

# COVID-19 SURGE AND RESPONSE:

## RAPID, REMOTE ASSISTANCE TO MODEL NEEDS AND MOBILIZE HEALTH WORKERS

Frontline health workers are the backbone of national responses to COVID-19 yet are often in short supply even in normal times. IntraHealth International offers a rapid and remote approach to enable countries affected by the COVID-19 pandemic to:

- **Identify populations at risk for severe symptoms of COVID-19** due to underlying conditions such as HIV, diabetes, hypertension, smoking, and advanced age
- **Model the timing and magnitude of case surge, the number and locations of frontline health workers, and the needs for personnel, beds and ventilators** using locally applicable epidemiological models designed for COVID-19.
- **Rapidly mobilize and prepare their health workforces to address COVID-19**, while minimizing negative impact on essential health services such as HIV/AIDS care and treatment, family planning, and maternal and child health care.

### INTRAHEALTH'S APPROACH

Drawing on our deep experience in health workforce planning, management, and information systems (iHRIS), IntraHealth developed a rapid and remote technical assistance approach and implementation guidance. We apply modeling tools originally developed by the World Health Organization (WHO)'s European office to African contexts—[the Adaptt Surge Planning Support Tool \(Adaptt\)](#) and [the Health Workforce Estimator \(HWFE\)](#)—along with a tailored version of WHO's Workload Indicators of Staffing Need (WISN) methodology.

	Adaptt	HWFE
Inputs	<ul style="list-style-type: none"> <li>• Epidemiological models for selection</li> <li>• Daily entry of cases and severity</li> <li>• Overall Attack Rate</li> <li>• Mitigation measures</li> <li>• Staffing ratios generated from HWFE and WISN</li> </ul>	<ul style="list-style-type: none"> <li>• Number and severity of cases from Adaptt; daily reported hospitalizations</li> <li>• Staff categories assigned to COVID-19 response from iHRIS</li> <li>• Workload standards for treatment developed using WISN</li> </ul>
Outputs	<ul style="list-style-type: none"> <li>• Outbreak curve over time</li> <li>• Graphical presentation of current &amp; future resource needs (e.g., beds, by cadre)</li> </ul>	<ul style="list-style-type: none"> <li>• Workforce needed by health facilities</li> <li>• Number of cases that can be handled by each facility per day</li> <li>• Predicted workforce gaps by cadre</li> </ul>

## HOW IT WORKS

### 1. **Identify populations at risk and model**

**projected workforce needs.** We deploy the Adaptt and HWFE tools for projecting COVID-19 cases and work with governments to apply WISN to address a country's distinctive situation (e.g., available cadres, types of services) by:

- Providing geospatial modelling of proposed disease hotspots with advanced analytics that use existing internationally available demographic data sets.
- Assisting in determining the projected COVID-19 caseload for an upcoming period and its impact on health facilities. These determinations take into account expected local spread of COVID-19 using historical data from the country context and consider local standards of care and resources. We also consider the target country's COVID-19 prevention, testing, and treatment guidelines.
- Leveraging existing data from human resources information systems (e.g., iHRIS) and other data sets (e.g., professional councils) to assess current health worker availability and location in relation to COVID-19 needs.

### 2. **Prepare health workforce surge plans**

to address COVID-19 scenarios, including estimated cost of deployment. Where estimated shortages exist, plans use health workforce data to consider 1) reallocation of existing workers; 2) identification of health workers currently not working for hiring under short-term contracts; 3) recall of recently retired workers (while ensuring those most at-risk of COVID-19 are not assigned to direct COVID-19 patient care); and 4) given the need, consideration of deploying health professional students close to completing their studies to support health services not requiring an active practice license.

### 3. **Support governments to expedite recruitment,**

**contract processes, and onboarding** by streamlining standard operating procedures. Where appropriate, we can introduce online

systems that have been successfully deployed in Uganda and proven rapid-hire approaches from Kenya, Uganda, and Namibia. We will support orientation of newly deployed health workers, adapting existing online tools. Orientation topics include infection prevention and control, use of personal protective equipment, COVID-19 risk communication, controlling occupational hazards and improving workplace safety, and stress and anxiety management.

## RESULTS TO DATE

IntraHealth piloted the approach in Mali and Kenya in April-June 2020. In Mali, results have been used to increase the number of beds allocated to COVID-19, reconsider cadres of staff treating COVID-19 in advance of a surge in hospitalization of moderate cases, and train teams in each region on the tools as the main means of workforce allocation for COVID-19 response. In Kenya, results have been used to mobilize resources at county level in Mombasa in anticipation of case surge and to train county officials to implement the tools in Nakuru.

## ABOUT INTRAHEALTH INTERNATIONAL

IntraHealth is a non-profit organization that improves the performance of health workers and strengthens the systems in which they work. We offer technical assistance to build resilient, prepared health systems; prevent and respond to pandemics and other threats; and develop strong local technical and management capacity to sustain systems for the long haul.

## CONTACT

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