



# WEEKLY EPIDEMIOLOGICAL BULLETIN WEEK 20 – 2023

(15 - 21 May 2023)

Editorial message

Effective and efficient disease surveillance system contribute to the reduction of morbidity, disability and mortality from disease outbreaks and health emergencies.

This weekly bulletin presents the epidemiological status of the priority diseases, conditions, and events under surveillance in Rwanda. These data are useful to trigger a rapid response for rapid impact, actions and results oriented, a proactive preparedness, risk mitigation and prevention, intelligence, real-time information, and communication for decision making.

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# KEY EPIDEMIOLOGICAL HIGHLIGHTS EPIDEMIOLOGICAL WEEK 20

#### Event Based Surveillance (EBS) Highlights:

- During epidemiological week 20, no alert was notified through the electronic Community Event Based Surveillance System (eCBS).
- No alert was received through Epidemic Intelligence from Open Source (EIOS):

#### Indicator Based Surveillance (IBS) Highlights:

- 142 immediate reportable diseases were notified by health facilities countrywide. They include cases of foodborne illness, acute flaccid paralysis (AFP), mumps, severe malaria; bloody diarrhea, measles/rubella, chicken pox, cholera, bacterial meningitis and typhoid fever.
- 8 weekly reportable diseases and health events that include flu syndrome, simple malaria, severe pneumonia for under 5 years, non-bloody diarrhea for under 5 years, COVID-19, dog bites, brucellosis, and trypanosomiasis, are being reported on a weekly basis. A thorough analysis conducted for Epi Week 20 revealed that, all were below the epidemic threshold, indicating that there was no outbreak caused by these diseases during that Epi Week 20.
- A total of 64 deaths were reported through the electronic Integrated Disease Surveillance and Response (eIDSR) system. The majority of deaths were classified as perinatal and deaths of children under the age of 5.

#### Ongoing outbreaks

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In Epi Week 20, there were two outbreaks in Rwanda, one new outbreak and one ongoing:

- 1. Foodborne illness outbreak in Kicukiro district (new)
- 2. Measles outbreak in Kirehe district (ongoing)

#### Other health event updates

The occurrence of floods and landslides caused by heavy rainfall occurred on 2<sup>nd</sup> May 2023 in Rwanda. It has affected 10 districts in Northern, Southern and Western Province s. As of 26<sup>th</sup> May 2023, 135 deaths, 134 burried,1 missing ,111 injured,7 hospitalized, 104 discharged, have been reported from the three provinces. In addition, a total of 5174 households have been destroyed by the floods.

#### Completeness and timeliness

In Epi Week 20, the overall completeness and timeliness of reporting in Rwanda was 94% and 93%, respectively.

**Description:** Event Based Surveillance (EBS) is a type of public health surveillance system that detects and reports unusual health events or disease outbreaks in a timely manner. The system is designed to detect signals of potential public health threats and allow a rapid response to prevent or control the spread of diseases. RBC is implementing EBS through PHS&EPR Division.

Currently, an electronic Community Event Based Surveillance System (eCBS) and Epidemic Intelligence from Open Source (EIOS) are being used to detect and report events of public health importance from the community and media. The process for establishment of other types of EBS is still being on going.

#### COMMUNITY EVENT BASED SURVEILLANCE

During the Epi week 20, no alert received from community.

### MEDIA SCAN

During the Epi week 20, no alert was received through Epidemic Intelligence from Open Source (EIOS):

## WEEKLY UPDATES ON INDICATOR BASED SURVEILLANCE (IBS) EPIDEMIOLOGICAL WEEK 20

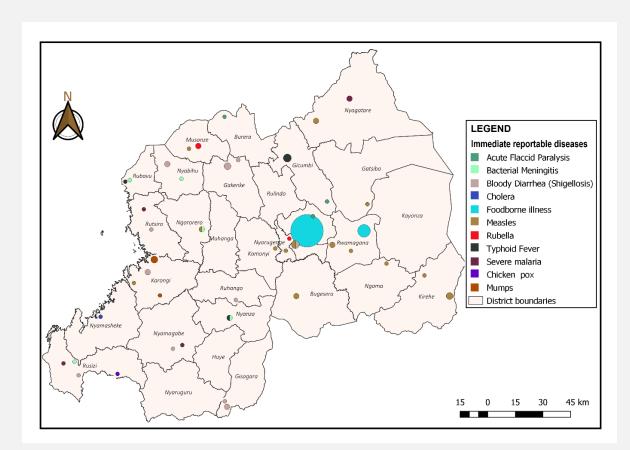
**Description:** Rwanda has been implemented Indicator Based Surveillance according to the IDSR 3rd guidelines where approximately 45 priority diseases, health conditions and public health events are being monitored and reported from health facilities countrywide on a regular basis. Diseases that are prone to outbreaks are being reported immediately within 24 hours after detection while diseases that are considered as endemic are reported on a weekly basis, every Monday before midday.

## A. IMMEDIATE REPORTABLE DISEASES - EPI WEEK 20

During the Epi week twenty, 142 cases and suspected cases for immediate reportable diseases were notified:

76 cases of foodborne illness,23 suspect cases of measles/rubella, 18 cases of bloody diarrhea, 4 cases of mumps, 5 confirmed cases of severe malaria, 4 suspected cases of bacterial meningitis,3 acute flaccid paralysis, 6 suspect cases of Typhoid fever,1 case of chicken pox and 1suspected case of cholera ( see figure below).

**Notes:** For the diseases requiring laboratory confirmation, samples were collected and sent to the National Reference Laboratory for testing. Meanwhile cases/suspected cases had been managed at the health facility level.



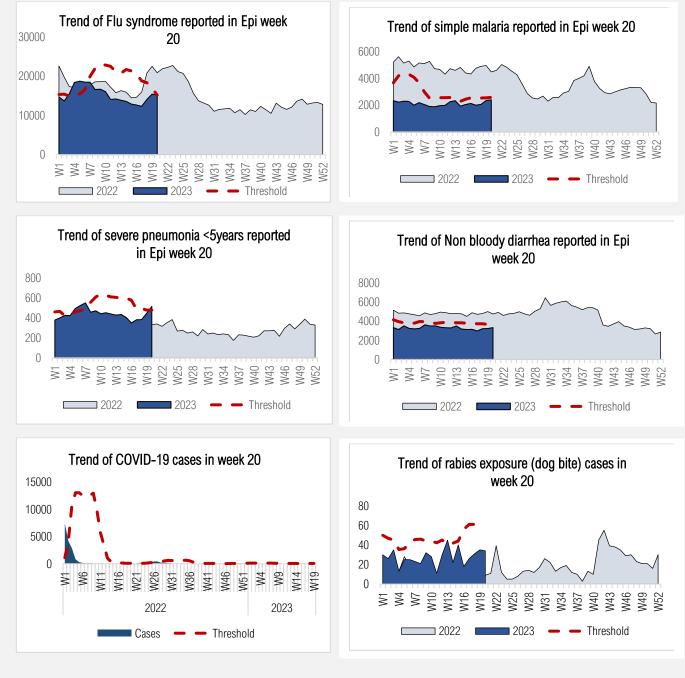
Distribution of immediate reportable diseases in Epi week 20

#### B. WEEKLY REPORTABLE DISEASES - EPI WEEK 20

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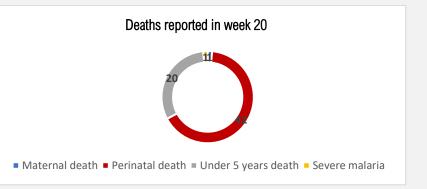
**Description:** In Rwanda, after the adaptation of the IDSR 3rd edition, eight diseases & events are being reported and analyzed on a weekly basis. These include flu syndrome, simple malaria, severe pneumonia for under 5 years, non-bloody diarrhea for under 5 years, COVID-19, dog bites, brucellosis, and trypanosomiasis. The monitoring trends of these weekly reportable diseases or health events helps to detect an unusual increase early.

In Epi Week 20, a thorough analysis was conducted, comparing the number of reported cases of the eight diseases monitored on a weekly basis to the epidemic thresholds. The results of the analysis revealed that all weekly reportable diseases were below their respective epidemic thresholds. This indicates that there were no outbreaks of these diseases during epi week 20.



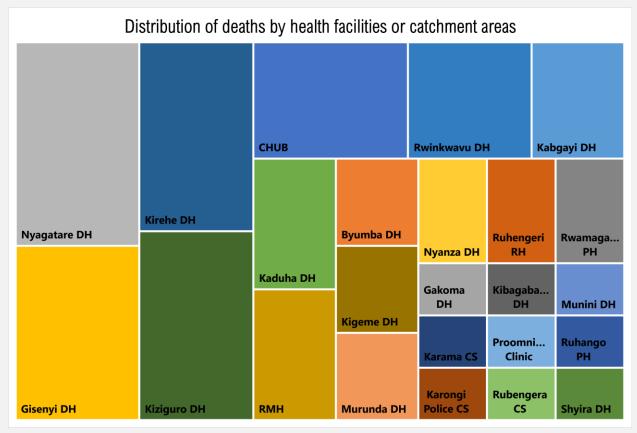
#### C. DISTRIBUTION OF REPORTED DEATHS IN eIDSR - EPIDEMIOLOGICAL WEEK 20

In Epi week 20, as summarized in the chart below, a total number of 64 deaths were reported through the electronic Integrated Disease Surveillance and Response (eIDSR) system. Among these deaths, 42 (66%) were classified as perinatal, 20 (31%) were deaths of children under 5 years old, 1(2%) was maternal death and 1(2%) death due to severe malaria.



#### Cause of deaths declared in epi week 20

Deaths were reported from various catchment areas as follow: 7 deaths in Nyagatare DH; 6 in Gisenyi DH,Kirehe DH, Kiziguro DH, 5 deaths in CHUB, 4 Rwinkwavu DH, 3 deaths in Kabgayi DH, Kaduha DH,RMH; 2 deaths in Byumba DH, Kigeme DH, Nyanza DH, Murunda DH, Ruhengeri RH, Rwamagana PH,and 1 death in Gakoma DH, Kibagabaga DH, Munini DH, Ruhango PH, Shyira DH, Karama(Kayonza) HC, Karongi (Gisunzu) police HC, Proomnibus clinic (Musanze) and Rubengera HC. (See figure below).



# OUTBREAK AND EVENT UPDATES EPIDEMIOLOGICAL WEEK 20

#### 1. FOODBORNE ILLNESS OUTBREAK AT KICUKIRO DISTRICT

Confirmed cases:	0	Date reported:	MAY 21, 2023	Risk assessment	Low
Suspect cases:	66	Source:	Masaka DH		
Death(s):	0	District:	Kicukiro		
Total cases:	66	Geoscope:	Low		

**Outbreak description:** On 21 May 2023, Masaka DH received the alert and visited Saint Vincent Pallotti Masaka school, following Dothan clinic alert of increased and sudden occurrence of unspecified cases of febrile digestive syndrome from the school from Friday may 19th, 2023. Main symptoms presented by affected students were diarrhea, vomiting, abdominal pain. Sixty-six (66) students consulted Dothan clinic, they received medical care as outpatients, nobody was hospitalized and no death occurred.

#### Interventions for foodborne illnesses

- o Case management at health facilities
- o Outbreak investigation

## MEASLES OUTBREAK

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Confirmed cases	8	Date reported:	February 27, 2023	Risk assessment	Low
Epi link cases	53 (5 new)	Source:	NRL, eIDSR		
Death(s)	0	District:	Kirehe		
Total cases	61	Geoscope:	Low		

**Outbreak description:** The measles outbreak is still ongoing in Kirehe district since 27<sup>th</sup> February 2023. During Epi Week 20; five additional cases were identified in Mahama Refugee camp by epidemiological link making it a total of 8 laboratory confirmed cases and 53 cases confirmed by epidemiological link. Among the new cases, 4 were not vaccinated.

#### **Ongoing interventions**

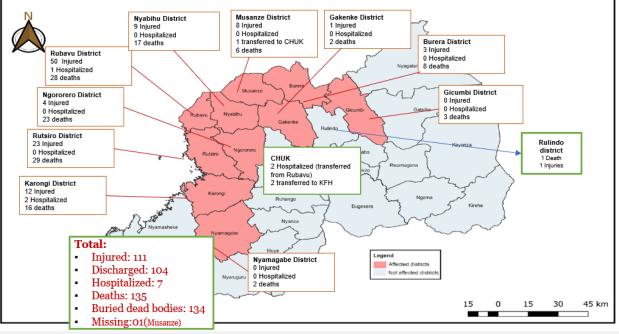
- o Continuous active cases search
- o Case management (treatment, isolation)
- Vaccination

## 3. OTHER EVENT UPDATES: FLOOD AND LANDSLIDES IN RWANDA

Injured	111	Date reported:	May,3 2023	Risk assessment	Moderate
Hospitalized	7	Source:	MINEMA		
Discharged	104	Provinces	Western, Northern, Southern		
Death(s)	135	Geoscope:	Moderate		

**Event description:** The ministry in charge of emergency management (MINEMA) reported the occurrence of floods and landslides caused by heavy rainfall which occurred on 2<sup>nd</sup> May 2023. The floods and landslides affected 10 districts in the Northern, Southern and Western of the country.

As of 26<sup>th</sup> May 2023, 135 deaths, 134 burried,1 missing ,111 injured,7 hospitalized, 104 discharged, have been reported from the three provinces. In addition, a total of 5174 households have been destroyed by the floods.



Distribution of injuries and deaths as of 26th May 2023

Rutsiro district has the highest number of deaths (29), seconded by Rubavu district (28 deaths), Ngororero 23 detahs, then Nyabihu and Karongi districts that reported respectively 17 and 16 deaths. The six remaining districts had less than 10 deaths.

For injuries, Rubavu district has the highest number of injured persons: 50, seconded by Rutsiro that counts 23 injuries and other affected districts have  $\leq$  12 injuries.

#### **Ongoing interventions**

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MINEMA activated a command center that coordinates the response. Some measures taken include:

- Evacuation and temporary relocation of residents from the high-risk areas,
- Provision of food, and other basic supplies to displaced persons.
- Daily management of people in temporary sites.

## eIDSR REPORTS COMPLETENESS & TIMELINESS EPIDEMIOLOGICAL WEEK 20

In Rwanda, eIDSR reports completeness and timeliness are scored as follow: Greater or equal to 80%: High, Between 60% and 79%: Moderate, less than 60%: Low.

In Epi Week 20, the overall completeness and timeliness of reporting in Rwanda were 94% and 93%, respectively. With regards to report completeness, many DH catchment areas that had a score greater than 80%, but one hospital scored moderate score: Ruhango PH, had 63%; while two hospitals did not report: Kacyiru and King Faysal hospital.

As for timeliness, the overall score was moderate: 93%, many hospitals catchment areas had the score greater than 80%, but one had moderate score: Ruhango, while Kacyiru and King Faysal hospital did not report.

See on the figure below.

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**Notes:** it is important to note the health facilities that did not performed are recommended to improve their reporting by providing complete reports on time in order to achieve effective surveillance and early detection of outbreaks. Details, on completeness and timeliness for all health facilities are confined in the figure below.

|                               |                    |       | 1          |                  | C                                       | ompl       | eteness          | _     |            |       |                  | _                |           |            |                    |           |       |                | -              |                  | 1             | limelir       | ness                                |                    |               |               |                         |               |
|-------------------------------|--------------------|-------|------------|------------------|-----------------------------------------|------------|------------------|-------|------------|-------|------------------|------------------|-----------|------------|--------------------|-----------|-------|----------------|----------------|------------------|---------------|---------------|-------------------------------------|--------------------|---------------|---------------|-------------------------|---------------|
| Hospital<br>catchment<br>area | W01W02             | wos   | woa        | WOEWO            | 16W07                                   | 7.000      | W00W1            | 0.W11 | W121       | W19 V | 11 A W           | 15W16            | w17       | W10        | V10W20             | wo        | 1.002 | woow           |                | 15 100           | 8 W07         | wnow          | 000                                 | v10W11             | W12M          | /1214         | 11 4 141                | 5W16          |
| Nyagatare                     | 100 100            |       | 100        | 100 8            |                                         | 93         |                  |       | 1 1        |       |                  | 10 100           | 1 1       | 94         | 86 100             | 100       |       |                |                | 0 86             |               |               | _                                   | 93 100             |               |               | 79 86                   |               |
| Gatunda                       | 100 100            | 100   | 100        | 100 10           | 0 100                                   | 100        | 100 78           | 3 100 | 100        | 89 1  | 100 10           | 0 100            | 100       | 100        | 100 100            | 100       | 100   | 100 1          | 00 10          | 0 100            | 100           | 100 1         | 100                                 | 78 89              | 100           | 89 1          | 00 100                  | 0 100         |
| garama                        | 88 100             | 100   | 100        | 100 10           | 100                                     | 100        | 100 10           | 0 100 | 100        | 100 1 | 100 10           | 0 100            | 100       | 100        | 100 100            | 88        |       |                | 00 10          | 0 100            | 88            | 100 1         | 100                                 | 100 100            | 100 1         | 100 1         | 00 100                  | ) 100         |
| Kiziguro                      | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 10           |       | 100        |       | 92 10            |                  |           | 100        | 100 100            | 100       |       |                | 00 10          |                  | ) 100         |               |                                     | 100 100            |               | 100 !         | 92 100                  |               |
| Gahini<br>Rwinkwavu           | 100 100<br>100 100 |       | 100        | 100 10<br>100 10 |                                         | 89<br>100  | 78 10<br>100 10  |       | 78<br>99   |       | 100 10<br>88 8   |                  |           | 78         | 100 100<br>100 100 | 100       |       | 100 1<br>100 1 | 00 10<br>00 10 | 0 89<br>0 100    | 89<br>) 100   |               | 78 <sup>-</sup><br>100              | 100 100<br>88 88   | 78 1<br>88 1  |               | 00 100<br>63 75         |               |
| Kibungo                       | 100 100<br>94 100  |       | 100<br>100 | 100 10           |                                         | 100        | 100 10           |       | 88<br>100  |       | 00 0<br>94 10    |                  |           | 100<br>94  | 100 100            | 94        |       |                | 00 10          |                  | ) 100         | 100 1         | 100                                 | 100 100            | 100 1         |               | 94 100                  | 0 100         |
| Kirehe                        | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 90           |       | 100        |       |                  |                  |           | 100        | 100 100            | 100       |       |                | 00 9           | 5 95             | 100           | 100 1         |                                     | 90 95              | 100 1         | 100           | 90 100                  | 0 100         |
| Rwamagana                     | 76 71              | 88    | 100        | 100 9            | 4 100                                   | 100        | 94 10            | 88 0  | 94         | 100 1 | 100 10           | 00 100           | 100       | 100        | 94 100             | 76        | 65    | 53 8           | 2 7            | 6 88             | 100           | 100           | 94 1                                | 100 100            | 94 !          | 94 !          | 94 100                  | 88 0          |
| Vyamata                       | 100 94             |       | 94         | 100 10           |                                         | 100        | 100 10           |       |            |       | 100 10           |                  |           | 88         | 100 94             | 100       |       |                | 4 8            |                  |               |               | 88 1                                | 100 88             |               | 94            | 76 100                  |               |
| linihira                      | 100 100<br>93 87   |       | 100        | 100 10           |                                         | 89         | 100 89           |       | 100        |       | 89 8             |                  |           | 100        | 100 100            | 100<br>93 |       |                | 00 8<br>3 10   | 9 100<br>10 100  | ) 89<br>) 100 | 67 1<br>100 1 |                                     | 89 78<br>93 93     | 89 1<br>100 ! | 93 1          | 89 89<br>00 100         | 9 89<br>0 100 |
| lutongo<br>Satonde            | 93 87<br>100 86    |       | 87<br>100  | 100 10<br>100 10 |                                         | 100        | 100 93<br>100 86 |       | 100<br>100 |       | 100 10<br>100 10 |                  |           | 100        | 100 100<br>100 100 | 100       |       |                |                | 0 100            | ) 100         | 100 1         | 100                                 | 86 100             | 100           | 86 1          | 00 100                  | 0 100         |
| utaro                         | 80 85              |       | 95         | 75 9             |                                         | 95         | 95 10            |       | 100        |       | 100 10           |                  |           | 95         | 100 90             | 80        | 85    | 80 7           | 5 6            | 5 90             | 85            | 95            | 90                                  | 95 90              | 90            | 85            | 75 85                   | 5 95          |
| tuli                          | 100 100            | 100   | 100        | 100 10           | 100                                     | 100        | 100 10           | 0 90  | 90         | 100 1 | 100 10           | 00 100           | 100       | 100        | 100 100            | 100       | 100   | 100 1          | 00 10          | 0 100            | 90            | 100 1         | 100 1                               | 100 90             | 90 1          | 100 1         | 00 100                  | 0 90          |
| lemba                         | 100 100            |       | 100        | 100 8            |                                         | 100        | 100 89           |       | 100        |       | 89 10            |                  | 100       | 89         | 100 100            | 100       |       |                | 00 10          |                  | 100           | 100 1         |                                     | 89 78              |               | _             | 78 100                  |               |
| tuhengeri<br>Iyumba           | 94 94<br>96 100    |       | 100<br>96  | 83 8<br>96 9     |                                         | 89<br>100  | 100 94<br>100 96 |       | 83<br>96   |       | 89 9<br>92 10    | 4 89<br>00 100   | 94<br>100 | 94<br>96   | 100 100            | 94<br>96  | _     | 89 1<br>96 0   | 008<br>168     | 3 89<br>8 96     | 83            | 72<br>100 1   | 94<br>100                           | 94 94<br>96 96     | 78<br>96      | 94  <br>96    | 83 89<br>81 96          | 9 89<br>6 96  |
| HUB                           | 0 100              |       | 100        | 100 10           |                                         | 100        | 0 0              | 100   | 100        | 100   | 0 10             | -                |           |            | 100 100            | 0         | 100   | 100 1          | DO 10          | 0 100            | ) 100         |               | 0                                   | 0 0                |               | 100           | 0 100                   | 0 10          |
| abutare                       | 84 95              | -     | 100        | 95 9             |                                         | 95         | 89 95            |       | 100        |       | 89 10            |                  |           | 95         | 100 100            | 84        |       |                | 5 8            | 4 89             | 89            | 89            | 84                                  | 95 74              |               | 100           | 79 100                  | 0 10          |
| abgayi                        | 100 100            |       | 85         | 100 93           |                                         | 92         | 92 10            | -     | 92         |       |                  | 00 100           | 92        | 100        | 100 100            | 100       |       |                | 5 9            |                  |               |               | 85                                  | 100 92             |               | _             | <mark>69</mark> 92      | -             |
| bilizi                        | 100 100            | -     | 100        |                  | 0 100                                   | 100        | 100 10           |       |            | _     |                  | 0 100            |           | 100        | 100 100            | 100<br>83 |       |                | 00 10<br>00 8  |                  |               | 100 1<br>100  | 100 <sup>-</sup><br>83 <sup>-</sup> | 100 100<br>100 100 | 82            |               | B2 91<br>50 83          |               |
| akoma<br>twe                  | 83 100<br>100 100  |       | 100<br>100 | 83 10<br>100 7   | 100 100 B 100                           | 100<br>100 | 83 10<br>100 10  |       | 100<br>100 |       | 100 10<br>89 10  | 00 100<br>00 100 |           | 83<br>89   | 67 100<br>100 100  | 100       |       |                | JU 8<br>19 8   | 3 67<br>9 78     | 100           |               |                                     | 100 100            |               |               | 67 100                  |               |
| uhango                        | 88 100             |       | 100        | 88 8             |                                         |            | 88 10            |       |            |       |                  | 3 75             |           | 88         | 75 63              | 88        |       |                | 00 8           |                  |               |               |                                     | 88 100             |               |               | 50 63                   |               |
| emera<br>Ikoma                |                    | 100   | 93         |                  |                                         |            | 100 10           | 0 100 |            |       |                  |                  |           | 100        | 93 100             | 100       | 100   | 100 9          | 3 10           | 0 100            | ) 100         | 100 1         | 100                                 | 100 93             | 100           | 93            | 93 93                   | 3 10          |
| yanza                         | 100 100<br>84 84   |       | 93<br>79   | 100 10<br>95 10  |                                         | 89         | 100 10<br>74 95  |       |            |       | 100 10<br>89 10  |                  |           | 89         | 93 100<br>100 100  | 84        |       |                | 9 7            |                  |               |               |                                     | 89 84              |               |               | 47 89                   | _             |
| geme                          | 77 77              |       | 92         | 100 93           |                                         | 100        | 100 10           |       | 100        |       | 85 10            |                  |           | 100        | 100 92             | 77        | 69    |                | 2 10           |                  | 100           |               | 100 1                               | 100 92             |               | 92            | 46 100                  |               |
| duha                          | 100 90             |       | 100        | 100 10           |                                         | 100        | 100 10           | 0 100 | 100        | 90 1  | 100 10           | 00 100           | 90        | 90         | 90 90              | 100       |       |                | 00 10          |                  | 100           | 100           | 90 '                                | 100 100            |               | 90            | 80 90                   | ) 10          |
| unini                         | 100 94             |       | 100        | 100 9            |                                         | 100        | 100 10           |       | 100        |       | 100 10           |                  |           | 88         | 94 100             | 100       |       |                | 00 10          |                  |               | 100 1         |                                     | 94 88              | 94 1          |               | B2 100                  |               |
| shenge<br>oogora              | 100 100<br>100 100 | -     | 100<br>100 | 100 10<br>100 10 | 100 100 100 100 100 100 100 100 100 100 | 100<br>100 | 100 10<br>100 10 | -     | 100<br>100 |       | 100 10<br>100 10 | -                |           | 100<br>100 | 88 100<br>100 93   | 100       |       |                |                | 00 100<br>00 100 |               |               | 100 <sup>-</sup>                    | 100 100<br>100 100 |               |               | 00 100                  | _             |
| buye                          | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 10           |       | 100        |       |                  |                  |           | 100        | 100 93             | 100       |       |                |                | 0 100            |               |               |                                     | 100 100            |               |               | 00 100                  |               |
| irinda                        | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 10           |       | 100        |       | 100 10           |                  |           | 100        | 83 100             | 100       | 100   | 100 1          | 00 10          | 00 100           | 100           | 100 1         | 100                                 | 100 100            | 100 1         | 100           | 83 100                  | 0 10          |
| ugonero                       | 100 100            |       |            |                  | 0 100                                   |            |                  |       |            |       |                  | 00 100           |           |            | 100 100            | 100       |       |                | 00 8           |                  |               |               |                                     | 100 86             |               |               | B6 100                  | _             |
| hyira<br>Iubororo             | 100 100            |       | 100        | 100 8            |                                         | 100        | 100 10           |       | 100        |       | 94 10            |                  |           | 100        | 76 100             | 100       |       |                |                | 0 88<br>0 100    |               |               | 100 <sup>-</sup>                    | 100 100<br>100 100 |               |               | 88 94<br>80 70          |               |
| luhororo<br>abaya             | 100 100<br>86 100  |       | 100<br>100 | 100 10<br>100 10 |                                         | 100        | 100 10<br>86 10  |       | 100<br>100 |       |                  | 00 100<br>00 100 |           | 80<br>86   | 100 100<br>100 100 | 86        |       |                |                | 0 100            |               |               |                                     | 100 100            |               |               | 70 70 70 70 70 70 70 70 |               |
| ihundwe                       | 100 100            | -     | -          |                  | _                                       | -          | 100 10           | _     |            |       |                  | 0 100            |           |            | 100 100            | 100       |       |                | 00 8           |                  |               |               |                                     | 100 100            |               |               | 90 90                   | _             |
| libilizi                      | 100 100            | 100   | 100        | 100 10           | 100                                     | 100        | 100 10           | 0 100 | 100        | 92 1  | 100 10           | 0 100            | 100       | 100        | 100 100            | 100       | 100   |                | 00 10          | 00 100           | 100           |               |                                     | 83 100             | 100           | 92 1          | 00 100                  | 0 10          |
| isenyi                        | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 94           |       | 100        |       | 100 10           |                  |           | 100        | 100 100            | 100       |       |                | 00 10          | 0 100            |               |               |                                     | 94 94              |               |               | 00 88                   |               |
| urunda<br>HIIK                | 89 100<br>100 100  |       | 100<br>100 | 100 99<br>100 10 | 5 100<br>10 100                         | 100<br>100 | 100 10<br>100 10 |       |            |       |                  | 00 100<br>00 100 |           | 89<br>100  | 89 95<br>100 100   | 89<br>100 |       | 95 1<br>100 1  | DU 10<br>DO 10 | 0 95<br>0 100    |               | 95 1<br>100 1 |                                     | 95 95<br>100 100   |               | 84 !<br>100 1 | 95 100<br>00 100        | -             |
| HUK<br>yarugenge              | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 10           |       | 100        |       |                  | 0 100            |           | 100        | 100 100            | 100       |       |                |                | 0 100            |               | 89 1          | 100                                 | 100 100            |               |               | 00 100                  |               |
| uhima                         | 100 100            |       | 100        | 100 10           |                                         | 100        | 100 75           |       | 100        |       | 100 10           |                  |           | 100        | 100 100            | 100       |       |                | 00 10          |                  |               |               |                                     | 75 100             |               |               | 00 100                  |               |
| ИН                            | 100 100            |       | 100        |                  | 100                                     | 100        | 100 10           |       |            |       | 100 10           | -                | 0         | 100        | 100 100            | 100       |       |                | 00 10          | 0 0              | 100           | 100 1         | 100                                 | 100 100            | 100 1         | 100           | 0 0                     | 10            |
| asaka                         | 100 100            |       | 92         |                  | 100 100                                 | 100        |                  |       |            |       |                  | 0 100            |           | 100        | 100 100            | 100<br>90 |       |                |                | 0 92<br>n 95     |               |               |                                     | 92 100<br>100 90   |               | -             | 92 92<br>76 95          |               |
| gababaga<br>acyiru            | 90 86<br>0 100     |       | 95<br>100  | 90 99<br>100 10  |                                         | 100<br>100 | 90 10<br>100 10  |       | 100<br>100 |       | 95 10<br>100 10  |                  |           | 100        | 90 100<br>0 0      | 90        |       |                | 10 9<br>00 10  |                  |               |               |                                     | 100 90<br>100 0    |               |               | 0 0                     |               |
| FH                            | 0 0                | 100   | 100        | 100 10           |                                         | 100        | 0 10             |       | 100        |       | 100 10           |                  |           | 100        | 0 0                | 0         | 0     |                | DO 10          |                  | 0             | 100           | 0                                   | 100 100            | 100 1         | 100           | 0 100                   | 0 10          |
| iraes Ndera                   | 100 100            | ) 100 | 100        | 100 10           | 100                                     | 100        | 100 10           | 0 100 | 100        | 100 1 | 100 10           | 00 100           | 100       | 100        | 100 100            | 100       | 100   | 100 1          | 00 10          | 00 100           | ) 100         | 100 1         | 100 -                               | 100 100            | 100 1         | 100 1         | 00 100                  | 0 10          |
| /abikenke                     | 80 80              |       | 60         | 80 8             |                                         | 80         | 100 10           |       |            |       |                  | 0 100            |           |            | 100 100            | 80        |       |                |                | 0 80             |               |               |                                     | 100 100            |               |               | 60 100                  | _             |
| /anda                         | 90 95              | 98    | 97         | 98 9             | 7 98                                    | 98         | 94 96            | 6 99  | 97         | 97    | 94 9             | 9 99             | 94        | 96         | 93 94              | 90        | 93    | 93 9           | 6 9            | 5 93             | 93            | 94            | 92                                  | 94 91              | 94 !          | 95            | 78 91                   | 19            |