R&D Roadmaps

- priority pathogens
- knowledge gaps
- R&D priorities
- timelines

Target Product Profiles (TPPs)

- product characteristics
- use cases
- performance targets

CORE protocols

- Openly debated
- Best Science
- Pre-approved

Candidate MCMs landscape

Independently reviewed & prioritized
Considerations to safety & efficacy
Clear path for equitable access

Equitable access to MCMs during epidemics & pandemics

Some have emphasized the importance of speed and sometimes cost in responding to future pandemics. It is equally important in considering the entire value chain to take a broader view that recognizes the primary importance of quality, equity in access, and trust in the product's safety and efficacy

Fragmented R&D, inequitable access

A Global Collaborative Open Research framework
So that SCIENCE is used to inform R&D priorities

CORCs

Involving >2000 scientists, about 40% from LMICs

6

A decade of integrating research into the response



Time from PHEIC/outbreak declaration to trial start for Ebola vaccine studies, 2015-2025

The scientific architecture is in place. The infrastructure that lets it operate as one ecosystem needs reinforcement — day-to-day and in crisis — we are nearly there.

7

Shared stewardship is required

BEFORE EPIDEMIC

Prepare for the inevitable

- 1 Collaborative Open Research Consortium
- 2 Knowledge sharing
- 3 Support R&D in all Priority pathogen Families
- 4 R&D Roadmap
- 5 Funding
- 6 Pre-approved CORE protocols
- 7 Collaboration & Partnerships
- 8 Expand local capacity
- 9 Regulatory review & Policy development

8

Commit to stewardship during outbreaks

DURING EPIDEMIC

Fast access to interventions

- 1** Research priorities setting for the specific outbreak including experts and researchers from affected country(ies)
- 2** Independent recommendations on which candidate MCMs should be evaluated first in the context of the outbreak
- 3** Independent recommendations on CORE protocols to assess candidate MCMs
- 4** Scientific support for implementation of priority research
- 5** Strategic coordination of various global stakeholders and communication regarding outbreak status

9



WHO R&D BLUEPRINT FOR EPIDEMICS

Pandemic Preparedness & Research

KEY GOAL

Accelerating the development and evaluation of medical countermeasures at the family level to support R&D during epidemics and pandemics, using a collaborative effort that not only emphasizes the importance of speed and cost, but also considers equally important safety and efficacy, equity in access, and trust in the product's quality.

PAGE SECTIONS

- 1** A Scientific Framework
- 2** Landscape of Medical Countermeasures
- 3** CORCs
- 4** Family R&D Roadmaps
- 5** Outbreaks and R&D
- 6** Tools & CORE Protocols
- 7** Acknowledgements

<https://www.perplexity.ai/computer/a/who-r-d-blueprint-pandemic-pre-U6sBQhiuS7SjQB5iLaslBg>

10

A **candidate/investigational/experimental** MCMs is **NOT** yet licensed because it lacks evidence on efficacy and safety

The **architecture** exists

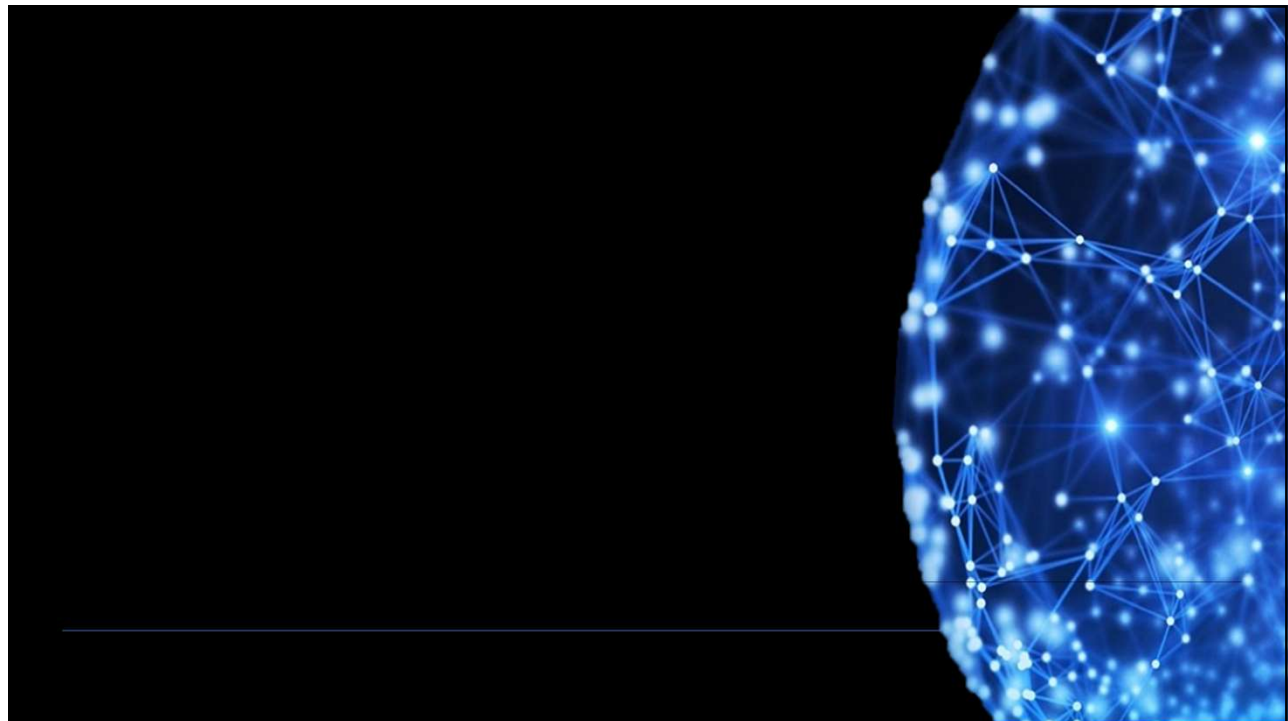
The **scientific** critical mass is ready to contribute

The experience indicates it is possible to integrate **high-quality research** into outbreak response

We have all a mandate and the ethical responsibility to ensure the best science, the most promising candidates are evaluated using the most robust methods.



11



12