

# Comoros

This document is a compilation of all questions, justifications, and sources used to determine the 2021 Global Health Security Index scores for Comoros. For a category and indicator-level summary, please see the Country Profile for Comoros.

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## Category 1: Preventing the emergence or release of pathogens with potential for international concern

### 1.1 ANTIMICROBIAL RESISTANCE (AMR)

#### 1.1.1 AMR surveillance, detection, and reporting

##### 1.1.1a

**Is there a national AMR plan for the surveillance, detection, and reporting of priority AMR pathogens?**

Yes, there is evidence of an AMR plan, and it covers surveillance, detection, and reporting = 2, Yes, there is evidence of an AMR plan, but there is insufficient evidence that it covers surveillance, detection, and reporting = 1, No evidence of an AMR plan = 0

**Current Year Score: 0**

Comoros does not have a national AMR plan. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, Comoros had not established the capacity to conduct AMR activities, nor had it produced an AMR plan. It stated that in the absence of a national public health laboratory, the two laboratories designated roles in assisting with AMR work were those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health. Of these, only the El Maarouf laboratory's microbiology department was functional.[1] Neither of these institutions has an online presence, nor can media reports be found relating to work they may be doing on AMR. The main government website (which formerly contained pages on the health and agriculture ministries) is not functioning.[2] There is no information related to progress on AMR activities on the Facebook page of the health ministry, and the agriculture ministry has no online presence.[3] The National health policy 2015-2024 contains no information about AMR activities.[4] The World Health Organisation's library of national action plans does not contain a plan for Comoros.[5] The self-assessment on AMR submitted by Comoros to the WHO for the 2018-19 period stated that an AMR plan was under development.[6] An October 2019 presentation by the World Organisation for Animal Health (OIE) stated that there was no AMR surveillance program in Comoros.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.

[4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.

[5] World Health Organisation (WHO). "Library of national action plans." [<http://www.who.int/antimicrobial-resistance/national-action-plans/library/en/>]. Accessed 13 August 2020.

[6] World Health Organisation (WHO). "AMR self-assessment survey country responses 2018-19." [<http://amrcountryprogress.org/>]. Accessed 13 August 2020.

[7] World Organisation for Animal Health (OIE). October 2019. "Antibiotic use in Comoros." OIE Sub-regional Workshop on the database on antimicrobial agents for use in animals in Eastern and Southern Africa. [<https://rr-africa.oie.int/wp->

content/uploads/2019/10/halfane.pdf]. Accessed 13 August 2020.

### 1.1.1b

**Is there a national laboratory/laboratory system which tests for priority AMR pathogens?**

All 7 + 1 priority pathogens = 2 , Yes, but not all 7+1 pathogens = 1 , No = 0

**Current Year Score: 0**

Comoros does not have a national laboratory or a functioning system of AMR testing. According to the 2018 Joint External Evaluation (JEE) of IHR core capacities report for the country, Comoros had not established the capacity to conduct AMR activities nor did it have a national AMR plan. In the absence of a national public health laboratory, the two laboratories designated with roles in assisting with AMR work are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health. Of these, only the El Maarouf's microbiology department is functional. It assists with epidemiological investigations, sentinel surveillance and confirmation of certain epidemics. AMR work has been limited to one study on the resistance of E. Coli and one on the resistance of Salmonella found on meat.[1] Neither of these laboratories or their associated institutions has an online presence, nor can media reports be found relating to work they may be doing on AMR. The main government website (which formerly contained pages on the health and agriculture ministries) is not functioning.[2] There is no information related to progress on AMR activities on the Facebook page of the health ministry, and the agriculture ministry has no online presence.[3] The National health policy 2015-2024 contains no information about AMR activities.[4] The World Health Organisation (WHO)'s library of national action plans does not contain a plan for Comoros.[5] The self-assessment on AMR submitted by Comoros to the WHO for the 2018-19 period confirmed the lack of capacity to generate data or report on AMR in human or animal health.[6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.

[4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.

[5] World Health Organisation (WHO). "Library of national action plans." [<http://www.who.int/antimicrobial-resistance/national-action-plans/library/en/>]. Accessed 13 August 2020.

[6] World Health Organisation (WHO). "AMR self-assessment survey country responses 2018-19." [<http://amrcountryprogress.org/>]. Accessed 13 August 2020.

### 1.1.1c

**Does the government conduct environmental detection or surveillance activities (e.g., in soil, waterways) for antimicrobial residues or AMR organisms?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros' government conducts environmental detection or surveillance activities for antimicrobial residues or antimicrobial resistance (AMR) organisms. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, Comoros had not yet established the capacity to conduct AMR activities nor did it have a national AMR plan. The only two AMR studies which had taken place were in the context of human urine samples and meat respectively.[1] The main government website, which formerly had a page for the Ministry of Agriculture, Fishing and the Environment, is not functioning, and the ministry has no other online presence. [2] The World Health Organisation's library of national action plans does not contain a plan for Comoros.[3] The self-assessment on AMR submitted by Comoros to the WHO for the 2018-19 period indicated that the environmental sector was involved in developing an AMR plan, but that no AMR surveillance was taking place.[4] No academic papers could be found suggesting that environmental detection or surveillance activities for antimicrobial residues or AMR organisms are taking place.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[3] World Health Organisation (WHO). "Library of national action plans." [<http://www.who.int/antimicrobial-resistance/national-action-plans/library/en/>]. Accessed 13 August 2020.

[4] World Health Organisation (WHO). "AMR self-assessment survey country responses 2018-19." [<http://amrcountryprogress.org/>]. Accessed 13 August 2020.

## 1.1.2 Antimicrobial control

### 1.1.2a

**Is there national legislation or regulation in place requiring prescriptions for antibiotic use for humans?**

Yes = 2 , Yes, but there is evidence of gaps in enforcement = 1 , No = 0

**Current Year Score: 0**

Comoros does not have legislation in place requiring prescriptions for antibiotic use for humans. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, there was a national medicines agency for regulating medicines, but the legislation on antibiotic use for humans needed strengthening.[1] The self-assessment on AMR submitted by Comoros to the World Health Organisation (WHO) for 2018-19 stated that there was no legislation in place requiring prescriptions for antibiotic use by humans, and no system in place for monitoring the consumption and rational use of antimicrobials for human health.[2] A 2011 national pharmaceutical profile stated that there were some legal provisions requiring prescriptions for medicines, but that antibiotics were sometimes sold without prescription.[3] The authority regulating medicines was changed in 2018 to the National Agency of Medicines and Medical Evacuations (Agence Nationale des Médicaments et des Evacuations Sanitaires, ANAMEV).[4] ANAMEV has no online presence. There is no information on requirements for prescriptions in the current national health policy.[5] The 1995 law no. 1995-13, "Code on public health and social action", contains general provisions requiring prescriptions for substances which are toxic, dangerous or narcotics, but though it implies that lists of such substances exist, the lists are not publicly available.[6] The main government website (which formerly contained a page for the health ministry) is not functioning.[7] There is no information related to a requirement for prescriptions for antibiotic use on the Facebook page of the health ministry.[8] The WHO's library of national AMR action plans does not contain a plan for Comoros.[9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25

Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] World Health Organisation (WHO). "AMR self-assessment survey country responses 2018-19." [<http://amrcountryprogress.org/>]. Accessed 13 August 2020.

[3] Health Ministry of Comoros and the World Health Organisation (WHO). 2011. "Comoros: Pharmaceutical country profile (Union des Comores: Profil pharmaceutique du pays)".

[[http://www.who.int/medicines/areas/coordination/Comoros\\_PSCPNarrativeQuestionnaire\\_FR\\_30062011.pdf](http://www.who.int/medicines/areas/coordination/Comoros_PSCPNarrativeQuestionnaire_FR_30062011.pdf)]. Accessed 13 August 2020.

[4] World Health Organisation (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)."

[<https://www.afro.who.int/pt/node/10584>]. Accessed 13 August 2020.

[5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.

[6] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 13 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.

[9] World Health Organisation (WHO). "Library of national action plans." [<http://www.who.int/antimicrobial-resistance/national-action-plans/library/en/>]. Accessed 13 August 2020.

### 1.1.2b

#### Is there national legislation or regulation in place requiring prescriptions for antibiotic use for animals?

Yes = 2 , Yes, but there is evidence of gaps in enforcement = 1 , No = 0

**Current Year Score: 0**

Comoros does not have legislation in place requiring prescriptions for antibiotic use for animals. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, there was a national medicines agency for regulating medicines, but the legislation on antibiotic use for animals needed strengthening.[1] The self-assessment on AMR submitted by Comoros to the World Health Organisation (WHO) for 2018-19 stated that there was no legislation in place on the prescription and sale of antimicrobials, nor on the use of antimicrobials for growth promotion in the absence of risk analysis.[2] The 1995 law no. 1995-13, "Code on public health and social action", addresses medications for both human and animal use. It contains general provisions requiring prescriptions for substances which are toxic, dangerous or narcotics, but though it implies that lists of such substances exist, the lists are not publicly available.[3] The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[4] The health ministry's Facebook page contains no evidence regarding prescriptions for antibiotics.[5] The WHO's library of national AMR action plans does not contain a plan for Comoros.[6] The authority regulating medicines was changed in 2018 to the National Agency of Medicines and Medical Evacuations (Agence Nationale des Médicaments et des Evacuations Sanitaires, ANAMEV).[7] ANAMEV has no online presence.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25

Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] World Health Organisation (WHO). "AMR self-assessment survey country responses 2018-19." [<http://amrcountryprogress.org/>]. Accessed 13 August 2020.

[3] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien &ecirc;tre de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 13 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.

[6] World Health Organisation (WHO). "Library of national action plans." [<http://www.who.int/antimicrobial-resistance/national-action-plans/library/en/>]. Accessed 13 August 2020.

[7] World Health Organisation (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)." [<https://www.afro.who.int/pt/node/10584>]. Accessed 13 August 2020.

## 1.2 ZOOBOTIC DISEASE

### 1.2.1 National planning for zoonotic diseases/pathogens

#### 1.2.1a

Is there national legislation, plans, or equivalent strategy documents on zoonotic disease?

Yes = 1 , No = 0

**Current Year Score: 0**

There is insufficient evidence that there is national legislation, plans, or equivalent strategy documents on zoonotic disease in Comoros. Comoros has plans for zoonotic diseases through its membership of the Indian Ocean Commission (IOC)'s SEGA One Health Network, and has in the past decade had individual plans for malaria and lymphatic filariasis. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, Comoros has officially adopted a "One Health" approach to zoonoses since 2014, under the framework of the SEGA network.[1] Through this, Comoros has committed to participate in regional zoonosis surveillance and capacity-building.[2] Funding for the SEGA network has been renewed for 2019-2024.[3] At the national level, zoonosis planning is weak: the JEE report recommended that Comoros set up a framework for multi-sectoral consultation on zoonoses and develop plans.[1] The current health policy (2015-2024) and the latest health plan (2014-2019) do not mention a national strategy on zoonoses.[4,5] As for disease-specific plans, Comoros had a plan for controlling malaria which expired in 2014.[6] The government also ran campaigns for mass treatment of filariasis from 2017-2019, based on WHO guidance; 2019 was the final campaign.[7] The 1995 law no. 1995-13, "Code on public health and social action", states that malaria, filariasis and dengue fever "are subject to permanent combat and surveillance"; and "The organisation of the fight against ... zoonoses is fixed by regulation." It does not provide further details.[8] No further documents are publicly available. The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[9] The health ministry's Facebook page contains no evidence of other documents addressing zoonotic diseases.[10] No other relevant legislation is available from the Droit Afrique legal database.[11] No further information is available from the WHO in Comoros.[12]

- [1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.
- [2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 13 August 2020.
- [3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 13 August 2020.
- [4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)". [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.
- [5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)". [[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 13 August 2020.
- [6] World Health Organisation (WHO). "Country planning cycle database." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 13 August 2020.
- [7] World Bank. 12 Jan 2019. "Official launch of the 6th and last mass treatment against lymphatic filariasis, January 12, 2019, Ntasouéni, Ngazidja- Comoros (Lancement officiel du 6ème et dernier traitement de masse contre la filariose lymphatique, 12 janvier 2019, Ntasouéni, Ngazidja- Comores)". [<https://www.afro.who.int/fr/news/lancement-officiel-du-6eme-et-dernier-traitement-de-masse-contre-la-filariose-lymphatique-12?country=903&name=Comoros>]. Accessed 13 August 2020.
- [8] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 13 August 2020.
- [9] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.
- [10] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.
- [11] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 13 August 2020.
- [12] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 13 August 2020.

### 1.2.1b

**Is there national legislation, plans or equivalent strategy document(s) which includes measures for risk identification and reduction for zoonotic disease spillover events from animals to humans?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have a national plan or document which includes measures for risk identification and reduction for zoonotic disease spillovers. Comoros' planning for zoonotic diseases is limited to its membership of the Indian Ocean Commission (IOC)'s SEGA One Health Network, which according to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, Comoros joined in 2014. [1] Through this, Comoros has committed to participate in regional zoonosis surveillance and capacity-building; but not to produce a country-specific risk plan.[2] Funding for the SEGA network has been renewed for 2019-2024.[3] At the national level, zoonosis planning is weak: the JEE report recommended that Comoros set up a framework for multi-sectoral consultation on zoonoses and develop plans. [1] The current health



policy (2015-2024) and latest health plan (2014-2019) do not mention a national strategy on zoonoses. [4,5] As for disease-specific plans, Comoros had a plan for controlling malaria which expired in 2014. This included measures for risk reduction, such as increasing the distribution of mosquito nets treated with insecticide to pregnant women and children.[6] However, in practice much work on malaria in that period was carried out by a private sector-academic collaboration, without national coordination and following a different approach; and there is no evidence that the strategy has been renewed.[6,7] The government ran campaigns for mass treatment of filariasis from 2017-2019, based on WHO guidance; 2019 was the final campaign.[8] The 1995 law no. 1995-13, "Code on public health and social action", states that malaria, filariasis and dengue fever "are subject to permanent combat and surveillance"; and "The organisation of the fight against... zoonoses is fixed by regulation." [9] No further regulatory documents are available. The government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[10] The health ministry's Facebook page contains no evidence of other documents addressing zoonotic diseases.[11] No other relevant legislation is available from the Droit Afrique legal database.[12] No further information is available from the WHO in Comoros.[13]

- [1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.
- [2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 13 August 2020.
- [3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 13 August 2020.
- [4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)". [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.
- [5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)". [[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 13 August 2020.
- [6] World Health Organisation (WHO). "Country planning cycle database." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 13 August 2020.
- [7] Chakir, I, Said, A, Affane, B et al. 2017. "Control of malaria in the Comoro Islands over the past century." *Malaria Journal* 16 (387). [<https://malariajournal.biomedcentral.com/articles/10.1186/s12936-017-2027-1>]. Accessed 13 August 2020.
- [8] World Bank. 12 Jan 2019. "Official launch of the 6th and last mass treatment against lymphatic filariasis, January 12, 2019, Ntasouéni, Ngazidja- Comoros (Lancement officiel du 6ème et dernier traitement de masse contre la filariose lymphatique, 12 janvier 2019, Ntasouéni, Ngazidja- Comores)". [<https://www.afro.who.int/fr/news/lancement-officiel-du-6eme-et-dernier-traitement-de-masse-contre-la-filariose-lymphatique-12?country=903&name=Comoros>]. Accessed 13 August 2020.
- [9] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 13 August 2020.
- [10] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.
- [11] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.
- [12] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 13 August 2020.
- [13] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>].

Accessed 13 August 2020.

### 1.2.1c

**Is there national legislation, plans, or guidelines that account for the surveillance and control of multiple zoonotic pathogens of public health concern?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is insufficient evidence of national plans, guidelines, or laws in Comoros that account for the surveillance and control of at least three zoonotic diseases. There is evidence that the country has plans in place for surveillance of two zoonotic diseases: Rift Valley Fever and Q Fever. According to the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, Comoros has adopted a "One Health" approach to zoonoses since 2014, under the framework of the Indian Ocean Commission (IOC)'s Network of Epidemiological Surveillance and Investigation (RSIE-COI) and SEGA One Health Network.[1] These have had their funding extended to 2024.[2] Through them, Comoros has committed to participate in regional zoonosis surveillance and capacity-building activities.[3] The Joint External Evaluation (JEE) of IHR Core Capacities report for the country notes that limited surveillance has been operational for Rift Valley Fever and Q Fever through SEGA since 2016. This is not reflected in a separate national plan: the JEE report recommends that the country develop plans for controlling zoonoses.[1] As for specific diseases, Comoros had a plan for controlling malaria through measures such as distribution of treated mosquito nets, and for improving surveillance, which expired in 2014.[4] The government also ran campaigns for control of filariasis using mass treatment from 2017-2019, based on World Health Organisation (WHO) guidance; the final campaign was in 2019.[5] Documents on this are not available. The 1995 law no. 1995-13, "Code on public health and social action", states that malaria, filariasis and dengue fever "are subject to permanent combat and surveillance"; and "The organisation of the fight against... zoonoses is fixed by regulation." [6] No further regulatory documents are available. The government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[7] There is no evidence of relevant documents from the health ministry's Facebook page, the current health policy and latest health plan, the Indian Ocean Commission's website, the Droit Afrique legal database, or the news pages of the WHO in Comoros.[8,9,10,11,12,13]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 13 August 2020.

[3] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 13 August 2020.

[4] World Health Organisation (WHO). 2018. "Country planning cycle database." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 13 August 2020.

[5] World Bank. 12 Jan 2019. "Official launch of the 6th and last mass treatment against lymphatic filariasis, January 12, 2019, Ntasouéni, Ngazidja- Comoros (Lancement officiel du 6ème et dernier traitement de masse contre la filariose lymphatique, 12 janvier 2019, Ntasouéni, Ngazidja- Comores)." [<https://www.afro.who.int/fr/news/lancement-officiel-du-6eme-et-dernier-traitement-de-masse-contre-la-filariose-lymphatique-12?country=903&name=Comoros>]. Accessed 13 August 2020.

[6] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 13 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

- [8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.
- [9] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."  
[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 13 August 2020.
- [10] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."  
[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 13 August 2020.
- [11] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]; and "Health and migration (Santé et migration)". [<https://www.commissionoceanindien.org/category/sante-et-migration/>]. Accessed 13 August 2020.
- [12] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 13 August 2020.
- [13] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 13 August 2020.

### 1.2.1d

**Is there a department, agency, or similar unit dedicated to zoonotic disease that functions across ministries?**

Yes = 1, No = 0

**Current Year Score: 0**

Comoros does not have a cross-ministerial agency dedicated to zoonotic diseases. The 2018 JEE report included a priority recommendation that such a unit should be set up including representatives of the livestock department, the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) and the health ministry.[1] None of these three entities has a website. The government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[2] There is no evidence of relevant documents from the health ministry's Facebook page.[3] There is no evidence that a new government entity for zoonoses has been established since the JEE report was published from the news pages of the Indian Ocean Commission (which oversees a One Health network, of which Comoros is a member) or the World Health Organisation in Comoros, or from a search for media reports.[4,5]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 13 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 13 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 13 August 2020.

[4] Indian Ocean Commission. "Health and migration (Santé et migration)".

[<https://www.commissionoceanindien.org/category/sante-et-migration/>]. Accessed 13 August 2020.

[5] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 13 August 2020.

## 1.2.2 Surveillance systems for zoonotic diseases/pathogens

### 1.2.2a

**Does the country have a national mechanism (either voluntary or mandatory) for owners of livestock to conduct and report on disease surveillance to a central government agency?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a mechanism for owners of livestock to conduct or report on disease surveillance to the government. Since 2016, thanks to membership in the Indian Ocean Commission (IOC)'s SEGA One Health network, Comoros has had a smartphone-based surveillance system for official veterinary services to report outbreaks of animal disease. This covers Rift Valley Fever and Q Fever, but only covers around 20% of the territory.[1,2] The 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country did not mention a mechanism for livestock owners to participate in disease surveillance, and recommended that surveillance of zoonoses be strengthened to include official cooperation with veterinary workers.[1] Surveillance is carried out by the National Network of Epidemio-Surveillance of Animal Diseases in Comoros (RENESMAC), which has five surveillance stations.[1,3] According to the veterinary services in 2018, "The national [animal health surveillance] system is composed of a coordination unit, veterinary laboratory surveillance agents and a database management team." [4] There is no evidence of a mechanism for livestock owners to participate in surveillance. Neither RENESMAC, the government veterinary services nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) have an online presence. The government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence. [5] There is no relevant evidence from the health ministry's Facebook page. [6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 14 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 14 August 2020.

[3] Cyclotron Réunion Océan Indien (CYROI). 27 November 2017. "ASTRE: Animal, health, territories, risks and ecosystems (Animal, santé, territoires, risques et écosystèmes)". [<http://cyroi.re/umr-astre/>]. Accessed 14 August 2020.

[4] Charafouddine, O and Moutroifi, Y (Comoros Veterinary Services). July 2018. "Comoros presentation." Presentation given at 3rd East Africa FMD Roadmap meeting, Entebbe, Uganda, 3-5 July 2018. [<https://rr-africa.oie.int/wp-content/uploads/2018/07/17-charafouddine-moutroifi-comoro-country-presentation-fmd-roadmap.pdf>]. Accessed 14 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 14 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 14 August 2020.

### 1.2.2b

**Is there legislation and/or regulations that safeguard the confidentiality of information generated through surveillance activities for animals (for owners)?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have laws or guidelines safeguarding the confidentiality of information generated through animal health surveillance activities. Some limited surveillance of animal health takes place for Q Fever and Rift Valley Fever under the National Network of Epidemio-Surveillance of Animal Diseases in Comoros (RENESMAC), supported by the Indian Ocean Commission's SEGA One Health Network.[1,2,3] There is no evidence from the 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country, or from information on the surveillance system published by the SEGA Network or the official veterinary services, that laws or guidelines on information confidentiality exist.[1,2,3] Neither RENESMAC, the government veterinary services nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) have an online presence. The government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[4] There is no relevant evidence from the health ministry's Facebook page.[5] Comoros does not have laws on data privacy or cybersecurity.[6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 14 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 14 August 2020.

[3] Charafouddine, O and Moutroifi, Y (Comoros Veterinary Services). July 2018. "Comoros presentation." Presentation given at 3rd East Africa FMD Roadmap meeting, Entebbe, Uganda, 3-5 July 2018. [<https://rr-africa.oie.int/wp-content/uploads/2018/07/17-charafouddine-moutroifi-comoro-country-presentation-fmd-roadmap.pdf>]. Accessed 14 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 14 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 14 August 2020.

[6] UNCTAD. 2018. "Data protection and privacy legislation worldwide: Comoros". [[http://unctad.org/en/Pages/DTL/STI\\_and ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx](http://unctad.org/en/Pages/DTL/STI_and ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx)]. Accessed 14 August 2020.

### 1.2.2c

**Does the country conduct surveillance of zoonotic disease in wildlife (e.g., wild animals, insects, other disease vectors)?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros conducts surveillance in wildlife. Some limited surveillance of animal health takes place for Q Fever and Rift Valley Fever under the National Network of Epidemio-Surveillance of Animal Diseases in Comoros (RENESMAC), supported by the Indian Ocean Commission's SEGA One Health Network. There is no evidence from the 2018 JEE assessment, or from information on the surveillance system published by the SEGA Network or the official veterinary services, that this surveillance includes wildlife.[1,2,3] Neither RENESMAC, the government veterinary services nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) have an online presence. The government website (which formerly contained pages for the Ministry of Public Health, and the Ministry of Agriculture, Fisheries and the Environment) is not functioning.[4] The Ministry of Agriculture, Fisheries and the Environment currently has no online presence, and there is no relevant evidence on the Ministry of Public Health's Facebook page.[5]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>].

Accessed 14 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)."

[<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 14 August 2020.

[3] Charafouddine, O and Moutroifi, Y (Comoros Veterinary Services). July 2018. "Comoros presentation." Presentation given at 3rd East Africa FMD Roadmap meeting, Entebbe, Uganda, 3-5 July 2018. [<https://rr-africa.oie.int/wp-content/uploads/2018/07/17-charafouddine-moutroifi-comoro-country-presentation-fmd-roadmap.pdf>]. Accessed 14 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 14 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 14 August 2020.

## 1.2.3 International reporting of animal disease outbreaks

### 1.2.3a

Has the country submitted a report to OIE on the incidence of human cases of zoonotic disease for the last calendar year?

Yes = 1, No = 0

Current Year Score: 0

2019

OIE WAHIS database

## 1.2.4 Animal health workforce

### 1.2.4a

Number of veterinarians per 100,000 people

Input number

Current Year Score: 0.35

2017

OIE WAHIS database

### 1.2.4b

Number of veterinary para-professionals per 100,000 people

Input number

Current Year Score: 3.06

2017

OIE WAHIS database

## 1.2.5 Private sector and zoonotic

### 1.2.5a

**Does the national plan on zoonotic disease or other legislation, regulations, or plans include mechanisms for working with the private sector in controlling or responding to zoonoses?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros' national plans on zoonoses contain mechanisms for working with the private sector in controlling them. Comoros has had plans on zoonotic diseases through its membership of the Indian Ocean Commission (IOC)'s Network of Epidemiological Surveillance and Investigation (RSIE-COI) and SEGA One Health Network since 2014.[1,2] Funding for the SEGA network has been renewed for 2019-2024.[3] There is no evidence from the 2018 JEE report, or from the IOC, of mechanisms for working with the private sector in controlling zoonoses.[1,2,3]The JEE report recommended that the country set up a framework at the national level for multi-sectoral consultation on zoonoses, and develop a plan.[1] In the past decade, Comoros has had individual plans for controlling malaria and lymphatic filariasis, but these have now expired.[4,5] The malaria plan stated that private clinics would be provided with kits for free testing, private pharmacies would be subsidised to provide free medications, and private laboratory staff would receive training.[4] The plan on filariasis is not available. The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[6] The health ministry's Facebook page contains no evidence of other documents addressing zoonotic diseases.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 14 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 13 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 13 August 2020.

[4] World Health Organisation (WHO). "Country planning cycle database." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 14 August 2020.

[5] World Bank. 12 Jan 2019. "Official launch of the 6th and last mass treatment against lymphatic filariasis, January 12, 2019, Ntasouéni, Ngazidja- Comoros (Lancement officiel du 6ème et dernier traitement de masse contre la filariose lymphatique, 12 janvier 2019, Ntasouéni, Ngazidja- Comores)." [<https://www.afro.who.int/fr/news/lancement-officiel-du-6eme-et-dernier-traitement-de-masse-contre-la-filariose-lymphatique-12?country=903&name=Comoros>]. Accessed 14 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 14 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 14 August 2020.

## 1.3 BIOSECURITY

### 1.3.1 Whole-of- government biosecurity systems

#### 1.3.1a

**Does the country have in place a record, updated within the past five years, of the facilities in which especially dangerous pathogens and toxins are stored or processed, including details on inventories and inventory management systems of those facilities?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have a record of facilities in which especially dangerous pathogens and toxins are stored or processed. The 2018 JEE report noted "the absence of a national law or regulation on biosafety and biosecurity". It recommended "mapping laboratories handling pathogens and setting up a pathogen monitoring system (list of pathogens, registers and containment method)."[1] There is no indication that the situation has changed since the JEE assessment was carried out. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior, the latter charged with security) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about facilities storing or processing dangerous pathogens.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] The Vertic database does not list any laws or regulations for Comoros relevant to biosecurity or biosafety.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-Intérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.



### 1.3.1b

**Does the country have in place legislation and/or regulations related to biosecurity which address requirements such as physical containment, operation practices, failure reporting systems, and/or cybersecurity of facilities in which especially dangerous pathogens and toxins are stored or processed?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have biosecurity legislation or regulations in place. The 2018 JEE report noted the absence of a national law or regulation on biosecurity, and recommended developing and implementing relevant laws and regulations.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior, the latter charged with security) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity legislation.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] The Vertic database does not list any laws or regulations for Comoros regarding biosecurity.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-Intérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.3.1c

**Is there an established agency (or agencies) responsible for the enforcement of biosecurity legislation and regulations?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have an agency responsible for biosecurity, nor does it have biosecurity legislation. The 2018 JEE report noted the absence of a national law or regulation on biosecurity. It recommended developing and implementing biosecurity laws and regulations, and establishing a multisectoral and multidisciplinary technical group to address these issues.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly

contained pages for the ministries of health, agriculture and the interior, the latter charged with security) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity legislation.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] The Vertic database does not list any laws or regulations for Comoros regarding biosecurity.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-Intérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.3.1d

**Is there public evidence that shows that the country has taken action to consolidate its inventories of especially dangerous pathogens and toxins into a minimum number of facilities?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has taken action to consolidate its inventories of especially dangerous pathogens and toxins into a minimum number of facilities. Comoros does not have a legislative framework or an agency responsible for biosecurity. The 2018 JEE report noted the absence of national laws or regulations on biosafety and biosecurity, and of relevant training. It recommended "mapping laboratories handling pathogens and setting up a pathogen monitoring system (list of pathogens, registers and containment method)."[1] There is no indication that such measures have been taken or that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior, the latter charged with security) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] The

Vertic database does not list any laws or regulations for Comoros regarding biosecurity.[7]

- [1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.
- [2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.
- [3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.
- [4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-Intérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.
- [5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.
- [6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.
- [7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.3.1e

**Is there public evidence of in-country capacity to conduct Polymerase Chain Reaction (PCR)–based diagnostic testing for anthrax and/or Ebola, which would preclude culturing a live pathogen?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has in-country capacity to conduct PCR-based diagnostic testing for anthrax or Ebola. The 2018 JEE report noted that in the absence of a national laboratory, the two laboratories designated with roles in epidemic investigation are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health. Of these, only El Maarouf's microbiology department is functional and it is the country's only reference laboratory. It has the capacity to perform diagnostic tests for HIV/AIDS, malaria, tuberculosis, meningitis, cholera and measles.[1] There is no indication that the situation has changed since the JEE assessment was carried out. Neither of the laboratories or their associated institutions has an online presence. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity.[3,4] The National Centre of Documentation and Scientific Research (CNDRS), a state-affiliated research centre, does not have any information about pathogen testing capacity on its website.[5] No studies could be found indicating that such capacity exists.

- [1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.
- [2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.
- [3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.
- [4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-Intérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

Des-Comores-448561855967587/]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

## 1.3.2 Biosecurity training and practices

### 1.3.2a

**Does the country require biosecurity training, using a standardized, required approach, such as through a common curriculum or a train-the-trainer program, for personnel working in facilities housing or working with especially dangerous pathogens, toxins, or biological materials with pandemic potential?**

Yes = 1, No = 0

**Current Year Score: 0**

Comoros does not require standardised biosecurity training for personnel working with dangerous biological materials. The 2018 JEE report noted the absence of legislation on, and of a training programme for, biosecurity, and recommended establishing relevant training.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Some training for regional laboratories and epidemiologists is provided through the Indian Ocean Commission's SEGA One Health Network. There is no evidence that standardised biosecurity training is provided to laboratory personnel in Comoros through the network.[6,7] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[8] The Vertic database does not list any laws or regulations for Comoros regarding biosecurity.[9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-lIntérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 17 August 2020.

[7] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 17 August 2020.

[8] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[9] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons

Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.3.3 Personnel vetting: regulating access to sensitive locations

#### 1.3.3a

**Do regulations or licensing conditions specify that security and other personnel with access to especially dangerous pathogens, toxins, or biological materials with pandemic potential are subject to the following checks: drug testing, background checks, and psychological or mental fitness checks?**

Personnel are subject to all three of these checks = 3, Personnel are subject to two of these checks = 2, Personnel are subject to one of these checks = 1, Personnel are not subject to any of these checks = 0

**Current Year Score: 0**

Comoros does not have a regulatory framework for biosecurity and there is no evidence that background checks are carried out on personnel with access to materials with epidemic potential. The 2018 JEE report noted the absence of biosecurity legislation and training. It did not include evidence that any personnel security checks were in place.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about biosecurity.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] The Vertic database does not list any laws or regulations for Comoros regarding biosecurity.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-lntérieur-De-lUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

## 1.3.4 Transportation security

### 1.3.4a

**Does the country have publicly available information on national regulations on the safe and secure transport of infectious substances (specifically including Categories A and B)?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has publicly-available information on regulations on the safe and secure transport of infectious substances, except for a reference to international standards for air travel. The 2018 JEE report noted that under a framework established for poliomyelitis, Comoros had established a circuit for transporting and transferring infectious samples to external WHO laboratories, and associated training on safety standards for customs officers and laboratory personnel. Related documents are not available. The JEE report recommends "developing guidelines for the collection, packaging and transport of samples", indicating that no guidelines have been produced for wider use.[1] There is no evidence that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health, agriculture, transport and post, and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] There is no relevant information on the Facebook pages of the ministries of health, transport and post, or the interior.[3,4,5] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agricultural, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[6] Aviation regulations contain references to international standards on air transport of infectious substances. The 2017 'Aviation Regulations of Comoros RAC 18: Safety of air transport of dangerous merchandise' state that "Packages of toxic materials and infectious substances must be loaded on board aircraft in accordance with the provisions of the Technical Instructions", referring to Doc 9284 issued by the International Civil Aviation Organisation (ICAO).[7] The National Agency of Civil Aviation and Meteorology, which publishes guidance for the aviation sector, does not provide any relevant guidance.[8] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[9] The Vertic database does not list any laws or regulations for Comoros regarding biosecurity or biosafety.[10]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Ministry of Transport. Official Facebook page. [<https://www.facebook.com/pages/category/Politician/Ministère-des-Transports-chargé-du-Tourisme-et-de-l'Artisanat-2256709714548252/>]. Accessed 17 August 2020.

[5] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-l'Intérieur-De-L'Union-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[6] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[7] Ministry of Transport, Post and Telecommunications, Technology and ICT and National Agency of Civil Aviation and Meteorology. 23 May 2017. "Aviation Regulations of Comoros RAC 18: Safety of air transport of dangerous merchandise." [<http://www.anacm-comores.com/rac/rac18/rac18%20-%20SECURITE%20DU%20TRANSPORT%20AERIEN%20DES%20MARCHANDISES%20DANGEREUSES.pdf>]. Accessed 17 August 2020.

[8] National Agency of Civil Aviation and Meteorology. 2018. "Guides." [<http://www.anacm-comores.com/guides.php>]. Accessed 17 August 2020.

[9] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[10] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

## 1.3.5 Cross-border transfer and end-user screening

### 1.3.5a

**Is there legislation and/or regulations in place to oversee the cross-border transfer and end-user screening of especially dangerous pathogens, toxins, and pathogens with pandemic potential?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has legislation or other guidance to oversee the cross-border transfer and end-user screening of especially dangerous materials with pandemic potential. There is no evidence of this in the 2018 JEE report, which notes that Comoros lacks biosecurity legislation. [1] The main government website (which formerly contained pages for each of the ministries) is not functioning. [2] The agriculture ministry currently has no online presence, and there is no relevant information on the Facebook pages of the ministries of health, transport and post, economy and investment, or the interior. [3,4,5,6] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health. [1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS). [7] No rules on oversight of the cross-border transfer and end-user screening of dangerous biological substances are provided in the 2002 Customs Code or the 2010 General Commerce Law (a regional law which applies to Comoros). [8,9] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports. [10] No other relevant documents are available from the Vertic or Droit Afrique legal databases. [11,12]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Ministry of Transport. Official Facebook page. [<https://www.facebook.com/pages/category/Politician/Ministère-des-Transports-chargé-du-Tourisme-et-de-l'Artisanat-2256709714548252/>]. Accessed 17 August 2020.

[5] Ministry of the Economy, Investments and Energy. Official Facebook page. [<https://www.facebook.com/mineconomie/>]. Accessed 17 August 2020.

[6] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-l'Intérieur-De-L'Union-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[7] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[8] Government of Comoros. 2002 Customs Code (Code des Douanes). [[COUNTRY SCORE JUSTIFICATIONS AND REFERENCES](http://droit-</a></p>
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afrique.com/upload/doc/comores/Comores-Code-2002-des-douanes.pdf]. Accessed 17 August 2020.

[9] Organisation pour l'Harmonisation en Afrique du Droit des Affaires (OHADA). 15 December 2010: General Commerce Law. [http://droit-afrique.com/upload/doc/ohada/Ohada-Acte-Uniforme-2010-droit-commercial.pdf]. Accessed 17 August 2020.

[10] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [https://bwc-ecbm.unog.ch/browse]. Accessed 17 August 2020.

[11] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/]. Accessed 17 August 2020.

[12] Droit Afrique. "Comores: Documentation." [http://www.droit-afrique.com/pays/Comores/#documentation]. Accessed 17 August 2020.

## 1.4 BIOSAFETY

### 1.4.1 Whole-of-government biosafety systems

#### 1.4.1a

**Does the country have in place national biosafety legislation and/or regulations?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has biosafety legislation or regulations in place other than a framework addressing GMOs in agriculture. The 2018 JEE report noted the absence of a national law or regulation on biosafety, and recommended developing and implementing such legislation.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health and agriculture) is not functioning.[2] The agriculture ministry currently has no online presence, and the health ministry's Facebook page contains no information about biosafety legislation.[3] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS), a government-affiliated research institute.[4] Comoros' environment ministry published a National Biosafety Framework in 2004, which addresses GMOs in agriculture in line with the Cartagena Protocol. It does not address safety considerations involved in dealing with infectious biological substances.[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] No other documents on biosafety are available from the Vertic legal database.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 17 August 2020.

[4] National Centre of Documentation and Scientific Research (CNDRS). Official website. [http://www.cndrs-comores.org]. Accessed 17 August 2020.

[5] Ministry of Rural Development, Fishing, Crafts and the Environment. 2004. "National framework for biosafety in Comoros (Cadre national de biosecurité en Union de Comores)".



[[https://unep.ch/biosafety/old\\_site/development/Countryreports/KMNBFR.pdf](https://unep.ch/biosafety/old_site/development/Countryreports/KMNBFR.pdf)]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.4.1b

#### Is there an established agency responsible for the enforcement of biosafety legislation and regulations?

Yes = 1, No = 0

**Current Year Score: 0**

Comoros does not have an agency responsible for biosafety, nor does it have biosafety regulations. The 2018 JEE report noted the absence of legislation on biosafety. It recommended developing and implementing relevant legislation, and establishing a multisectoral and multidisciplinary technical group to address the issue.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health and agriculture) is not functioning.[2] The agriculture ministry currently has no online presence, and the health ministry's Facebook page contains no information about biosafety legislation.[3] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS), a government-affiliated research institute.[4] Comoros' environment ministry published a National Biosafety Framework in 2004, which addresses GMOs in agriculture in line with the Cartagena Protocol. It does not address safety considerations involved in dealing with infectious biological substances.[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] No other documents on biosafety are available from the Vertic legal database.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] National Centre of Documentation and Scientific Research (CNDRS). 2018. Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[5] Ministry of Rural Development, Fishing, Crafts and the Environment. 2004. "National framework for biosafety in Comoros (Cadre national de biosecurité en Union de Comores)".

[[https://unep.ch/biosafety/old\\_site/development/Countryreports/KMNBFR.pdf](https://unep.ch/biosafety/old_site/development/Countryreports/KMNBFR.pdf)]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

## 1.4.2 Biosafety training and practices

### 1.4.2a

**Does the country require biosafety training, using a standardized, required approach, such as through a common curriculum or a train-the-trainer program, for personnel working in facilities housing or working with especially dangerous pathogens, toxins, or biological materials with pandemic potential?**

Yes = 1, No = 0

**Current Year Score: 0**

Comoros does not have requirements for standardised biosafety training for personnel working with dangerous biological materials. The 2018 JEE report noted the absence of legislation on, and of a training programme for, biosafety. It recommended establishing such training.[1] There is no indication that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the ministries of health and agriculture) is not functioning.[2] The agriculture ministry currently has no online presence, and the health ministry's Facebook page contains no information about biosafety legislation.[3] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS), a government-affiliated research institute.[4] Comoros' environment ministry published a National Biosafety Framework in 2004, which addresses GMOs in agriculture in line with the Cartagena Protocol. It does not address safety considerations involved in dealing with infectious biological substances.[5] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[6] No other documents on biosafety are available from the Vertic legal database.[7]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] National Centre of Documentation and Scientific Research (CNDRS). Official site. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[5] Ministry of Rural Development, Fishing, Crafts and the Environment. 2004. "National framework for biosafety in Comoros (Cadre national de biosecurité en Union de Comores)". [[https://unep.ch/biosafety/old\\_site/development/Countryreports/KMNBFR.pdf](https://unep.ch/biosafety/old_site/development/Countryreports/KMNBFR.pdf)]. Accessed 17 August 2020.

[6] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[7] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

## 1.5 DUAL-USE RESEARCH AND CULTURE OF RESPONSIBLE SCIENCE

### 1.5.1 Oversight of research with especially dangerous pathogens, toxins, pathogens with pandemic potential and/or other dual-use research

#### 1.5.1a

Is there publicly available evidence that the country has conducted an assessment to determine whether ongoing research is occurring on especially dangerous pathogens, toxins, pathogens with pandemic potential and/or other dual-use research?

Yes = 1 , No = 0

Current Year Score: 0

There is no evidence that Comoros has conducted an assessment to determine whether dual-use research is occurring. The 2018 JEE assessment does not mention dual-use research. It notes a lack of any biosecurity framework in Comoros, and recommends "mapping laboratories handling pathogens and setting up a pathogen monitoring system (list of pathogens, registers and containment method)."[1] There is no indication that the situation has changed since the JEE assessment and no further evidence can be found related to government monitoring of dual-use research. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about dual-use research.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros has just one university, the University of Comoros. It does not have a functioning website and its Facebook page does not contain information relevant to dual-use research.[6,7] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[8] The Vertic database does not list any laws or regulations for Comoros relevant to biosecurity or biosafety.[9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-lIntérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official website. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] University of Comoros. Official website. [<http://www.univ-comores.km/>]. Accessed 17 August 2020.

[7] University of Comoros. Official Facebook page. [<https://www.facebook.com/universitedescomores/>]. Accessed 17 August 2020.

[8] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[9] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc->

legislation-database/c/]. Accessed 17 August 2020.

### 1.5.1b

**Is there legislation and/or regulation requiring oversight of research with especially dangerous pathogens, toxins, pathogens with pandemic potential and/or other dual-use research?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has national legislation requiring oversight of dual-use research. The 2018 JEE assessment does not mention dual-use research. It notes a lack of any biosecurity framework in Comoros, and recommends "mapping laboratories handling pathogens and setting up a pathogen monitoring system (list of pathogens, registers and containment method)."[1] There is no indication that the situation has changed since the JEE assessment and no further evidence can be found related to government monitoring of dual-use research. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about dual-use research.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros has just one university, the University of Comoros. It does not have a functioning website and its Facebook page does not contain information relevant to dual-use research.[6,7] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[8] The Vertic database does not list any laws or regulations for Comoros relevant to biosecurity or biosafety.[9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-lIntérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official website. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] University of Comoros. Official website. [<http://www.univ-comores.km/>]. Accessed 17 August 2020.

[7] University of Comoros. Official Facebook page. [<https://www.facebook.com/universitedescomores/>]. Accessed 17 August 2020.

[8] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[9] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

### 1.5.1c

**Is there an agency responsible for oversight of research with especially dangerous pathogens, toxins, pathogens with pandemic potential and/or other dual-use research?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has an agency responsible for oversight of dual-use research. The 2018 JEE assessment does not mention dual-use research. It notes a lack of any biosecurity framework in Comoros, and recommends "mapping laboratories handling pathogens and setting up a pathogen monitoring system (list of pathogens, registers and containment method)" and establishing a multisectoral and multidisciplinary technical group to address biosecurity and biosafety.[1] There is no indication that the situation has changed since the JEE assessment was carried out and no further evidence related to dual-use research in Comoros can be found. The main government website (which formerly contained pages for the ministries of health, agriculture and the interior) is not functioning, and the agriculture ministry currently has no online presence.[2] Neither the health ministry's Facebook page, nor that of the Ministry of the Interior, contains any information about dual-use research.[3,4] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[5] Comoros has just one university, the University of Comoros. It does not have a functioning website and its Facebook page does not contain information relevant to dual-use research.[6,7] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[8] The Vertic database does not list any laws or regulations for Comoros relevant to biosecurity or biosafety.[9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-lIntérieur-De-LUnion-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[5] National Centre of Documentation and Scientific Research (CNDRS). Official website. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[6] University of Comoros. Official website. [<http://www.univ-comores.km/>]. Accessed 17 August 2020.

[7] University of Comoros. Official Facebook page. [<https://www.facebook.com/universitedescomores/>]. Accessed 17 August 2020.

[8] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[9] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc-legislation-database/c/>]. Accessed 17 August 2020.

## 1.5.2 Screening guidance for providers of genetic material

### 1.5.2a

**Is there legislation and/or regulation requiring the screening of synthesized DNA (deoxyribonucleic acid) against lists of known pathogens and toxins before it is sold?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has implemented a requirement for screening synthesised DNA before it is sold. Comoros published a national framework for biosafety in 2004 which is aimed at GMOs in agriculture. It does not mention non-plant life, but the language used is broad enough that it could be interpreted to cover any type of synthesised DNA. For instance, it states that "the production, transit, import, export or dissemination of GMOs or GMO products, for any application, are prohibited throughout the territory except with the written authorisation of the competent authority". However, there is no evidence that this requirement for authorisation has been implemented. The framework states that the government will create an entity to oversee biosafety, and refers to a future law which is to establish the process for gaining authorisation for activities involving GMOs.[1] No evidence can be found of later laws, regulations or other declaration requiring or clarifying a screening process for GMOs or synthesized DNA. The 2018 JEE report makes no mention of a requirement for screening DNA before it is sold.[2] The main government website (which formerly contained pages for each of the ministries) is not functioning. [3] The agriculture ministry currently has no online presence, and the Facebook pages of the ministries of health, transport and the Interior do not contain any relevant information.[4,5,6] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant information on the website of the National Centre of Documentation and Scientific Research (CNDRS).[7] Comoros is not a State Party to the Biological Weapons Convention, and as such, does not have Confidence Building Measure reports.[8] The Vertic database does not list any laws or regulations for Comoros relevant to biosecurity or biosafety.[9]

[1] Ministry of Rural Development, Fishing, Crafts and the Environment. 2004. "National framework for biosafety in Comoros (Cadre national de biosecurité en Union de Comores)".

[[https://unep.ch/biosafety/old\\_site/development/Countryreports/KMNBFR.pdf](https://unep.ch/biosafety/old_site/development/Countryreports/KMNBFR.pdf)]. Accessed 17 August 2020.

[2] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[3] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[4] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[5] Ministry of Transport. Official Facebook page. [<https://www.facebook.com/pages/category/Politician/Ministère-des-Transports-chargé-du-Tourisme-et-de-l'Artisanat-2256709714548252/>]. Accessed 17 August 2020.

[6] Comoros Ministry of the Interior. Official Facebook page. [<https://www.facebook.com/Ministère-De-l'Intérieur-De-l'Union-Des-Comores-448561855967587/>]. Accessed 17 August 2020.

[7] National Centre of Documentation and Scientific Research (CNDRS). Official website. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

[8] The United Nations Office at Geneva (UNOG). "BWC Electronic Confidence Building Measures Portal: Browse states parties." [<https://bwc-ecbm.unog.ch/browse>]. Accessed 17 August 2020.

[9] Verification Research, Training and Information Centre (VERTIC). "Comoros (non-State Party)." Biological Weapons Convention (BWC) Legislation Database. [<https://www.vertic.org/programmes/biological-weapons-and-materials/bwc->

legislation-database/c/]. Accessed 17 August 2020.

## 1.6 IMMUNIZATION

### 1.6.1 Vaccination rates

#### 1.6.1a

**Immunization rate (measles/MCV2)**

Immunization rate (measles/MCV2), 95% or greater = 2, 80-94.9% = 1, Less than 80%, or no data = 0

**Current Year Score: 0**

2019

World Health Organization

#### 1.6.1b

**Are official foot-and-mouth disease (FMD) vaccination figures for livestock publicly available through the OIE database?**

Yes = 1, No = 0

**Current Year Score: 1**

2020

OIE WAHIS database

## Category 2: Early detection and reporting for epidemics of potential international concern

## 2.1 LABORATORY SYSTEMS STRENGTH AND QUALITY

### 2.1.1 Laboratory testing for detection of priority diseases

#### 2.1.1a

**Does the national laboratory system have the capacity to conduct diagnostic tests for at least 5 of the 10 WHO-defined core tests?**

Evidence they can conduct 5 of the 10 core tests and these tests are named = 2, Evidence they can conduct 5 of the 10 core tests and the tests are not named = 1, No evidence they can conduct 5 of the 10 core tests = 0

**Current Year Score: 0**

There is no evidence that Comoros' laboratories have the capacity to conduct diagnostic tests for at least 5 of the 10 WHO-defined core tests. According to the 2018 JEE report, there is no national public health laboratory, but the laboratories of

Ngazidja Hospital Center ("El Maarouf", human health) and the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE, animal health) assist in epidemiological investigations, sentinel surveillance and confirmation of certain epidemics. El Maarouf has Comoros' only reference laboratory. It has the capacity to conduct diagnostic testing for HIV/AIDS, malaria, tuberculosis, meningitis, cholera and measles, and to use diagnostic algorithms in the case of HIV/AIDS, malaria and tuberculosis; however, there is no evidence of capacity to conduct the WHO-defined core tests for these diseases.[1] There is no evidence that the laboratory's capacity has changed since the JEE assessment was carried out, nor is additional information available on the types of tests performed, or whether Comoros has defined country-specific core tests. El Maarouf has no online presence. The main government website, which formerly contained a page for the health ministry, is not functioning, and the Facebook page of the health ministry does not include information on diagnostic testing capacities.[2,3] There is no relevant information on the website of the government-affiliated National Centre of Documentation and Scientific Research (CNDRS).[4]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 17 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[4] National Centre of Documentation and Scientific Research (CNDRS). Official website. [<http://www.cndrs-comores.org>]. Accessed 17 August 2020.

### 2.1.1b

**Is there a national plan, strategy or similar document for conducting testing during a public health emergency, which includes considerations for testing for novel pathogens, scaling capacity, and defining goals for testing?**

Yes, there is evidence of a plan, and it includes considerations for testing for novel pathogens, scaling capacity, and defining goals for testing = 2, Yes, there is evidence of a plan, but there is insufficient evidence that it includes considerations for testing for novel pathogens, scaling capacity, and defining goals for testing = 1, No evidence of a plan = 0

**Current Year Score: 0**

There is no evidence that Comoros has a national plan, strategy or similar document for conducting testing during a public health emergency, which includes considerations for testing for novel pathogens, scaling capacity, and defining goals for testing. The 2018 Joint External Evaluation (JEE) of IHR Core Capacities report for the country recommended that Comoros develop a multi-risk public health emergency response plan.[1] In January 2020, the government's National Multisectoral Committee for Epidemic Preparation and Response, headed by the health minister, drew up a National Pandemic Preparedness and Response Plan, adapted for the context of Covid-19. There is no evidence that it addresses testing.[2,3,4] The plan is not available online. The main government website, which formerly contained a page for the health ministry, is not functioning, and the Facebook page of the health ministry does not include information on a plan for testing or a link to the Covid-19 response plan.[5,6] The Droit Afrique legal database contains several documents from 2020 related to the Covid-19 response, but they do not address medical responses or testing.[7] News releases in the past year from the office of the president, and from the World Health Organisation (WHO) in Comoros, do not contain any evidence of a plan for testing, either specific to Covid-19 or for epidemics in general.[8,9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>].



Accessed 17 August 2020.

[2] Alfajr Quotidien. 29 May 2020. "Covid-19: The 3 health programs at the heart of the response." [<https://www.alfajrquotidien.com/covid-19-les-3-programmes-sante-au-coeur-de-la-riposte/>]. Accessed 17 August 2020.

[3] World Health Organisation (WHO) Comoros. 4 June 2020. "Comoros: Arrival of 14 WHO experts to support the Covid-19 response (Comores : Arrivée de 14 experts de l'OMS pour appuyer la réponse Covid-19)".

[<https://www.afro.who.int/fr/news/comores-arrivee-de-14-experts-de-loms-pour-appuyer-la-reponse-covid-19>]. Accessed 17 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. "Special Bulletin of the WHO Comoros: Useful information on the new coronavirus (Bulletin Spécial de l'OMS Comores: Les informations utiles sur le nouveau coronavirus)." Bulletin No. 1. Posted on the Facebook page of the Ministry of Health.

[[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 17 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 17 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 17 August 2020.

[7] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 17 August 2020.

[8] Comoros Presidency of the Republic. "News." [<https://beit-salam.km/actualités/>]. Accessed 17 August 2020.

[9] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 17 August 2020.

## 2.1.2 Laboratory quality systems

### 2.1.2a

**Is there a national laboratory that serves as a reference facility which is accredited (e.g., International Organization for Standardization [ISO] 15189:2003, U.S. Clinical Laboratory Improvement Amendments [CLIA])?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros' only reference laboratory is accredited according to local or international standards. According to the 2018 JEE report, in the absence of a national laboratory system, the laboratory of Ngazidja Hospital Center, "El Maarouf", is the only public health reference laboratory. It is affiliated with external quality control programmes but is not accredited. The JEE report recommended developing norms and standards for medical laboratories, creating a plan for supervision and quality control, and creating a national organisation charged with ISO evaluation.[1] There is no indication that progress has been made since the JEE assessment. The Indian Ocean Commission (IOC)'s SEGA One Health Network supports Comoros with external quality control in public health laboratories. There is no evidence from the IOC that El Maarouf has achieved accreditation.[2,3] There is no mention of standards for public health laboratories in the current public health policy or latest health plan.[4,5] The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning.[6] The health ministry's Facebook page contains no evidence that El Maarouf or another public health reference laboratory is accredited.[7] Neither the agriculture ministry nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) has an online presence. News releases in the past year from the office of the president, and from the World Health Organisation (WHO) in Comoros, do not contain any relevant evidence.[8,9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25

Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 18 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 18 August 2020.

[4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)." [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 18 August 2020.

[5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)." [[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 18 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[8] Comoros Presidency of the Republic. "News." [<https://beit-salam.km/actualités/>]. Accessed 18 August 2020.

[9] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

### 2.1.2b

**Is there a national laboratory that serves as a reference facility which is subject to external quality assurance review?**

Yes = 1 , No = 0

**Current Year Score: 1**

There is evidence that Comoros' reference laboratory is subject to external quality assurance review, although details of specific programs are not available. According to the 2018 JEE report, the laboratory of Ngazidja Hospital Center, "El Maarouf", is the only public health reference laboratory. The report states that it is affiliated with several external quality control programmes and lists this as the country's strengths and best practices, but it does not name these. It also states that El Maarouf participates in external quality control in bacteriology. [1] The Indian Ocean Commission's SEGA One Health Network, of which Comoros is a member, supports members with external quality control in public health laboratories.[2,3] However, El Maarouf is not among the five regional laboratories which participate in SEGA's main quality control programme, which is for chikungunya and dengue. It does not have the capacity to test for these in country, instead sending samples abroad.[4,5] There is no further evidence regarding specific quality assurance programs. The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning.[6] The health ministry's Facebook page contains no relevant evidence.[7] Neither the agriculture ministry nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) has an online presence. News releases in the past year from the office of the president, and from the World Health Organisation (WHO) in Comoros, do not contain any relevant evidence.[8,9]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 18 August 2020.

- [3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 18 August 2020.
- [4] Biscornet, L, Lepec, R, Rughooputh, S and Heraud, JM. June 2013. "An external quality control program in the service of the Indian Ocean laboratory network (Un programme de contrôle de qualité externe au service du réseau de laboratoires de l'océan Indien)." Conference paper. St Denis, Reunion: International Forum on Health Surveillance and Response in Island Territories (Forum International Veille Sanitaire et Réponse en Territoires Insulaires). [[https://www.researchgate.net/publication/261759533\\_Un\\_programme\\_de\\_controle\\_de\\_qualite\\_externer\\_au\\_service\\_du\\_reseau\\_de\\_laboratoires\\_de\\_l'ocean\\_Indien](https://www.researchgate.net/publication/261759533_Un_programme_de_controle_de_qualite_externer_au_service_du_reseau_de_laboratoires_de_l'ocean_Indien)]. Accessed 18 August 2020.
- [5] Solet, J et al. 2014. "SEGA: Network for epidemic surveillance and alert management in the Indian Ocean (SEGA : le réseau de surveillance des épidémies et de gestion des alertes de l'Océan Indien). Bulletin Epidémiologique Hebdomadaire, 6.
- [6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.
- [8] Comoros Presidency of the Republic. "News." [<https://beit-salam.km/actualités/>]. Accessed 18 August 2020.
- [9] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

## 2.2 LABORATORY SUPPLY CHAINS

### 2.2.1 Specimen referral and transport system

#### 2.2.1a

**Is there a nationwide specimen transport system?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros has limited specimen transport and transfer systems but lacks a secure and harmonised nationwide system. According to the 2018 JEE report, Comoros did not have a secure, harmonised national specimen transport system, though it had established a limited specimen transport system specifically for sending poliomyelitis samples to overseas WHO collaborating laboratories. Under this initiative, training on safe shipment of biological samples had been provided to customs officers and laboratory technicians. The country also had a specimen transport system under its regional epidemiological surveillance framework, but the surveillance system was acutely under-resourced in terms of personnel and means of transportation. The JEE report recommended establishing a secure and harmonised national system for specimen transport and transfer, incorporating animal and human health.[1] There is no evidence that the situation has changed since the JEE assessment. The main government website (which formerly contained pages for the health and agriculture ministries) is not functioning.[2] The health ministry's Facebook page contains no relevant evidence.[3] Neither the agriculture ministry nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) has an online presence. News releases in the past year from the office of the president, and from the World Health Organisation (WHO) in Comoros, do not contain any relevant evidence.[4,5] A July 2018 presentation on animal disease surveillance by Comoros' veterinary services did not provide any information about specimen transport.[6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[4] Comoros Presidency of the Republic. "News." [<https://beit-salam.km/actualités/>]. Accessed 18 August 2020.

[5] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

[6] Charafouddine, O and Moutroifi, Y (Comoros Veterinary Services). July 2018. "Comoros presentation." Presentation given at 3rd East Africa FMD Roadmap meeting, Entebbe, Uganda, 3-5 July 2018. [<https://rr-africa.oie.int/wp-content/uploads/2018/07/17-charafouddine-moutroifi-comoro-country-presentation-fmd-roadmap.pdf>]. Accessed 18 August 2020.

## 2.2.2 Laboratory cooperation and coordination

### 2.2.2a

**Is there a plan in place to rapidly authorize or license laboratories to supplement the capacity of the national public health laboratory system to scale-up testing during an outbreak?**

Yes = 2 , Yes, but there is evidence of gaps in implementation = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a plan to rapidly authorize laboratories to supplement the capacity of the national public health laboratory system to scale-up testing during an outbreak. The 2018 JEE report recommended that Comoros develop a multi-risk public health emergency response plan.[1] In January 2020, the government's National Multisectoral Committee for Epidemic Preparation and Response, headed by the health minister, drew up a National Pandemic Preparedness and Response Plan, adapted for the context of Covid-19. There is no evidence that it addresses testing.[2,3,4] The plan is not available online. The main government website, which formerly contained pages for the health and agriculture ministries, is not functioning. [5] The agriculture ministry currently has no online presence, and the Facebook page of the health ministry does not include information on a plan for testing or a link to the Covid-19 response plan.[6] The Droit Afrique legal database contains several documents from 2020 related to the Covid-19 response, but they do not address medical responses or testing.[7] News releases in the past year from the office of the president, and from the World Health Organisation (WHO) in Comoros, do not contain any evidence of a plan for testing, either specific to Covid-19 or for epidemics in general.[8,9] The laboratory of Ngazidja Hospital Center, "El Maarouf", is the only public health reference laboratory.[1] It does not have an online presence.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Alfajr Quotidien. 29 May 2020. "Covid-19: The 3 health programs at the heart of the response." [<https://www.alfajrquotidien.com/covid-19-les-3-programmes-sante-au-coeur-de-la-riposte/>]. Accessed 18 August 2020.

[3] World Health Organisation (WHO) Comoros. 4 June 2020. "Comoros: Arrival of 14 WHO experts to support the Covid-19 response (Comores : Arrivée de 14 experts de l'OMS pour appuyer la réponse Covid-19)". [<https://www.afro.who.int/fr/news/comores-arrivee-de-14-experts-de-loms-pour-appuyer-la-reponse-covid-19>]. Accessed 18 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. "Special Bulletin of the WHO Comoros: Useful information on the new coronavirus (Bulletin Spécial de l'OMS Comores: Les informations utiles sur le nouveau coronavirus)." Bulletin No. 1. Posted on the Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 18 August 2020.

2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[7] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 18 August 2020.

[8] Comoros Presidency of the Republic. "News." [<https://beit-salam.km/actualités/>]. Accessed 18 August 2020.

[9] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

## 2.3 REAL-TIME SURVEILLANCE AND REPORTING

### 2.3.1 Indicator and event-based surveillance and reporting systems

#### 2.3.1a

**Is there evidence that the country is conducting ongoing event-based surveillance and analysis for infectious disease?**

Yes, there is evidence of ongoing event-based surveillance and evidence that the data is being analyzed on a daily basis = 2,  
Yes, there is evidence of ongoing event-based surveillance, but no evidence that the data are being analyzed on a daily basis  
= 1, No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros is conducting ongoing event-based surveillance and analysis for infectious disease. According to the 2018 JEE report, Comoros had "systems of surveillance based on indicators and events", but no further details were provided. There was no evidence in the report of a dedicated unit for event-based surveillance, or that surveillance or analysis was taking place on an ongoing basis. Direction of public health surveillance consisted of a team of 3 staff and a head of surveillance, all poorly-equipped. Comoros did not have a public health emergency operations centre (EOC). The country's general EOC was the Operations Centre for Rescue and Civil Protection (COSEP) under the General Directorate of Civil Protection (GDCP).[1] The 2014 national disaster risk reduction plan did not mention event-based disease surveillance.[2] According to a study by World Health Organisation (WHO) researchers, in December 2017 Comoros was not implementing event-based surveillance.[3] There is no evidence that event-based surveillance has since been introduced. The GDCP's website is not functioning, and there is no information on event-based surveillance on its Facebook page (which contains several posts related to disease surveillance).[4,5] The main government website, which formerly contained pages for the health and agriculture ministries, is not functioning.[6] The agriculture ministry currently has no online presence, and the Facebook page of the health ministry does not contain relevant information.[7] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". Accessed 18 August 2020.

[2] Government of Comoros. March 2014. "Action plan for disaster risk reduction (DRR) in Comoros (Plan d'action pour la réduction des risques de catastrophes (RRC) en Union des Comores)".

[[https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=2ahUKEwj1wau1hLPdAhXSKIAKHU\\_YAuEQFjAAegQIABAC&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FRAPPORT%2520FINAL%2520DU%2520PROJET.docx&usq=AOvVaw3yt1wJkkq7LowSTPYCN0cE](https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=1&ved=2ahUKEwj1wau1hLPdAhXSKIAKHU_YAuEQFjAAegQIABAC&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FRAPPORT%2520FINAL%2520DU%2520PROJET.docx&usq=AOvVaw3yt1wJkkq7LowSTPYCN0cE)]. Accessed 18 August 2020.

- [3] Fall, I et al. 2019. "Integrated disease surveillance and response (IDSR) strategy: current status, challenges and perspectives for the future in Africa." *BMJ Global Health*, 4
- [4]. [<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6615866/>]. Accessed 18 August 2020.
- [4] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 18 August 2020.
- [5] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 18 August 2020.
- [6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

### 2.3.1b

**Is there publicly available evidence that the country reported a potential public health emergency of international concern (PHEIC) to the WHO within the last two years?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has reported a potential public health emergency of international concern (PHEIC) to the World Health Organisation (WHO) within the last two years. Comoros has not formally reported any disease outbreak to the WHO since 1999.[1] There is no evidence from the health ministry or the WHO Comoros that Comoros reported a PHEIC to the WHO when Covid-19 reached the country. However, the health ministry's Facebook page and the news pages of WHO Comoros show that the two entities cooperate closely on outbreak preparedness and response, with the WHO playing an important role in the 2020 Covid-19 response.[1,2,3] No further evidence is available. The main government website, which formerly contained pages for the health and agriculture ministries, is not functioning.[4] The agriculture ministry currently has no online presence. The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[5] Neither of these institutions has an online presence.

[1] World Health Organisation. Disease Outbreak News: Comoros. [<https://www.who.int/csr/don/archive/country/com/en/>]. Accessed 18 August 2020.

[2] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[3] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". Accessed 18 August 2020.

## 2.3.2 Interoperable, interconnected, electronic real-time reporting systems

### 2.3.2a

**Does the government operate an electronic reporting surveillance system at both the national and the sub-national level?**

Yes = 1, No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros has an electronic reporting surveillance system for human diseases at both national and sub-national levels. According to the 2018 JEE report, Comoros operates an Integrated Disease Surveillance and Response (ISDR) system, based on a One Health concept.[1] According to a study by World Health Organisation (WHO) researchers, by December 2017 Comoros was implementing an electronic Integrated Disease Surveillance and Response (eIDSR) system. The study did not give further details of the system.[2] However, the JEE report indicated that as of 2017, electronic reporting of disease surveillance information was in place for animal health but not for human health.[1] Since 2016, thanks to membership in the Indian Ocean Commission (IOC)'s SEGA One Health network, Comoros has had a smartphone-based surveillance system for outbreaks of animal disease. This covers Rift Valley Fever and Q Fever, but only covers around 20% of the territory.[1,3] There is no evidence to suggest that electronic surveillance has been implemented for human health since 2017. The main government website, which formerly contained pages for the health and agriculture ministries, is not functioning.[4] The agriculture ministry currently has no online presence, and there is no relevant information on the health ministry's Facebook page.[5] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant evidence from the news pages of the WHO Comoros.[6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Fall, I et al. 2019. "Integrated disease surveillance and response (IDSR) strategy: current status, challenges and perspectives for the future in Africa." *BMJ Global Health*, 4

[4]. [<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6615866/>]. Accessed 18 August 2020.

[3] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)."

[<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 18 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[6] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

**2.3.2b**

**Does the electronic reporting surveillance system collect ongoing or real-time laboratory data?**

Yes = 1, No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros has an electronic reporting surveillance system for human diseases which captures ongoing or real-time laboratory data. According to the 2018 JEE report, Comoros operates an Integrated Disease Surveillance and Response (ISDR) system, based on a One Health concept.[1] According to a study by World Health Organisation (WHO) researchers, by December 2017 Comoros was implementing an electronic Integrated Disease Surveillance and Response (eIDSR) system. The study did not give further details of the system.[2] However, the JEE report indicated that as of 2017, electronic reporting of disease surveillance information was in place for animal health but not for human health; and there was no mention of ongoing or real-time laboratory data collection.[1] Since 2016, thanks to membership in the Indian Ocean Commission (IOC)'s SEGA One Health network, Comoros has had a smartphone-based

surveillance system for veterinary officials to report outbreaks of animal disease. This covers Rift Valley Fever and Q Fever, but only covers around 20% of the territory.[1,3] There is no evidence to suggest that electronic surveillance has been implemented for human health since 2017. The main government website, which formerly contained pages for the health and agriculture ministries, is not functioning.[4] The agriculture ministry currently has no online presence, and there is no relevant information on the health ministry's Facebook page.[5] The two laboratories designated roles in public health are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these institutions has an online presence. There is no relevant evidence from the news pages of the WHO Comoros.[6]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[2] Fall, I et al. 2019. "Integrated disease surveillance and response (IDSR) strategy: current status, challenges and perspectives for the future in Africa." *BMJ Global Health*, 4

[4]. [<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6615866/>]. Accessed 18 August 2020.

[3] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)."

[<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 18 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[6] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

## 2.4 SURVEILLANCE DATA ACCESSIBILITY AND TRANSPARENCY

### 2.4.1 Coverage and use of electronic health records

#### 2.4.1a

##### Are electronic health records commonly in use?

Electronic health records are commonly in use = 2, Electronic health records are not commonly in use, but there is evidence they are used = 1, No evidence electronic health records are in use = 0

**Current Year Score: 0**

There is no evidence that electronic health records are commonly in use in Comoros. A blueprint for a health information system has existed since 2004, but according to the current health policy (2015-2024) and latest plan (2014-2019) this had not been successfully implemented by 2015. The system is aimed at gathering health sector statistics, and neither the policy nor the plan mentions electronic patient records.[1,2] In December 2016, the country's first e-health strategy was approved, having been developed with the assistance of the World Health Organisation (WHO).[3] Neither the strategy, nor details on what it entails, is available online. The main government website (which formerly had a page for the health ministry) is not functioning, and there is no relevant information on the health ministry's Facebook page.[4,5] The public health reference laboratory is "El Maarouf" at Ngazidja Hospital.[6] It does not have an online presence. Epiconcept, a digital health consultancy, states that it is working on an m-health project in Comoros, which will enable data from portable medical equipment to link to electronic patient health records, and will be used in all local health centres. However, there is no evidence regarding the implementation stage of the project.[7] There is no evidence from the news page of WHO Comoros that electronic health records are in use.[8] However, it reported in April 2019 that Comoros had adopted the open source



District Health Information System (DHIS2), and was receiving WHO support to implement it.[9] DHIS2 can be used with electronic health records, though its adoption is not evidence that these are in use.[10] Comoros has not yet adopted the WHO's 'Tracker' DHIS2 package, which tracks individual-level data.[11]

[1] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 18 August 2020.

[2] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 18 August 2020.

[3] World Health Organisation (WHO) Africa Regional Office. 2016. "Comoros has approved its first national strategy for cyberhealth (L'Union des Comores a validé sa première stratégie nationale de cybersanté)".

[<https://www.afro.who.int/fr/news/lunion-des-comores-valide-sa-premiere-strategie-nationale-de-cybersante?country=903&name=Comoros>]. Accessed 18 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[6] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[7] Epiconcept. Official website. [<https://www.epiconcept.io/>]. Accessed 18 August 2020.

[8] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

[9] World Health Organisation (WHO) Comoros. 30 April 2019. "Joint WHO-GAVI mission to relaunch the process of improving management of health information system data in Comoros (Mission conjointe OMS - GAVI pour relancer le processus d'amélioration de la gestion des données du système d'information sanitaire aux Comores)."

[<https://www.afro.who.int/fr/news/mission-conjointe-oms-gavi-pour-relancer-le-processus-damelioration-de-la-gestion-des-donnees>]. Accessed 18 August 2020.

[10] DHIS2. Official website. [<https://www.dhis2.org/>]. Accessed 18 August 2020.

[11] DHIS2. "DHIS2 Digital Data Packages for WHO." [<https://www.dhis2.org/who>]. Accessed 18 August 2020.

### 2.4.1b

**Does the national public health system have access to electronic health records of individuals in their country?**

Yes = 1, No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros' national public health system has access to electronic health records. Comoros' health system has three levels: a national referral hospital; a regional hospital in each of the three islands; and for primary health care, 17 district health centers and 73 health posts, along with some nascent community health platforms. The private and charitable sectors play an important role, and are unregulated.[1,2] A current World Bank-funded program (approved in July 2019) aims to support the Directorate of Public and Private Health Structures (Direction des Etablissements de Santé Publics et Privés, DESPP) to strengthen standards and regulation across public and private sectors, which may eventually have implications for public sector access to records from the private sector.[2,3] There is no evidence that electronic health

records are in use in Comoros, though an e-health strategy was approved in 2016 and the country is receiving support from the World Health Organisation (WHO) to implement a digital District Health Information System (DHIS2).[4,5] DHIS2 can include electronic health records but its adoption is not evidence of their use.[6] Comoros has not yet adopted the WHO's 'Tracker' DHIS2 package, which tracks individual-level data.[7] Epiconcept, a digital health consultancy, is working on an m-health project in Comoros, which will enable data from medical equipment to link to electronic patient health records, and will be used in all local health centres. However, there is no evidence regarding the implementation stage of the project.[8] There is no evidence that electronic health records are in use from the latest public health policy or plan.[9,10] The main government website, which formerly had a page for the health ministry, is not functioning and there is no relevant evidence on the health ministry's Facebook page.[11,12] The public health reference laboratory is "El Maarouf" at Ngazidja Hospital.[13] It does not have an online presence.

[1] World Health Organisation (WHO) Africa. 2009. "WHO strategy for country-level cooperation 2009-2013: Comoros." [https://apps.who.int/iris/bitstream/handle/10665/136990/ccs\_com.pdf?sequence=1]. Accessed 18 August 2020.

[2] World Bank. 10 June 2019. Comoros Comprehensive Approach to Health System Strengthening (COMPASS) project: Project appraisal document. [http://documents1.worldbank.org/curated/en/988861560788593578/pdf/Comoros-Comprehensive-Approach-to-Health-System-Strengthening-Project.pdf]. Accessed 18 August 2020.

[3] World Bank. 2 July 2019. "World Bank supports comoros to improve primary health care." [https://www.worldbank.org/en/news/press-release/2019/07/02/world-bank-supports-comoros-to-improve-primary-health-care]. Accessed 18 August 2020.

[4] World Health Organisation (WHO) Africa Regional Office. 2016. "Comoros has approved its first national strategy for cyberhealth (L'Union des Comores a validé sa première stratégie nationale de cybersanté)". [https://www.afro.who.int/fr/news/lunion-des-comores-valide-sa-premiere-strategie-nationale-de-cybersante?country=903&name=Comoros]. Accessed 18 August 2020.

[5] World Health Organisation (WHO) Comoros. 30 April 2019. "Joint WHO-GAVI mission to relaunch the process of improving management of health information system data in Comoros (Mission conjointe OMS - GAVI pour relancer le processus d'amélioration de la gestion des données du système d'information sanitaire aux Comores)". [https://www.afro.who.int/fr/news/mission-conjointe-oms-gavi-pour-relancer-le-processus-damelioration-de-la-gestion-des-donnees]. Accessed 18 August 2020.

[6] DHIS2. Official website. [https://www.dhis2.org/]. Accessed 18 August 2020.

[7] DHIS2. "DHIS2 Digital Data Packages for WHO." [https://www.dhis2.org/who]. Accessed 18 August 2020.

[8] Epiconcept. Official website. [https://www.epiconcept.io/]. Accessed 18 August 2020.

[9] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\_cycle\_repository/comoros/comoros\_-\_pns\_2015-2024\_version\_adoptee\_cns.pdf]. Accessed 18 August 2020.

[10] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[https://extranet.who.int/countryplanningcycles/sites/default/files/country\_docs/Comoros/cmyp\_2014\_-\_2019\_-\_comores\_1.pdf]. Accessed 18 August 2020.

[11] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 18 August 2020.

[12] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 18 August 2020.

[13] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 18 August 2020.

### 2.4.1c

Are there data standards to ensure data is comparable (e.g., ISO standards)?

Yes = 1 , No = 0

Current Year Score: 0

There is insufficient evidence either that electronic health records are in use in Comoros, or regarding standards for such records. In December 2016, the country's first e-health strategy was approved, having been developed with the assistance of the World Health Organisation (WHO).[1] The strategy is not available online. The main government website (which formerly had a page for the health ministry) is not functioning, and there is no indication from the health ministry's Facebook page or from the news page of WHO Comoros of what the strategy entails or that electronic health records are in use.[2,3,4] The public health reference laboratory is "El Maarouf" at Ngazidja Hospital.[5] It does not have an online presence. Epiconcept, a digital health consultancy, states that it is working on an m-health project in Comoros, which will enable data from portable medical equipment to link to electronic patient health records, and will be used in all local health centres. However, there is no evidence regarding the implementation stage of the project.[6] The WHO Comoros reported in April 2019 that Comoros had adopted the open source District Health Information System (DHIS2), and was receiving WHO support to implement it.[7] DHIS2 can be used with electronic health records, though its adoption is not evidence that these are in use.[8] Comoros has not adopted the WHO's 'Tracker' DHIS2 package, which tracks individual-level data. DHIS2 packages for the WHO are set up with WHO-compatible data standards.[9]

[1] World Health Organisation (WHO) Africa Regional Office. 2016. "Comoros has approved its first national strategy for cyberhealth (L'Union des Comores a validé sa première stratégie nationale de cybersanté)".

[<https://www.afro.who.int/fr/news/lunion-des-comores-valide-sa-premiere-strategie-nationale-de-cybersante?country=903&name=Comoros>]. Accessed 18 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 18 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 18 August 2020.

[4] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 18 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 18 August 2020.

[6] Epiconcept. Official website. [<https://www.epiconcept.io/>]. Accessed 18 August 2020.

[7] World Health Organisation (WHO) Comoros. 30 April 2019. "Joint WHO-GAVI mission to relaunch the process of improving management of health information system data in Comoros (Mission conjointe OMS - GAVI pour relancer le processus d'amélioration de la gestion des données du système d'information sanitaire aux Comores)."

[<https://www.afro.who.int/fr/news/mission-conjointe-oms-gavi-pour-relancer-le-processus-damelioration-de-la-gestion-des-donnees>]. Accessed 18 August 2020.

[8] DHIS2. Official website. [<https://www.dhis2.org/>]. Accessed 18 August 2020.

[9] DHIS2. "DHIS2 Digital Data Packages for WHO." [<https://www.dhis2.org/who>]. Accessed 18 August 2020.

## 2.4.2 Data integration between human, animal, and environmental health sectors

### 2.4.2a

Is there evidence of established mechanisms at the relevant ministries responsible for animal, human, and wildlife surveillance to share data (e.g., through mosquito surveillance, brucellosis surveillance)?

Yes = 1, No = 0

Current Year Score: 0

There is no evidence that Comoros has established mechanisms for the human, animal and environmental health authorities to share surveillance data. According to the 2018 JEE report, Comoros had some multi-sectoral mechanisms in place for preparing for and responding to disease outbreaks, but lacked a national multisectoral plan or standard operating procedures detailing communication mechanisms among the health ministry, agriculture ministry and other partners. One multi-sectoral mechanism was the National Committee for the Management and Coordination of Health Emergencies and Disasters, but the JEE report provided no evidence that it had a role in sharing surveillance data. The report stated that coordination mechanisms were needed between laboratories in the human and animal health sectors.[1] There is no evidence that a mechanism has been established since 2018. Animal health surveillance is carried out by the National Network of Epidemio-Surveillance of Animal Diseases in Comoros (RENESMAC).[1] Neither RENESMAC, the government veterinary services nor the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) has an online presence. The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[1] El Maarouf has no online presence. The main government website (which formerly contained pages for the Ministry of Health and the Ministry of Agriculture, Fisheries and the Environment) is not functioning.[2] The Ministry of Agriculture, Fisheries and the Environment currently has no online presence, and there is no relevant evidence from the Facebook page of the Ministry of Health.[3] There is no relevant evidence from the news pages of the World Health Organisation in Comoros, or of the Indian Ocean Commission, which oversees the sub-regional SEGA One Health network.[4]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.

[4] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 19 August 2020.

[5] Indian Ocean Commission. Our news: Health and migration. [<https://www.commissionoceanindien.org/category/sante-et-migration/>]. Accessed 19 August 2020.

## 2.4.3 Transparency of surveillance data

### 2.4.3a

Does the country make de-identified health surveillance data on infectious diseases publicly available via reports (or other format) on government websites (such as the Ministry of Health, Ministry of Agriculture, or similar)?

Yes = 1, No = 0

Current Year Score: 0

There is no evidence that disease surveillance data is routinely made public in Comoros, though during the Covid-19 outbreak, up-to-date, de-identified health surveillance data on this disease was made publicly available every 2-3 days. Timely and frequent, if irregular, health ministry updates on Covid-19 cases and deaths have been posted on the ministry's Facebook page since 30 April 2020, the date on which Comoros announced its first case of Covid-19.[1] On the same date, a government Facebook page titled 'Comoros Coordination Against Covid-19 (Coordination Comores Contre Covid-19)' was established, which publishes the health ministry updates more regularly: every 2-3 days.[2] A dedicated website was also established to provide information on Covid-19, including all health ministry surveillance updates.[3] No other disease surveillance data is available from government websites. The main government website (which formerly contained a page for the health ministry) is not functioning.[4] There is no evidence of reporting on diseases other than Covid-19 from the health ministry's Facebook page.[2] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[5] El Maarouf has no online presence. There is no relevant information on the website of the office of the president.[6]

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 19 August 2020.

[3] Comoros Coordination Against Covid-19. 15 May 2020. "Covid-19: Houmed Msaidié met with representatives of the United Nations (Covid-19: Houmed Msaidié a reçu des représentants du Système des Nations Unies)." Habariza Komori. [<https://www.habarizacomores.com/2020/05/covid-19-houmed-msaidie-recu-des.html>]. Accessed 19 August 2020.

[4] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 19 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.

[6] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.

[7] Comoros Presidency of the Republic. Official website. [<https://beit-salam.km/>]. Accessed 19 August 2020.

### 2.4.3b

**Does the country make de-identified COVID-19 surveillance data (including details such as daily case count, mortality rate, etc) available via daily reports (or other formats) on government websites (such as the Ministry of Health, or similar)?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros makes up-to-date, de-identified surveillance data on the Covid-19 outbreak publicly available every 2-3 days. Timely health ministry updates on Covid-19 cases and deaths, broken down by Comoros' three islands, have been posted on the ministry's Facebook page since 30 April 2020, the date on which Comoros announced its first case of Covid-19. Updates are typically posted every few days, though with some gaps.[1] A government Facebook page titled 'Comoros Coordination Against Covid-19 (Coordination Comores Contre Covid-19)' was established on 30 April 2020, which publishes the health ministry updates more regularly: every 2-3 days.[2] Media reporting implies that this page is under the direction of the Minister of the Economy.[3] A dedicated website was also established to provide information on Covid-19, including all health ministry surveillance updates.[4] No Covid-19 data is available from other government websites. The main government website (which formerly contained a page for the health ministry) is not functioning.[5] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[6] El Maarouf has no online presence. There is no relevant information on the website of the office of the president.[7]

- [1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.
- [2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 19 August 2020.
- [3] Comoros Coordination Against Covid-19. 15 May 2020. "Covid-19: Houmed Msaidié met with representatives of the United Nations (Covid-19: Houmed Msaidié a reçu des représentants du Système des Nations Unies)." Habariza Komori. [<https://www.habarizacomores.com/2020/05/covid-19-houmed-msaidie-recu-des.html>]. Accessed 19 August 2020.
- [4] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 19 August 2020.
- [5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.
- [6] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.
- [7] Comoros Presidency of the Republic. Official website. [<https://beit-salam.km/>]. Accessed 19 August 2020.

## 2.4.4 Ethical considerations during surveillance

### 2.4.4a

**Is there legislation and/or regulations that safeguard the confidentiality of identifiable health information for individuals, such as that generated through health surveillance activities?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have legislation safeguarding the confidentiality of identifiable health information for individuals. The 2018 JEE assessment did not indicate that legislation on health information confidentiality exists.[1] The main government website (which formerly contained a page for the health ministry) is not functioning.[2] There is no relevant evidence on the health ministry's Facebook page.[3] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[1] It has no online presence. The National Health Policy 2015-2024 noted plans for a health information system, but did not mention any rules regarding confidentiality.[4] The 1995 law no. 1995-13, "Code on public health and social action", did not mandate the confidentiality of identifiable health information.[5] The 2011 version of this Code (referenced in the health policy) is not available online, including from the Droit Afrique legal database.[4,6] No data privacy legislation is listed by Droit Afrique.[6] The United Nations Conference on Trade and Development (UNCTAD)'s Data Protection and Privacy Legislation database does not list any data privacy legislation for Comoros.[7] The World Health Organisation (WHO) is working with Comoros on the implementation of a District Health Information System (DHIS2).[8]

- [1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.
- [2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.
- [3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.
- [4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)". [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 19 August 2020.

[5] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 19 August 2020.

[6] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 19 August 2020.

[7] UNCTAD. "Data protection and privacy legislation worldwide: Comoros". [[http://unctad.org/en/Pages/DTL/STI\\_and\\_ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx](http://unctad.org/en/Pages/DTL/STI_and_ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx)]. Accessed 19 August 2020.

[8] World Health Organisation (WHO) Comoros. 30 April 2019. "Joint WHO-GAVI mission to relaunch the process of improving management of health information system data in Comoros (Mission conjointe OMS - GAVI pour relancer le processus d'amélioration de la gestion des données du système d'information sanitaire aux Comores)". [<https://www.afro.who.int/fr/news/mission-conjointe-oms-gavi-pour-relancer-le-processus-damelioration-de-la-gestion-des-donnees>]. Accessed 19 August 2020.

#### 2.4.4b

**Is there legislation and/or regulations safeguarding the confidentiality of identifiable health information for individuals, such as that generated through health surveillance activities, include mention of protections from cyber attacks (e.g., ransomware)?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have legislation safeguarding the confidentiality of identifiable health information for individuals, or on cybersecurity. The 2018 JEE assessment did not indicate that legislation on health information confidentiality exists.[1] The main government website (which formerly contained a page for the health ministry) is not functioning.[2] There is no relevant evidence on the health ministry's Facebook page.[3] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[1] It has no online presence. The National Health Policy 2015-2024 noted plans for a health information system, but did not mention any rules regarding confidentiality or cybersecurity.[4] The 1995 law no. 1995-13, "Code on public health and social action", did not mandate the confidentiality or security of identifiable health information.[5] The 2011 version of this Code (referenced in the health policy) is not available online, including from the Droit Afrique legal database.[4,6] No data privacy or cybersecurity legislation is listed by Droit Afrique.[6] The United Nations Conference on Trade and Development (UNCTAD)'s Data Protection and Privacy Legislation database does not list any data privacy or cybersecurity legislation for Comoros.[7] The World Health Organisation (WHO) is working with Comoros on the implementation of a District Health Information System (DHIS2).[8]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.

[2] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.

[4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 19 August 2020.

[5] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of

the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 19 August 2020.

[6] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 19 August 2020.

[7] UNCTAD. "Data protection and privacy legislation worldwide: Comoros".

[[http://unctad.org/en/Pages/DTL/STI\\_and\\_ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx](http://unctad.org/en/Pages/DTL/STI_and_ICTs/ICT4D-Legislation/eCom-Data-Protection-Laws.aspx)]. Accessed 19 August 2020.

[8] World Health Organisation (WHO) Comoros. 30 April 2019. "Joint WHO-GAVI mission to relaunch the process of improving management of health information system data in Comoros (Mission conjointe OMS - GAVI pour relancer le processus d'amélioration de la gestion des données du système d'information sanitaire aux Comores)."

[<https://www.afro.who.int/fr/news/mission-conjointe-oms-gavi-pour-relancer-le-processus-damelioration-de-la-gestion-des-donnees>]. Accessed 19 August 2020.

## 2.4.5 International data sharing

### 2.4.5a

**Has the government made a commitment via public statements, legislation and/or a cooperative agreement to share surveillance data during a public health emergency with other countries in the region?**

Yes, commitments have been made to share data for more than one disease, Yes, commitments have been made to share data only for one disease = 1, No = 0

**Current Year Score: 2**

Comoros has made a commitment to share human and animal surveillance data for more than one disease with other countries in the Indian Ocean Commission sub-region in general and during a public health emergency. Comoros is one of the Indian Ocean states which has committed to membership of the SEGA One Health Network, a sub-regional integrated disease surveillance network, since 2013. Through this, the Ministry of Health, Ngazidja Hospital ("El Maarouf"), Veterinary Services and the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) participate in a joint surveillance and reporting system.[1,2,3,4] Comoros participates with active surveillance of Rift Valley Fever (RVF) and Q Fever.[1] This includes daily surveillance of health events of importance for the region, weekly/monthly teleconferences, and ad-hoc teleconferences when a specific health event is occurring.[2,4] The SEGA One Health Network's charter document is not available online. There is no evidence of public statements or legislation committing to share surveillance data during a public health emergency. The main government website (which formerly contained a page for the health ministry) is not functioning.[5] There is no relevant evidence on the health ministry's Facebook page.[6] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[1] It has no online presence.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 19 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 19 August 2020.

[4] Harena, R. November 2015. "A regional "One health" surveillance system and management of epidemics: a success story in the South West Indian Ocean." Presentation on behalf of SEGA One Health Network, at the 14th ISVEE Conference, Yucatan, Mexico.



[[https://www.researchgate.net/publication/285176147\\_A\\_regional\\_One\\_health\\_surveillance\\_system\\_and\\_management\\_of\\_epidemics\\_a\\_success\\_story\\_in\\_the\\_South\\_West\\_Indian\\_Ocean](https://www.researchgate.net/publication/285176147_A_regional_One_health_surveillance_system_and_management_of_epidemics_a_success_story_in_the_South_West_Indian_Ocean)]. Accessed 19 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.

## 2.5 CASE-BASED INVESTIGATION

### 2.5.1 Case investigation and contact tracing

#### 2.5.1a

**Is there a national system in place to provide support at the sub-national level (e.g. training, metrics standardization and/or financial resources) to conduct contact tracing in the event of a public health emergency?**

Yes, there is evidence that the national government supports sub-national systems to prepare for future public health emergencies = 2, Yes, there is evidence that the national government supports sub-national systems, but only in response to active public health emergencies = 1, No = 0

**Current Year Score: 1**

Although there is no evidence that Comoros has a system to provide support at the sub-national level to conduct contact tracing in the event of future public health emergencies, in practice some support has been provided during the Covid-19 outbreak. Updates on the Covid-19 outbreak are posted on the Facebook pages of the health ministry and of a government entity titled 'Comoros Coordination Against Covid-19 (Coordination Comores Contre Covid-19)'.<sup>[1,2]</sup> Updates indicate that contact tracing of confirmed and suspected cases is taking place, and that local areas are receiving central support for this.<sup>[1,2]</sup> According to Comoros Coordination Against Covid-19, teams of five doctors for each of Comoros' islands had been mobilized by May 2020 to trace contacts. In August 2020, it reported that the local coordination committee in Ndzuwani island was organising training for district health providers, in collaboration with the health ministry, focused on monitoring and investigating cases.<sup>[2]</sup> However, there is no evidence of a national system or plan to support sub-national authorities to conduct contact tracing, either from these Facebook pages, or from the government's dedicated site providing information on Covid-19, "Stop Coronavirus".<sup>[1,2,3]</sup> There is no evidence of such a system from other government websites. The main government website (which formerly hosted a page for the health ministry) is not functioning.<sup>[4]</sup> The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.<sup>[5]</sup> It has no online presence. There is no relevant information on the news pages of the WHO in Comoros.<sup>[6]</sup>

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 19 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 19 August 2020.

[3] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 19 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 19 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Ao&ucirc;t 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 19 August 2020.

[6] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 19 August 2020.

### 2.5.1b

**Does the country provide wraparound services to enable infected people and their contacts to self-isolate or quarantine as recommended, particularly economic support (paycheck, job security) and medical attention?**

Yes, both economic support and medical attention are provided = 2, Yes, but only economic support or medical attention is provided = 1, No = 0

**Current Year Score: 0**

There is evidence that Comoros provides some economic support to enable compliance with outbreak-related restrictions, but no evidence of wraparound services specifically aimed at enabling infected people and their contacts to comply with self-isolation requirements. Comoros has not introduced a lockdown during the Covid-19 pandemic, but it has at times urged people to stay at home and required government-organised quarantine for people returning from certain other countries.[1,2,3,4] There is no evidence of wraparound services for people required to self-isolate from the Facebook pages of the health ministry or of 'Comoros Coordination Against Covid-19', a government entity, or from the government's dedicated site for providing information on Covid-19.[2,3,4] The government has taken some more general measures to support the population during the pandemic. It announced measures to distribute food and cash to all households, and reduced import taxes on food and medicines.[1] As part of the National Response Plan to Covid-19, Order no. 20-007 / MFBSB / CAB of 30 March 2020 enables partial government support for furloughed employees in public sector firms directly affected by the decision to close the airports.[5] These employees were entitled to 40% of their salary until further notice.[6] There is no other evidence of wraparound services in the Covid-19 legislation listed by the Droit Afrique legal database.[7] The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no other relevant information on the website of the office of the president, or on the news pages of the World Health Organisation (WHO) in Comoros.[8,9,10]

[1] International Monetary Fund (IMF). 14 August 2020. "Policy responses to Covid-19: Policy tracker."

[<https://www.imf.org/en/Topics/imf-and-covid19/Policy-Responses-to-COVID-19#top>]. Accessed 20 August 2020.

[2] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[3] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 20 August 2020.

[4] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 20 August 2020.

[5] Government of Comoros. Order no. 20-007 / MFBSB / CAB of March 30, 2020: Accompanying measures as part of the implementation of the National Response Plan against the Multisectoral Crisis linked to the COVID-19 pandemic.

[<http://www.droit-afrique.com/uploads/Comores-Arrete-2020-07-mesures-accompagnement-riposte-pandemie.pdf>]. Accessed 20 August 2020.

[6] Amad, N. 17 June 2020. "Several hundred port officers furloughed (Quelques centaines du port sont envoyés au chômage technique)". La Gazette des Comores. [<http://lagazettedescomores.com/société/quelques-centaines-d'agents-du-port-sont-envoyés-au-chômage-technique-.html>]. Accessed 20 August 2020.

[7] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 20 August 2020.

[8] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[9] Comoros Presidency of the Republic. Official website. [<https://beit-salam.km/>]. Accessed 20 August 2020.

[10] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 20 August 2020.

### 2.5.1c

**Does the country make de-identified data on contact tracing efforts for COVID-19 (including the percentage of new cases from identified contacts) available via daily reports (or other format) on government websites (such as the Ministry of Health, or similar)?**

Yes = 1, No = 0

**Current Year Score: 0**

Comoros does not make de-identified data on contact-tracing efforts for Covid-19 available. Timely health ministry updates have been posted every few days during the Covid-19 outbreak, but they do not provide data on contact tracing efforts for COVID-19 (such as the percentage of new cases from identified contacts). They just include numbers of cases, deaths and imported cases.[1] A government Facebook page titled 'Comoros Coordination Against Covid-19' was established at the start of the outbreak to inform the public. It publishes the health ministry updates every 2-3 days, but does not provide any data on contact tracing.[2] A dedicated government website was also established to provide information on Covid-19. Similarly, it publishes all health ministry surveillance updates but no information on contact tracing.[3] No Covid-19 contact tracing data is available from other government websites. The main government website (which formerly contained a page for the health ministry) is not functioning.[4] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[5] El Maarouf has no online presence. There is no relevant information on the website of the office of the president.[6]

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 20 August 2020.

[3] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 20 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[6] Comoros Presidency of the Republic. Official website. [<https://beit-salam.km/>]. Accessed 20 August 2020.

## 2.5.2 Point of entry management

### 2.5.2a

**Is there a joint plan or cooperative agreement between the public health system and border control authorities to identify suspected and potential cases in international travelers and trace and quarantine their contacts in the event of a public health emergency?**

Yes, plan(s)/agreement(s) are in place to prepare for future public health emergencies = 2, Yes, but plan(s)/agreement(s) are in place only in response to active public health emergencies = 1, No = 0

**Current Year Score: 0**

There is no evidence of a joint plan or cooperative agreement between the public health system and border control authorities to identify suspected and potential cases in international travelers and trace and quarantine their contacts in for a future or active public health emergency. During the Covid-19 public health emergency, Comoros put an agreement in place between the public health system and border control authorities (the transport ministry) to monitor cases in international travelers; but the agreement is not publicly available and there is insufficient evidence that this involved tracing and quarantining their contacts. The health ministry announced via its Facebook page on 26 January 2020 that in response to

Covid-19, it had strengthened the health teams in the six officially-recognised international entry points, in collaboration with the transport ministry; and that the health ministry was making quarantine arrangements. In February it was announced that the health minister had signed a joint note with the transport ministry regarding the monitoring of international passengers from areas at risk. This note was specific to Covid-19 and there was no evidence that it would apply to other emergencies. In June and July the health ministry announced the introduction of thermal cameras in two international airports, with World Health Organisation (WHO) support. The health ministry's Facebook page contains no evidence of a joint plan or agreement with the transport ministry or customs agency which applies to contract tracing and quarantining; or which applies during public health emergencies other than Covid-19.[1] There is no evidence of such an arrangement from the website of the official customs agency.[2] The main government website (which formerly contained pages for the health and transport ministries) is not functioning, and the transport ministry currently has no online presence.[3] The central reference laboratory for human health is "El Maarouf" at Ngazidja Hospital.[4] El Maarouf has no online presence.

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[2] Comorian Customs. Official website. [<https://douane.gov.km/fr/>]. Accessed 20 August 2020.

[3] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[4] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

## 2.6 EPIDEMIOLOGY WORKFORCE

### 2.6.1 Applied epidemiology training program, such as the field epidemiology training program, for public health professionals and veterinarians (e.g., Field Epidemiology Training Program [FETP] and Field Epidemiology Training Program for Veterinarians [FETPV])

#### 2.6.1a

Does the country meet one of the following criteria?

- Applied epidemiology training program (such as FETP) is available in country
- Resources are provided by the government to send citizens to another country to participate in applied epidemiology training programs (such as FETP)

Needs to meet at least one of the criteria to be scored a 1 on this measure. , Yes for both = 1 , Yes for one = 1 , No for both = 0

**Current Year Score: 1**

Epidemiologists from Comoros are able to attend funded field epidemiology training programmes (FETP) provided through the Indian Ocean Commission's SEGA One Health Network, but there are no domestic applied epidemiology training programmes. Between 2011 and 2017, 25 field epidemiologists attended two-year FETP programmes funded and run through the SEGA One Health Network. Four participants were from Comoros. The FETP is affiliated with the global TEPHINET network (Training Programs in Epidemiology and Public Health Network).[1,2] Funding has been secured to continue the SEGA Network's operations until 2024.[3] In 2019, three-month 'FETP Frontline' courses were introduced by the SEGA Network. The first was set to run from December 2019, for 105 participants from SEGA member states.[2,4] The 2018 JEE report stated that Comoros did not have any separate applied epidemiology programmes available at domestic institutions.[5] There is no evidence of local programmes from government web pages. The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, and there is no additional information

available from the health ministry's Facebook page.[6,7] The agriculture ministry currently has no online presence.

- [1] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf]. Accessed 20 August 2020.
- [2] Indian Ocean Commission. 30 June 2019. "Field epidemiology training for health professionals (Formation en épidémiologie de terrain pour les professionnels de santé)." [https://www.commissionoceanindien.org/formation-en-epidemiologie-de-terrain-pour-les-professionnels-de-sante/]. Accessed 20 August 2020.
- [3] Indian Ocean Commission. "RSIE 3." [https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/]. Accessed 20 August 2020.
- [4] Indian Ocean Commission. 14 September 2019. "Sustainability of the SEGA network at the heart of the 2nd RSIE3 steering committee (La pérennisation du réseau SEGA au cœur du 2ème COPIL de RSIE3)." [https://www.commissionoceanindien.org/rsie3-copil2/]. Accessed 20 August 2020.
- [5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 20 August 2020.
- [6] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 20 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 20 August 2020.

### 2.6.1b

**Are the available field epidemiology training programs explicitly inclusive of animal health professionals or is there a specific animal health field epidemiology training program offered (such as FETPV)?**

Yes = 1 , No = 0

**Current Year Score: 1**

Both animal and human health professionals from Comoros are able to attend funded field epidemiology training programmes (FETP) provided through the Indian Ocean Commission's SEGA One Health Network. Between 2011 and 2017, 25 field epidemiologists, including two veterinarians, attended two-year FETP programmes funded and run through the SEGA One Health Network. Four participants were from Comoros. The FETP is affiliated with the global TEPHINET network (Training Programs in Epidemiology and Public Health Network).[1,2] Funding has been secured to continue the SEGA Network's operations until 2024.[3] In 2019, three-month 'FETP Frontline' courses, covering both animal and human health, were introduced by the SEGA Network. The first was set to run from December 2019, for 105 participants from SEGA member states.[2,4] The 2018 JEE report stated that Comoros did not have any separate applied epidemiology programmes available at domestic institutions.[5] There is no evidence of local programmes from government web pages. The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, and there is no additional information available from the health ministry's Facebook page.[6,7] The agriculture ministry currently has no online presence.

- [1] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf]. Accessed 20 August 2020.
- [2] Indian Ocean Commission. 30 June 2019. "Field epidemiology training for health professionals (Formation en épidémiologie de terrain pour les professionnels de santé)." [https://www.commissionoceanindien.org/formation-en-epidemiologie-de-terrain-pour-les-professionnels-de-sante/]. Accessed 20 August 2020.
- [3] Indian Ocean Commission. "RSIE 3." [https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/]. Accessed 20 August 2020.

[4] Indian Ocean Commission. 14 September 2019. "Sustainability of the SEGA network at the heart of the 2nd RSIE3 steering committee (La pérennisation du réseau SEGA au cœur du 2ème COPIL de RSIE3)."

[<https://www.commissionoceanindien.org/rsie3-copil2/>]. Accessed 20 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

## 2.6.2 Epidemiology workforce capacity

### 2.6.2a

Is there public evidence that the country has at least 1 trained field epidemiologist per 200,000 people?

Yes = 1, No = 0

Current Year Score: 0

2020

Completed JEE assessments; Economist Impact analyst qualitative assessment based on official national sources, which vary by country

## Category 3: Rapid response to and mitigation of the spread of an epidemic

### 3.1 EMERGENCY PREPAREDNESS AND RESPONSE PLANNING

#### 3.1.1 National public health emergency preparedness and response plan

##### 3.1.1a

Does the country have an overarching national public health emergency response plan in place which addresses planning for multiple communicable diseases with epidemic or pandemic potential?

Evidence that there is a plan in place, and the plan is publicly available = 2, Evidence that the plan is in place, but the plan is not publicly available OR, Disease-specific plans are in place, but there is no evidence of an overarching plan = 1, No evidence that such a plan or plans are in place = 0

Current Year Score: 1

There is evidence that Comoros has a public health emergency response plan which can be adapted to address multiple communicable diseases with pandemic or epidemic potential, but it is unclear which plan this is and it is not publicly available. In January 2020, in light of Covid-19, the health ministry activated the National Multisector Committee for Epidemic Preparation and Response, and worked with the World Health Organisation (WHO) to update and adapt its response plan (no further information) to the context of Covid-19.[1,2] This suggests that a plan exists which addresses

epidemic emergency response planning and can be adapted to different diseases, but it is unclear which plan this is. The General Directorate of Civil Protection (GDCP) published a National Contingency Plan 2017-18, identifying epidemics as one of three key risks.[3,4] However, it did not provide details on response planning for multiple communicable diseases, instead focusing on cyclone response planning.[4] The 2018 JEE report recommended that Comoros develop a public health emergency response plan.[3] The government announced in September 2018 that a national action plan on health security had been approved, which would reinforce Comoros' capacity to prepare for and respond to epidemics.[5] It is not publicly available, and there is no evidence regarding whether it contains an epidemic emergency response plan. Comoros also benefits from a sub-regional health emergency response plan, created through the Indian Ocean Commission (IOC)'s SEGA One Health Network.[6] No further information or publications relevant to public health emergency planning are available. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no additional information available from the health ministry's Facebook page.[7,8] The GDCP's website is not functioning, and there is no additional information available from its Facebook page.[9,10] No relevant documents are available from the WHO's repository of national health plans, or from documentspubliques.org, a Comorian public interest website which published the 2017-18 National Contingency Plan.[10,11]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)". [[https://documentspubliques.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspubliques.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 20 August 2020.

[3] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire-/preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 20 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 20 August 2020.

[5] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)". [<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 20 August 2020.

[6] Indian Ocean Commission. 20 April 2020. "IOC-AFD: 4.5m euros to fight Covid-19 in the Indian Ocean (COI-AFD : 4,5 millions € pour lutter contre le Covid-19 en Indianocéanie)". [<https://www.commissionoceanindien.org/coi-afd-plan-urgence-covid19/>]. Accessed 20 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[9] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 20 August 2020.

[10] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 20 August 2020.

[11] World Health Organisation (WHO). "National health planning cycles: Comoros." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 20 August 2020.

[12] Libraries of Public Documents. [<https://documentspublics.org/>]. Accessed 20 August 2020.

### 3.1.1b

**If an overarching plan is in place, has it been updated in the last 3 years?**

Yes = 1 , No /no plan in place= 0

**Current Year Score: 1**

There is evidence that at some point between 2018-2020, Comoros introduced a public health emergency response plan which can be adapted to address multiple communicable diseases with pandemic or epidemic potential. However, it is unclear which plan this is and it is not publicly available. In January 2020, in light of Covid-19, the health ministry worked with the World Health Organisation (WHO) to update and adapt its response plan (no further information) to the context of Covid-19.[1,2] This suggests that a plan exists which addresses epidemic emergency response planning and can be adapted to different diseases, but it is unclear which plan this is. The General Directorate of Civil Protection (GDCP) published a National Contingency Plan 2017-18, identifying epidemics as one of three key risks.[3,4] However, this did not provide details on response planning for multiple communicable diseases, instead focusing on cyclone response planning.[4] The 2018 JEE report recommended that Comoros develop a public health emergency response plan, so the plan adapted for Covid-19 in January 2020 must have been drafted after the JEE's publication.[3] The government announced in September 2018 that a national action plan on health security had been approved, which would reinforce Comoros' capacity to prepare for and respond to epidemics.[5] It is not publicly available, and there is no evidence regarding whether it contains or calls for an epidemic emergency response plan. No further relevant information is available. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no additional information available from the health ministry's Facebook page.[7,8] The GDCP's website is not functioning, and there is no additional information available from its Facebook page.[9,10] No relevant documents are available from the WHO's repository of national health plans, or from documentspublics.org, a Comorian public interest website which published the 2017-18 National Contingency Plan.[10,11]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)". [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 20 August 2020.

[3] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Préparer le pays à faire face aux épidémies (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire-/preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 20 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 20 August 2020.

[5] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)". [<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 20 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.



[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[8] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 20 August 2020.

[9] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 20 August 2020.

[10] World Health Organisation (WHO). "National health planning cycles: Comoros." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 20 August 2020.

[11] Libraries of Public Documents. [<https://documentspublics.org/>]. Accessed 20 August 2020.

### 3.1.1c

**If an overarching plan is in place, does it include considerations for pediatric and/or other vulnerable populations?**

Yes = 1 , No /no plan in place= 0

**Current Year Score: 0**

There is evidence that Comoros has a public health emergency response plan, but it is not publicly available and there is no evidence that it includes considerations for pediatric or other vulnerable populations. The General Directorate of Civil Protection (GDPC) developed a National Contingency Plan 2017-18, which took into account epidemiological risks and established a response system.[1,2] The contingency plan did not include considerations for vulnerable populations in a public health emergency.[2] The 2018 JEE recommended that Comoros also develop a public health emergency response plan.[1] The government announced in September 2018 that a national action plan on health security had been approved, which would reinforce Comoros' capacity to prepare for and respond to epidemics.[3] In January 2020, in light of Covid-19, the health ministry activated the National Multisector Committee for Epidemic Preparation and Response, and worked with the World Health Organisation (WHO) to update and adapt its response plan to the context of Covid-19.[4,5] The response plan is not publicly available and no information is available regarding whether it includes considerations for vulnerable populations. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no additional information available from the health ministry's Facebook page.[6,7] The GDPC's website is not functioning, and there is no additional information available from its Facebook page.[8,9] No relevant documents are available from the WHO's repository of national health plans, or from documentspubliques.org, a Comorian public interest website which published the 2017-18 National Contingency Plan.[10,11]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)." [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 20 August 2020.

[3] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire/-/préparer-le-pays-à-faire-face-aux-épidémies.html>]. Accessed 20 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 20 August 2020.

- [5] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)."  
[<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 20 August 2020.
- [6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.
- [8] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 20 August 2020.
- [9] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 20 August 2020.
- [10] World Health Organisation (WHO). "National health planning cycles: Comoros."  
[<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 20 August 2020.
- [11] Libraries of Public Documents. [<https://documentspublics.org/>]. Accessed 20 August 2020.

### 3.1.1d

**Does the country have a publicly available plan in place specifically for pandemic influenza preparedness that has been updated since 2009?**

Yes = 1 , No = 0

**Current Year Score: 0**

2020

WHO Strategic Partnership for IHR and Health Security (SPH)

## 3.1.2 Private sector involvement in response planning

### 3.1.2a

**Does the country have a specific mechanism(s) for engaging with the private sector to assist with outbreak emergency preparedness and response?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a mechanism for engaging with the private sector to assist with outbreak emergency preparedness and response. No such mechanism is mentioned in the 2018 JEE report.[1] The General Directorate of Civil Protection (GDPC) developed a National Contingency Plan 2017-18, which took into account epidemiological risks and established a response system.[1,2] The plan stated that the GDPC was the focal point for mobilising private sector resources in a disaster situation, but did not include a mechanism for engaging with the private sector specifically on outbreak response.[2] The government announced in September 2018 that a national action plan on health security had been approved, which would reinforce Comoros' capacity to prepare for and respond to epidemics.[3] In January 2020, in light of Covid-19, the health ministry activated the National Multisector Committee for Epidemic Preparation and Response, and worked with the World Health Organisation (WHO) to update and adapt its response plan to the context of Covid-19.[4,5] The response plan is not publicly available and no information is available regarding whether it includes a mechanism for engaging with the private sector. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no additional information available from the health ministry's Facebook page.[6,7] The GDPC's

website is not functioning, and there is no additional information available from its Facebook page.[8,9] No relevant documents are available from the WHO's repository of national health plans, or from documentspublics.org, a Comorian public interest website which published the 2017-18 National Contingency Plan.[10,11]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 20 August 2020.

[2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)." [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 20 August 2020.

[3] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire-/préparer-le-pays-à-faire-face-aux-épidémies.html>]. Accessed 20 August 2020.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 20 August 2020.

[5] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 20 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 20 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 20 August 2020.

[8] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 20 August 2020.

[9] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 20 August 2020.

[10] World Health Organisation (WHO). "National health planning cycles: Comoros." [<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 20 August 2020.

[11] Libraries of Public Documents. [<https://documentspublics.org/>]. Accessed 20 August 2020.

### 3.1.3 Non-pharmaceutical interventions planning

#### 3.1.3a

**Does the country have a policy, plan and/or guidelines in place to implement non-pharmaceutical interventions (NPIs) during an epidemic or pandemic?**

Yes, a policy, plan and/or guidelines are in place for more than one disease = 2, Yes, but the policy, plan and/or guidelines exist only for one disease = 1, No = 0

**Current Year Score: 1**

Comoros has guidelines in place to implement non-pharmaceutical interventions (NPIs) during the Covid-19 pandemic, but there is no evidence of a policy or guidelines applicable to other outbreaks or diseases. Guidance on NPIs has been provided during the Covid-19 pandemic via the Facebook pages of the health ministry, of a government entity titled Comoros

Coordination Against Covid-19, and of the General Directorate of Civil Protection (GDCP), as well as via a dedicated website called 'Stop Coronavirus'. [1,2,3,4] There are some inconsistencies among these. The instructions on the three Facebook pages regarding NPIs have evolved over time, and there is no evidence of a static policy (applicable to other diseases) regarding NPIs, or that the guidance for Covid-19 has wider applicability. [1,2,3] The GDCP reported on 8 July 2020 that under Presidential Decree No. 20-094/PR of the same date, wearing masks and staying one meter from others was a legal requirement. [3] There is no relevant evidence from other government websites. Neither the main government website (which formerly hosted a page for the health ministry), nor the GDCP's website, is functioning. [5,6]

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 21 August 2020.

[3] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

[4] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 21 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 21 August 2020.

[6] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

## 3.2 EXERCISING RESPONSE PLANS

### 3.2.1 Activating response plans

#### 3.2.1a

Does the country meet one of the following criteria?

- Is there evidence that the country has activated their national emergency response plan for an infectious disease outbreak in the past year?

- Is there evidence that the country has completed a national-level biological threat-focused exercise (either with WHO or separately) in the past year?

Needs to meet at least one of the criteria to be scored a 1 on this measure. , Yes for both = 1 , Yes for one = 1 , No for both = 0

**Current Year Score: 1**

There is evidence that Comoros has activated its national emergency response plan for the Covid-19 outbreak in the past year, but not that it has completed a national-level biological threat-focused exercise. The government announced in September 2018 that a national action plan on health security had been approved, which would reinforce Comoros' capacity to prepare for and respond to epidemics. [1] In January 2020, in light of Covid-19, the health ministry activated the National Multisector Committee for Epidemic Preparation and Response, and worked with the World Health Organisation (WHO) to update and adapt its response plan for use in the context of Covid-19. [2,3] The WHO Strategic Partnership for International Health Regulations (2005) and Health Security (SPH) website has no record that Comoros has completed or planned a biological threat-focused simulation exercise. [4] There is no report of such an exercise from the WHO in Comoros. [5] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, there is no additional information available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence. [6,7] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDCP). [8] The GDCP's website is not functioning, and there is no additional information available from its

Facebook page.[9,10]

- [1] Abdallah, A. 5 September 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d-action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 21 August 2020.
- [2] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 21 August 2020.
- [3] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 21 August 2020.
- [4] World Health Organisation (WHO) Strategic Partnership for International Health Regulations (2005) and Health Security (SPH). "Simulation Exercise." [<https://extranet.who.int/sph/simulation-exercise>]. Accessed 21 August 2020.
- [5] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 21 August 2020.
- [6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 21 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.
- [8] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 21 August 2020.
- [9] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.
- [10] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

### 3.2.1b

**Is there evidence that the country in the past year has identified a list of gaps and best practices in response (either through an infectious disease response or a biological-threat focused exercise) and developed a plan to improve response capabilities?**

Yes, the country has developed and published a plan to improve response capacity = 2 , Yes, the country has developed a plan to improve response capacity, but has not published the plan = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros in the past year has identified gaps and best practice from a review of an infectious disease response or a biological threat-focused exercise or developed a plan to improve response capabilities. In 2020, Comoros activated its national emergency response plan, approved in 2018, for the Covid-19 pandemic.[1,2,3] The WHO Strategic Partnership for International Health Regulations (2005) and Health Security (SPH) website has no record that Comoros has completed or planned a biological threat-focused simulation exercise, but states that an After Action Review is planned. No details or dates are provided.[4,5] No other evidence is available regarding a planned or completed review of an emergency response. There is no report of such an activity from the WHO in Comoros.[6] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, there is no additional information

available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence.[7,8] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDPCP).[9] The GDPCP's website is not functioning, and there is no additional information available from its Facebook page.[10,11]

[1] Abdallah, A. 5 September 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire-/preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 21 August 2020.

[2] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 21 August 2020.

[3] World Health Organisation (WHO) Comoros. 27 May 2020. "Coronavirus: WHO reinforces Covid-19 diagnostic capacity in Comoros (Coronavirus : l'OMS renforce les capacités diagnostiques du Covid-19 aux Comores)". [<https://www.afro.who.int/fr/news/coronavirus-loms-renforce-les-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 21 August 2020.

[4] World Health Organisation (WHO) Strategic Partnership for International Health Regulations (2005) and Health Security (SPH). "Simulation Exercise." [<https://extranet.who.int/sph/simulation-exercise>]. Accessed 21 August 2020.

[5] World Health Organisation (WHO) Strategic Partnership for International Health Regulations (2005) and Health Security (SPH). "After Action Review." [<https://extranet.who.int/sph/after-action-review>]. Accessed 21 August 2020.

[6] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 21 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 21 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.

[9] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 21 August 2020.

[10] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

[11] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

## 3.2.2 Private sector engagement in exercises

### 3.2.2a

**Is there evidence that the country in the past year has undergone a national-level biological threat-focused exercise that has included private sector representatives?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros in the past year has completed a national-level biological threat-focused exercise that has included private sector representatives. The WHO Strategic Partnership for International Health Regulations (2005) and Health Security (SPH) website has no record that Comoros has completed or planned a biological threat-focused simulation exercise.[1] There is no report of such an exercise from the WHO in Comoros.[2] The main government website (which

formerly hosted pages for the health and agriculture ministries) is not functioning, there is no relevant information available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence.[3,4] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDPCP).[5] The GDPCP's website is not functioning, and there is no additional information available from its Facebook page.[6,7]

[1] World Health Organisation (WHO) Strategic Partnership for International Health Regulations (2005) and Health Security (SPH). "Simulation Exercise." [https://extranet.who.int/sph/simulation-exercise]. Accessed 21 August 2020.

[2] World Health Organisation (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 21 August 2020.

[3] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 21 August 2020.

[4] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 21 August 2020.

[5] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 21 August 2020.

[6] General Directorate of Civil Protection. Official website. [http://securitecivile-comores.org/index.php]. Accessed 21 August 2020.

[7] General Directorate of Civil Protection. Official Facebook page. [https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\_internal]. Accessed 21 August.

## 3.3 EMERGENCY RESPONSE OPERATION

### 3.3.1 Emergency response operation

#### 3.3.1a

**Does the country have in place an Emergency Operations Center (EOC)?**

Yes = 1, No = 0

**Current Year Score: 0**

There is insufficient current evidence that Comoros has an emergency operations centre (EOC) which covers public health emergencies, nor that there is a permanent EOC specific to public health emergencies. The 2018 JEE assessment stated that the Operations Centre for Rescue and Civil Protection (COSEP) served as an EOC under the General Directorate of Civil Protection (GDPCP), with a remit including public health emergencies. It also stated that COSEP had a 24-hour early warning centre that collected and analysed information on the prevention and management of risks and disasters, and a multi-sector operations room.[1] However, there is no evidence that COSEP has played a role of EOC during the Covid-19 outbreak, and therefore the information in the JEE assessment is considered to be outdated. The GDPCP's website is not functioning, and there is no information on its Facebook page regarding the role of COSEP, other than that people are instructed to call it in the event of a death to Covid-19.[2,3] In response to the 2020 Covid-19 pandemic, the health ministry activated a National Multisector Committee for Epidemic Preparation and Response, responsible for domestic and international coordination and reinforcing surveillance.[4] There is no evidence from the government's dedicated website or Facebook page for communicating the Covid-19 response that COSEP has played a role, nor that there is a permanent public health EOC.[5,6] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, there is no relevant information available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence.[7,8] Reporting by the United Nations (UN) and World Health Organisation (WHO) on Comoros'

response to Covid-19 did not mention COSEP or another EOC.[9,10]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 21 August 2020.

[2] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

[3] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health. [[https://www.facebook.com/permalink.php?story\\_fbid=847670282356655&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=847670282356655&id=320950001695355)]. Accessed 21 August 2020.

[5] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 21 August 2020.

[6] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 21 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 21 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.

[9] United Nations (UN) News. 30 April 2020. "First case of Covid-19 declared by the Comorian authorities (Un premier cas de Covid-19 déclaré par les autorités comoriennes)." [<https://news.un.org/fr/story/2020/04/1067892>]. Accessed 21 August 2020.

[10] World Health Organisation (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [<https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19>]. Accessed 21 August 2020.

### 3.3.1b

**Is the Emergency Operations Center (EOC) required to conduct a drill for a public health emergency scenario at least once per year or is there evidence that they conduct a drill at least once per year?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has an emergency operations centre (EOC) which is required to, or conducts, a drill related to public health emergencies at least once a year. The 2018 JEE assessment stated that the Operations Centre for Rescue and Civil Protection (COSEP) served as an EOC under the General Directorate of Civil Protection (GDCP), with a remit including public health emergencies. It also noted that the 2017-18 National Contingency Plan anticipated annual simulation exercises, and the most recent two exercises had been on a chemical threat and a tsunami. It recommended organising simulation exercises for the health sector.[1] The Contingency Plan contains no evidence of a requirement for an EOC to conduct annual exercises.[2] There is no evidence of a requirement for an EOC to conduct drills related to public health emergencies, or of drills conducted, from government websites. The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, there is no relevant information available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence.[3,4] The GDCP's website is not functioning, and there is no relevant information on its Facebook page.[5,6]



[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 21 August 2020.

[2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)". [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 21 August 2020.

[3] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 21 August 2020.

[4] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.

[5] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

[6] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

### 3.3.1c

**Is there public evidence to show that the Emergency Operations Center (EOC) has conducted within the last year a coordinated emergency response or emergency response exercise activated within 120 minutes of the identification of the public health emergency/scenario?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros' emergency operations center (EOC) has in the past year conducted an emergency response or simulation exercise for a public health emergency activated within 120 minutes of the identification of the public health emergency/scenario. The 2018 JEE assessment stated that the Operations Centre for Rescue and Civil Protection (COSEP) served as an EOC under the General Directorate of Civil Protection (GDGP), with a remit including public health emergencies.[1] The GDGP's website is not functioning, and there is no relevant information on its Facebook page.[2,3] In response to the 2020 Covid-19 pandemic, the health ministry activated a National Multisector Committee for Epidemic Preparation and Response, responsible for domestic and international coordination and reinforcing surveillance.[4] There is no evidence from the government's dedicated website or Facebook page for communicating the Covid-19 response regarding the role of an EOC, or regarding the speed of response.[5,6] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, there is no relevant information available from the health ministry's Facebook page, and the agriculture ministry currently has no online presence.[7,8] Reporting by the United Nations (UN) and World Health Organisation (WHO) on Comoros' response to Covid-19 did not mention the role of an EOC or speed of response.[9,10]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 21 August 2020.

[2] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

[3] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

[4] World Health Organisation (WHO) Comoros. 27 January 2020. Special Bulletin of the WHO/Comoros (Bulletin Spécial de l'OMS/Comores), No. 1. Posted on official Facebook page of the Ministry of Health.

[https://www.facebook.com/permalink.php?story\_fbid=847670282356655&id=320950001695355]. Accessed 21 August 2020.

[5] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 21 August 2020.

[6] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 21 August 2020.

[7] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 21 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 21 August 2020.

[9] United Nations (UN) News. 30 April 2020. "First case of Covid-19 declared by the Comorian authorities (Un premier cas de Covid-19 déclaré par les autorités comoriennes)." [https://news.un.org/fr/story/2020/04/1067892]. Accessed 21 August 2020.

[10] World Health Organisation (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19]. Accessed 21 August 2020.

## 3.4 LINKING PUBLIC HEALTH AND SECURITY AUTHORITIES

### 3.4.1 Public health and security authorities are linked for rapid response during a biological event

#### 3.4.1a

Does the country meet one of the following criteria?

- Is there public evidence that public health and national security authorities have carried out an exercise to respond to a potential deliberate biological event (i.e., bioterrorism attack)?
- Are there publicly available standard operating procedures, guidelines, memorandums of understanding (MOUs), or other agreements between the public health and security authorities to respond to a potential deliberate biological event (i.e., bioterrorism attack)?

Needs to meet at least one of the criteria to be scored a 1 on this measure., Yes for both = 1, Yes for one = 1, No for both = 0

**Current Year Score: 0**

There is no evidence that Comoros has standard operating procedures or other agreements between the public health and security authorities to respond to deliberate biological events, or that any joint exercises have been carried out. The 2018 JEE report noted a lack of coordination and joint planning between the public health and security authorities. It recommended developing standard operating procedures for managing biological events which involve both authorities and testing them through regular simulation exercises. The JEE report also noted the lack of legislation or plans on biosecurity.[1] There is no evidence that the situation has progressed since the JEE assessment. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no relevant information available from the health ministry's Facebook page.[2,3] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDPCP).[1] The GDPCP's website is not functioning, and there is no additional information available from its Facebook page.[4,5]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 21 August 2020.

[2] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 21 August 2020.

[3] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 21 August 2020.

[4] General Directorate of Civil Protection. 2018. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 21 August 2020.

[5] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 21 August.

## 3.5 RISK COMMUNICATIONS

### 3.5.1 Public communication

#### 3.5.1b

**Does the risk communication plan (or other legislation, regulation or strategy document used to guide national public health response) outline how messages will reach populations and sectors with different communications needs (eg different languages, location within the country, media reach)?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros' risk communication plan, which is specifically intended for use during Covid-19, outlines how messages will reach populations and sectors with different communication needs. In March to June 2020, the health ministry and the World Health Organisation (WHO) Comoros reported that a risk communication plan for Covid-19 had been produced with WHO support and was being implemented, under the framework for preparation, prevention and response to Covid-19. Implementation included coordination with civil society organisations, training of volunteers, and deployment of risk communication teams to assist at the El Maarouf national hospital.[1,2,3,4,5] Earlier, the government approved a national action plan on health security, addressing epidemic preparedness, in September 2018.[6] Neither this action plan, nor the plans specific to Covid-19, are publicly available, and no further information is available on their content. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating about Covid-19.[7,8,9,10] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDGP).[11] The GDGP's website is not functioning, and no additional information is available from its Facebook page.[12,13] No additional information is available from the WHO Comoros.[14]

[1] Comoros Ministry of Health. 17 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=881172322339784&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=881172322339784&id=320950001695355)]. Accessed 21 August 2020.

[2] Comoros Ministry of Health. 22 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=884859461971070&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=884859461971070&id=320950001695355)]. Accessed 21 August 2020.

[3] Comoros Ministry of Health. 28 March 2020. "Volunteer training for awareness and prevention (Formation de volontaires pour sensibiliser et prévenir)." Stop Coronavirus. [<https://stopcoronavirus.km/actualités/2020/03/28/formation-de-volontaires-pour-sensibiliser-et-prévenir/>]. Accessed 21 August 2020.

[4] World Health Organisation (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [<https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19>]. Accessed 21 August 2020.

[5] Comoros Ministry of Health. 18 June 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=946959185761097&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=946959185761097&id=320950001695355)]. Accessed 21 August

2020.

- [6] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html]. Accessed 21 August 2020.
- [7] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 21 August 2020.
- [8] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 21 August 2020.
- [9] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 21 August 2020.
- [10] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 21 August 2020.
- [11] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 21 August 2020.
- [12] General Directorate of Civil Protection. Official website. [http://securitecivile-comores.org/index.php]. Accessed 21 August 2020.
- [13] General Directorate of Civil Protection. Official Facebook page. [https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\_internal]. Accessed 21 August.
- [14] World Health Organisation (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 21 August 2020.

### 3.5.1 Risk communication planning

#### 3.5.1a

**Does the country have in place, either in the national public health emergency response plan or in other legislation, regulation, or strategy documents, a section detailing a risk communication plan that is specifically intended for use during a public health emergency?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is second-hand evidence that Comoros has a risk communication plan specifically intended for use during the Covid-19 public health emergency, but it is not publicly available, nor is there sufficient evidence that a plan applicable to other diseases exists. In March 2020, the health ministry reported that under the framework for preparation, prevention and response to Covid-19, a sub-committee on risk communication had been established, and was putting in place measures for public communication, including coordination with civil society organisations and training of volunteers.[1,2,3] In April 2020, the World Health Organisation (WHO) Comoros reported that it had supported the development of a risk communication plan for Covid-19, along with a national plan for preparation and response.[4] The government approved a national action plan on health security, addressing epidemic response, in September 2018.[5] Neither this action plan, nor the plans specific to Covid-19, are publicly available. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating the Covid-19 response.[6,7,8,9] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDGP).[10] The GDGP's website is not functioning, and no additional relevant information is available from its Facebook page.[11,12] No additional information is available from the WHO Comoros.[13]

- [1] Comoros Ministry of Health. 17 March 2020. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=881172322339784&id=320950001695355]. Accessed 21 August 2020.
- [2] Comoros Ministry of Health. 22 March 2020. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=884859461971070&id=320950001695355]. Accessed 21 August 2020.
- [3] Comoros Ministry of Health. 28 March 2020. "Volunteer training for awareness and prevention (Formation de volontaires pour sensibiliser et prévenir)." Stop Coronavirus. [https://stopcoronavirus.km/actualités/2020/03/28/formation-de-volontaires-pour-sensibiliser-et-prévenir/]. Accessed 21 August 2020.
- [4] World Health Organisation (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19]. Accessed 21 August 2020.
- [5] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire-/préparer-le-pays-à-faire-face-aux-épidémies.html]. Accessed 21 August 2020.
- [6] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 21 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 21 August 2020.
- [8] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 21 August 2020.
- [9] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 21 August 2020.
- [10] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 21 August 2020.
- [11] General Directorate of Civil Protection. Official website. [http://securitecivile-comores.org/index.php]. Accessed 21 August 2020.
- [12] General Directorate of Civil Protection. Official Facebook page. [https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\_internal]. Accessed 21 August.
- [13] World Health Organisation (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 21 August 2020.

### 3.5.1c

**Does the risk communication plan (or other legislation, regulation or strategy document used to guide national public health response) designate a specific position within the government to serve as the primary spokesperson to the public during a public health emergency?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros' risk communication plan, which is specifically intended for use during Covid-19, designates a specific position within the government to serve as the primary public spokesperson. In March to June 2020, the health ministry and the World Health Organisation (WHO) Comoros reported that a risk communication plan for Covid-19 had been produced with WHO support, under the framework for preparation, prevention and response to Covid-19. A sub-committee on risk communication was putting in place measures for public communication.[1,2] Presidential Decree No. 20-055/PR of 3 April 2020 named the members of this sub-committee, but did not name a specific person as primary

spokesperson.[3] The economy minister (not on the sub-committee) has been named as communications coordinator for the Covid-19 response.[4] In practice, communication has been carried out by more than one person and ministry, notably the health and economy ministers and the president.[5,6,7] It is unclear who is in charge of the dedicated website and Facebook page set up to communicate the Covid-19 response.[6,7] Comoros approved a national action plan on health security, addressing epidemic response, in September 2018.[8] Neither this action plan, nor the plans specific to Covid-19, are publicly available, and no further information is available on their content. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating about Covid-19.[9,10,11,12] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDCP).[13] The GDCP's website is not functioning, and no additional information is available from its Facebook page.[14,15] No additional information is available from the WHO Comoros.[16]

[1] Comoros Ministry of Health. 17 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=881172322339784&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=881172322339784&id=320950001695355)]. Accessed 21 August 2020.

[2] Comoros Ministry of Health. 22 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=884859461971070&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=884859461971070&id=320950001695355)]. Accessed 21 August 2020.

[3] President of Comoros. Decree No. 20-055/PR of 3 April 2020: On nomination of the members of the National Coordination Committee of the "Framework for Management and Coordination of the Covid-19 crisis" (Portant nomination des membres du Comité National de Coordination, du "Cadre de Gestion et de Coordination de la Crise du Covid-19)."  
[<https://stopcoronavirus.km/assets/documents/DocumentP1.pdf>]. Accessed 24 August 2020.

[4] Comoros Ministry of the Economy, Investments and Energy. 26 March 2020. Facebook post.

[<https://www.facebook.com/mineconomie/posts/2533311493590244>]. Accessed 24 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 24 August 2020.

[6] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 24 August 2020.

[7] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 24 August 2020.

[8] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan.

[<https://alwatwan.net/sante/validation-du-plan-d-action-national-de-securite-sanitaire-/preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 24 August 2020.

[9] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 24 August 2020.

[10] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 24 August 2020.

[11] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 24 August 2020.

[12] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 24 August 2020.

[13] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 24 August 2020.

[14] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 24 August 2020.

[15] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 24 August.

[16] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 24 August 2020.

## 3.5.2 Public communication

### 3.5.2a

**In the past year, is there evidence that the public health system has actively shared messages via online media platforms (e.g. social media, website) to inform the public about ongoing public health concerns and/or dispel rumors, misinformation or disinformation?**

Public health system regularly shares information on health concerns = 2, Public health system shares information only during active emergencies, but does not regularly utilize online media platforms = 1, Public health system does not regularly utilize online media platforms, either during emergencies or otherwise = 0

**Current Year Score: 2**

There is evidence that the public health system in Comoros has actively shared information about ongoing public health concerns in the past year, and not just during emergencies. During the Covid-19 pandemic in 2020, the health ministry provided regular messages related to the outbreak, including national and local developments, response measures and advice for the public via its Facebook page.[1] These included posts aimed at dispelling rumours.[2,3] The ministry was regularly sharing information related to Covid-19 awareness and preventions for months before the first confirmed domestic case.[1] The ministry regularly posts updates on initiatives underway in the public health system and occasionally makes posts regarding other diseases and public health concerns, though in 2020 Covid-19 has dominated.[1] To give examples of non-Covid-related posts, on 11 and 14 September 2019 it used Facebook to dispel rumors related to the safety of vaccines and antimalarial medication.[1] In addition, a dedicated Facebook page and website were established by the government in 2020 to provide regular information updates related to Covid-19.[4,5] There is no evidence that the public health system uses other online media platforms to provide information about public health concerns. The main government website (which formerly hosted a page for the health ministry) is not functioning.[6]

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 24 August 2020.

[2] Comoros Ministry of Health. 10 April 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=897934580663558&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=897934580663558&id=320950001695355)]. Accessed 24 August 2020.

[3] Comoros Ministry of Health. 30 January 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=849029268887423&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=849029268887423&id=320950001695355)]. Accessed 24 August 2020.

[4] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 24 August 2020.

[5] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 24 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 24 August 2020.

### 3.5.2b

**Is there evidence that senior leaders (president or ministers) have shared misinformation or disinformation on infectious diseases in the past two years?**

No = 1, Yes = 0

**Current Year Score: 0**

There is evidence that in April 2020, ministers in Comoros spread disinformation regarding the presence of Covid-19 in the country. On 15 April 2020, media in the French department of Mayotte reported that a case of Covid-19 had been confirmed among a group of people repatriated from Comoros.[1] Mayotte media outlet linfokwezi.fr subsequently published a letter dated 15 April, from the French ambassador to the foreign minister of Comoros, informing the latter of this case and recommending that the government of Comoros take appropriate response measures.[2,3] On 15 April, Comoros' foreign ministry issued a press release refuting the claim that the case had originated in Comoros, denying it had received formal notification from the government of France, and stating that there were no confirmed cases in the country.[4] This was shared again via the government's Facebook case dedicated to communicating the Covid-19 response on 30 April.[5] Apart from this, most evidence from the Covid-19 period suggests that Comoros works closely with the World Health Organisation in investigating and responding to disease outbreaks, and that information provided by the president and relevant ministers (notably the health minister, and economy minister, who is a key government spokesperson) is in line with WHO guidance.[6,7,8,9,10,11] There is no other relevant evidence from a search for media reports.

[1] Minas, B. 15 April 2020. "A case of Coronavirus imported from Comoros (Un cas de Coronavirus a été importé des Comores)." FranceInfo, Mayotte 1ère. [<https://la1ere.francetvinfo.fr/mayotte/un-cas-de-coronavirus-a-ete-importe-des-comores-823226.html>]. Accessed 24 August 2020.

[2] Linfowezi.fr. 16 April 2020. "Covid-19 in the Comoros: disinformation is in full swing (Covid-19 aux Comores : la désinformation bat son plein)." Accessed 24 August 2020.

[3] Letter from the French ambassador to Comoros, to the foreign minister of Comoros. Published by linfowezi.fr, 16 April 2020. [<https://www.linfokwezi.fr/wp-content/uploads/2020/04/lettre-ambassade-de-France.pdf>]. Accessed 24 August 2020.

[4] Comoros Ministry of Foreign Affairs and International Cooperation, responsible for the Diaspora [<https://stopcoronavirus.km/actualite/C3%A9s/2020/04/15/communiqu%C3%A9-n%C2%B06-r%C3%A9action-officielle-sur-le-cas-import%C3%A9-%C3%A0-mayotte/>]. Accessed 24 August 2020.

[5] Comoros Coordination Against Covid-19. 30 April 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=111501840546162&id=111330413896638](https://www.facebook.com/permalink.php?story_fbid=111501840546162&id=111330413896638)]. Accessed 24 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 24 August 2020.

[7] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 24 August 2020.

[8] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 24 August 2020.

[9] Comoros Presidency. "News." [<https://beit-salam.km/actualite/C3%A9s/>]. Accessed 24 August 2020.

[10] Azali, Assoumani (President of Comoros). Official Twitter account. [[https://twitter.com/Azali\\_officiel](https://twitter.com/Azali_officiel)]. Accessed 24 August 2020.

[11] Msaidié, Houmed (Minister for the Economy, Investments and Energy, and government spokesperson). Official Twitter account. [<https://twitter.com/MSAIDIEHoumed>]. Accessed 24 August 2020.

## 3.6 ACCESS TO COMMUNICATIONS INFRASTRUCTURE

### 3.6.1 Internet users

#### 3.6.1a

Percentage of households with Internet

Input number



Current Year Score: 8.48

2019

International Telecommunication Union (ITU)

### 3.6.2 Mobile subscribers

#### 3.6.2a

Mobile-cellular telephone subscriptions per 100 inhabitants

Input number

Current Year Score: 67.6

2019

International Telecommunication Union (ITU)

### 3.6.3 Female access to a mobile phone

#### 3.6.3a

Percentage point gap between males and females whose home has access to a mobile phone

Input number

Current Year Score: 11.0

2019

Gallup; Economist Impact calculation

### 3.6.4 Female access to the Internet

#### 3.6.4a

Percentage point gap between males and females whose home has access to the Internet

Input number

Current Year Score: 24.0

2019

Gallup; Economist Impact calculation

## 3.7 TRADE AND TRAVEL RESTRICTIONS

### 3.7.1 Trade restrictions

#### 3.7.1a

**In the past year, has the country issued a restriction, without international/bilateral support, on the export/import of medical goods (e.g. medicines, oxygen, medical supplies, PPE) due to an infectious disease outbreak?**

Yes = 0, No = 1

**Current Year Score: 1**

In the past year, Comoros has not issued restrictions on the import/export of medical goods owing to a disease outbreak. In 2020, the government took steps in response to the external threat, and later the domestic outbreak, of Covid-19. It reported on these via the health ministry's Facebook page; via a dedicated Facebook page and website set up to provide information and advice on the Covid-19 outbreak and response; and occasionally through the official website and Twitter account of the president's office, the Facebook page of the ministry of the economy, and the Twitter account of the minister for the economy, who is a government spokesperson. There is no evidence from any of these sources that Comoros issued a restriction on the export/import of medical goods due to Covid-19 or another infectious disease.[1,2,3,4,5,6,7] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning and the agriculture ministry currently has no online presence.[8] The foreign ministry has no website or Facebook page, and there is no evidence of outbreak-related restrictions from its Twitter feed.[9] There is no record of a restriction by Comoros on the World Trade Organization's database of members' notifications on COVID-19, updated 21 August 2020; or on the World Customs Organization's list of temporary export restrictions on critical medical supplies in response to COVID-19.[10,11] There is no evidence of such a restriction, in response to Covid-19 or any other infectious disease outbreak, from a search for media reports.

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 24 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 24 August 2020.

[3] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 24 August 2020.

[4] Comoros Presidency. "News." [<https://beit-salam.km/actualit%C3%A9s/>]. Accessed 24 August 2020.

[5] Azali, Assoumani (President of Comoros). Official Twitter account. [[https://twitter.com/Azali\\_officiel](https://twitter.com/Azali_officiel)]. Accessed 24 August 2020.

[6] Comoros Ministry of Economy, Investments and Energy. Official Facebook page. [<https://www.facebook.com/mineconomie/>]. Accessed 24 August 2020.

[7] Msaidié, Houmed (Minister for the Economy, Investments and Energy, and government spokesperson). Official Twitter account. [<https://twitter.com/MSAIDIEHoumed>]. Accessed 24 August 2020.

[8] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 24 August 2020.

[9] Comoros Ministry of Foreign Affairs. Official Twitter account. [<https://twitter.com/maecidiplomatie?lang=en>]. Accessed 24 August 2020.

[10] World Trade Organization. 21 August 2020. "WTO members' notifications on COVID-19." [[https://www.wto.org/english/tratop\\_e/covid19\\_e/notifications\\_e.htm](https://www.wto.org/english/tratop_e/covid19_e/notifications_e.htm)]. Accessed 24 August 2020.

[11] World Customs Organization. "List of national legislation of countries that adopted temporary export restrictions on certain categories of critical medical supplies in response to COVID-19."

[<http://www.wcoomd.org/en/topics/facilitation/activities-and-programmes/natural-disaster/list-of-countries->

coronavirus.aspx]. Accessed 24 August 2020.

### 3.7.1b

**In the past year, has the country issued a restriction, without international/bilateral support, on the export/import of non-medical goods (e.g. food, textiles, etc) due to an infectious disease outbreak?**

Yes = 0, No = 1

**Current Year Score: 1**

In the past year, Comoros has not issued restrictions on the import/export of non-medical goods owing to a disease outbreak. During 2020, the government took steps in response to the external threat, and later the domestic outbreak, of Covid-19. It reported on these via the health ministry's Facebook page; via a dedicated Facebook page and website set up to provide information and advice on the Covid-19 outbreak and response; and occasionally through the official website and Twitter account of the president's office, the Facebook page of the ministry of the economy, and the Twitter account of the minister for the economy, who is a government spokesperson. There is no evidence from any of these sources that Comoros issued a restriction on the export/import of non-medical goods due to Covid-19 or another infectious disease.[1,2,3,4,5,6,7] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning and the agriculture ministry currently has no online presence.[8] The foreign ministry has no website or Facebook page, and there is no evidence of outbreak-related restrictions from its Twitter feed.[9] There is no record of a restriction by Comoros on the World Trade Organization's database of members' notifications on COVID-19, updated 21 August 2020.[10] There is no evidence of such a restriction, in response to Covid-19 or any other infectious disease outbreak, from a search for media reports.

[1] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355]. Accessed 24 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 24 August 2020.

[3] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 24 August 2020.

[4] Comoros Presidency. "News." [https://beit-salam.km/actualit%C3%A9s/]. Accessed 24 August 2020.

[5] Azali, Assoumani (President of Comoros). Official Twitter account. [https://twitter.com/Azali\_officiel]. Accessed 24 August 2020.

[6] Comoros Ministry of Economy, Investments and Energy. Official Facebook page. [https://www.facebook.com/mineconomie/]. Accessed 24 August 2020.

[7] Msaidié, Houmed (Minister for the Economy, Investments and Energy, and government spokesperson). Official Twitter account. [https://twitter.com/MSAIDIEHoumed]. Accessed 24 August 2020.

[8] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 24 August 2020.

[9] Comoros Ministry of Foreign Affairs. Official Twitter account. [https://twitter.com/maecidiplomatie?lang=en]. Accessed 24 August 2020.

[10] World Trade Organization. 21 August 2020. "WTO members' notifications on COVID-19." [https://www.wto.org/english/tratop\_e/covid19\_e/notifications\_e.htm]. Accessed 24 August 2020.

## 3.7.2 Travel restrictions

### 3.7.2a

**In the past year, has the country implemented a ban, without international/bilateral support, on travelers arriving from a specific country or countries due to an infectious disease outbreak?**

Yes = 0, No = 1

**Current Year Score: 0**

In March 2020, Comoros introduced a total ban on travelers arriving from abroad in response to the Covid-19 pandemic. On 19 March, Comoros banned travelers arriving from abroad and suspended all international commercial flights.[1,2] Ports were closed to traffic from countries affected by Covid-19.[2] At the time, the World Health Organization (WHO) was advising countries not to completely close their borders to travelers from countries affected by Covid-19. However, it noted that it could be appropriate to introduce temporary restrictions in countries which have few international connections and limited response capabilities (conditions which apply to Comoros). It emphasised that restrictions should be short in duration.[3] As of 25 August 2020, the blanket international travel restrictions were still in force.[1,2] The long duration of the ban does not appear to be in line with the WHO guidance noted above.[3] There is no evidence of other travel bans related to infectious diseases in the past year, from the Facebook page of the health ministry or the news page of the president's office.[4,5] The health ministry has no website.

[1] Government of the United Kingdom. Foreign travel advice: Comoros. [<https://www.gov.uk/foreign-travel-advice/comoros/coronavirus>]. Accessed 25 August 2020.

[2] France Diplomacy. 17 July 2020. Travel advice: Comoros. [<https://www.diplomatie.gouv.fr/fr/conseils-aux-voyageurs/conseils-par-pays-destination/comores/#derniere>]. Accessed 25 August 2020.

[3] World Health Organization (WHO). 29 February 2020. "Updated WHO recommendations for international traffic in relation to COVID-19 outbreak." [<https://www.who.int/news-room/articles-detail/updated-who-recommendations-for-international-traffic-in-relation-to-covid-19-outbreak>]. Accessed 25 August 2020.

[4] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 25 August 2020.

[5] Comoros Presidency. "News." [<https://beit-salam.km/actualit%C3%A9s/>]. Accessed 25 August 2020.

## Category 4: Sufficient and robust health sector to treat the sick and protect health workers

### 4.1 HEALTH CAPACITY IN CLINICS, HOSPITALS, AND COMMUNITY CARE CENTERS

#### 4.1.1 Available human resources for the broader healthcare system

##### 4.1.1a

Doctors per 100,000 people

Input number

**Current Year Score: 27.15**

2016

WHO; national sources

#### 4.1.1b

##### Nurses and midwives per 100,000 people

Input number

**Current Year Score: 62.85**

2016

WHO; national sources

#### 4.1.1c

**Does the country have a health workforce strategy in place (which has been updated in the past five years) to identify fields where there is an insufficient workforce and strategies to address these shortcomings?**

Yes = 1, No = 0

**Current Year Score: 0**

There is some evidence that Comoros has a public health workforce strategy in place, updated in 2017, but it has not been published online. The 2018 JEE report stated that a national development plan for human resources for health was being revised in 2017, based on the 2010-2015 version.[1] The World Health Organization (WHO) reported that in March 2018, the health minister of Comoros had approved the new national policy and plan on human resources for health in the presence of its development partners, the WHO and France's development agency.[2] The health ministry stated on Facebook in April 2019 that this plan covered 2018-22.[3] At present, only the 2010-2015 version is available online. It identified human resources needs and provided tables of action points to address gaps as well as indicators to measure progress.[4] No further information is available about the updated plan, so there is no evidence that it identifies workforce shortcomings and strategies to address these. The main government website (which formerly hosted a page for the health ministry) is not working, and there is no additional information on the Facebook pages of the ministries of health, labour and training, or education.[5,6,7,8]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". Accessed 25 August 2020.

[2] World Health Organization (WHO) Regional Office for Africa. 15 March 2018. "Comoros approves its policy and plan for development of human resources for health (L'Union des Comores valide sa Politique et son Plan de Développement des Ressources Humaines pour la Santé)". [<https://www.afro.who.int/fr/news/lunion-des-comores-valide-sa-politique-et-son-plan-de-developpement-des-ressources-humaines>]. Accessed 25 August 2020.

[3] Ministry of Health. 7 April 2019. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=640691296387889&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=640691296387889&id=320950001695355)]. Accessed 25 August 2020.

[4] World Health Organization (WHO). "National health planning cycles: Comoros."

[<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 25 August 2020.

[5] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 25 August 2020.

[6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 25 August 2020.

[7] Ministry of Youth, Employment, Labor, Training and Professional Integration, Sports, Arts and Culture. Official Facebook

page. [<https://www.facebook.com/Min.JeunesseEmploiTravailSportArtCulture/>]. Accessed 25 August 2020.

[8] Ministry of National Education. Official Facebook page. [<https://www.facebook.com/Ministère-De-L%C3%89ducation-Nationale-Union-des-Comores-286815945256902/>]. Accessed 25 August 2020.

## 4.1.2 Facilities capacity

### 4.1.2a

#### Hospital beds per 100,000 people

Input number

**Current Year Score: 216**

2010

WHO/World Bank; national sources

### 4.1.2b

#### Does the country have the capacity to isolate patients with highly communicable diseases in a biocontainment patient care unit and/or patient isolation room/unit located within the country?

Yes = 1 , No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros has the capacity to isolate patients with highly communicable diseases in patient isolation centers.

The 2018 JEE report stated that isolation units exist in the regional hospitals. However, it also recommended that the authorities establish isolation rooms to be used in the case of a public health emergency.[1] The health ministry reported on 25 February 2020 that the Indian Ocean Commission (IOC) had provided funding in order to build an isolation centre, as part of the preparation for Covid-19.[2] Three hospitals were designated as centres for receiving and isolating Covid-19 cases in early 2020: Sambakouni in Ngazidja (Grand Comore), Bambao Mtsanga in Ndzواني (Anjouan), and Fomboni in Mwali (Mohéli).[3,4,5] Government reports on Covid-19 between March and May 2020 provided evidence that all three isolation centres were in use.[6,7] The national reference hospital is El Maarouf (in Grande Comore), but it was being renovated in 2020, and only played a role during Covid-19 as a transit site for transfer to other hospitals.[1,8,9]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 25 August 2020.

[2] Comoros Ministry of Health. 25 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=866668407123509&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=866668407123509&id=320950001695355)]. Accessed 25 August 2020.

[3] Comoros Ministry of Health. 14 April 2020. "Case management simulation (Simulation de la prise en charge)". [<https://stopcoronavirus.km/actualités/2020/04/14/simulation-de-la-prise-en-charge/>]. Accessed 25 August 2020.

[4] Comoros Office of the President. 29 March 2020. Facebook post. [<https://www.facebook.com/beitsalam/posts/2560230747585433>]. Accessed 25 August 2020.

[5] Comoros Office of the President. 26 March 2020. "Implementation of a response plan against the coronavirus (Mise en

place d'un plan de riposte contre le coronavirus)." [<https://stopcoronavirus.km/actualités/2020/03/26/mise-en-place-d-un-plan-de-riposte-contre-le-coronavirus/>]. Accessed 25 August 2020.

[6] Comoros Ministry of Health. 20 May 2020. "Video: the President meets healthcare personnel in Samba (Vidéo: le Président rencontre le personnel soignant & agrave; Samba)." [<https://stopcoronavirus.km/actualités/2020/05/20/vidéo-le-président-rencontre-le-personnel-soignant-à-samba/>]. Accessed 25 August 2020.

[7] Comoros Ministry of Health. 16 May 2020. "Press release # 4 of May 15 relating to COVID-19 screening (Communiqué #4 du 15 mai relatif aux dépistages du COVID-19)." [<https://stopcoronavirus.km/actualités/2020/05/16/communiqué-4-du-15-mai-relatif-aux-dépistages-du-covid-19/>]. Accessed 25 August 2020.

[8] Government of Comoros. December 2019. "El Maarouf: A new modern university hospital centre (El Maarouf: Un nouveau central hospitalier universitaire moderne)." Conference of Development Partners of Comoros, 2-3 December 2019. [<https://www.cpadcomores2019.com/uploads/media/5dd5529e236f3/ph3-hopital.pdf?token=/uploads/media/5dd5529e236f3/ph3-hopital.pdf>]. Accessed 25 August 2020.

[9] Comoros Ministry of Health. 18 June 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=946959185761097&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=946959185761097&id=320950001695355)]. Accessed 25 August 2020.

#### 4.1.2c

Does the country meet one of the following criteria?

- Is there evidence that the country has demonstrated capacity to expand isolation capacity in response to an infectious disease outbreak in the past two years?

- Is there evidence that the country has developed, updated or tested a plan to expand isolation capacity in response to an infectious disease outbreak in the past two years?

Yes = 1, No = 0

**Current Year Score: 1**

In the past two years, there is evidence that Comoros has expanded its isolation capacity (except with the help of donor organisations); However, there is no evidence of a plan to expand isolation capacity in response to an infectious disease outbreak.

The 2018 JEE report stated that isolation units exist in the regional hospitals and recommended that the authorities establish isolation rooms to be used in the case of a public health emergency.[1] Three hospitals were designated as centres for receiving and isolating Covid-19 cases in early 2020: Sambakouni in Ngazidja (Grand Comore), Bambao Mtsanga in Ndzuani (Anjouan), and Fomboni in Mwali (Mohéli).[2,3,4] The health ministry reported in February 2020 that the Indian Ocean Commission (IOC) had provided funding to build an isolation centre, as part of the preparation for Covid-19.[5] In January 2021, the health ministry reported that a Kuwaiti NGO had transformed its orphanage in Comoros into an isolation site, to alleviate pressure on the hospital in Fomboni.[6] There is no evidence of a plan to expand isolation capacity. In April 2020, the World Health Organisation (WHO) Comoros reported that it had supported the development of a national plan for preparation and response for Covid-19.[7] However, the plan is not available online and there is no evidence that it addresses isolation capacity. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating the Covid-19 response.[8,9,10,11] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDPCP).[1] The GDPCP's website is not functioning, and no additional relevant information is available from its Facebook page.[12,13] No additional information is available from the WHO Comoros.[14]

- [1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 4 March 2021.
- [2] Comoros Ministry of Health. 14 April 2020. "Case management simulation (Simulation de la prise en charge)." [<https://stopcoronavirus.km/actualités/2020/04/14/simulation-de-la-prise-en-charge/>]. Accessed 4 March 2021.
- [3] Comoros Office of the President. 29 March 2020. Facebook post. [<https://www.facebook.com/beitsalam/posts/2560230747585433>]. Accessed 4 March 2021.
- [4] Comoros Office of the President. 26 March 2020. "Implementation of a response plan against the coronavirus (Mise en place d'un plan de riposte contre le coronavirus)." [<https://stopcoronavirus.km/actualités/2020/03/26/mise-en-place-d-un-plan-de-riposte-contre-le-coronavirus/>]. Accessed 4 March 2021.
- [5] Comoros Ministry of Health. 25 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=866668407123509&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=866668407123509&id=320950001695355)]. Accessed 4 March 2021.
- [6] Comoros Ministry of Health. 7 January 2021. Facebook post. [<https://www.facebook.com/320950001695355/photos/a.321012238355798/1097398664050481>]. Accessed 4 March 2021.
- [7] World Health Organisation (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [<https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19>]. Accessed 4 March 2021.
- [8] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 4 March 2021.
- [9] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 4 March 2021.
- [10] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 4 March 2021.
- [11] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 4 March 2021.
- [12] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 4 March 2021.
- [13] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 4 March 2021.
- [14] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 4 March 2021.

## 4.2 SUPPLY CHAIN FOR HEALTH SYSTEM AND HEALTHCARE

### WORKERS

#### 4.2.1 Routine health care and laboratory system supply

##### 4.2.1a

**Is there a national procurement protocol in place which can be utilized by the Ministries of Health and Agriculture for the acquisition of laboratory supplies (e.g. equipment, reagents and media) and medical supplies (e.g. equipment, PPE) for routine needs?**

Yes for both laboratory and medical supply needs = 2, Yes, but only for one = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a national procurement protocol in place for the acquisition of laboratory or medical supplies. According to the 2018 JEE report, Comoros' laboratories face supply problems. The report recommended



developing a strategy and policy for the laboratory system that covers procurement; and developing agreements on purchasing procedures for laboratory tests. It noted the existence of a central procurement agency for medical supplies, OCOPHARMA. It recommended strengthening regional and international agreements on the acquisition of medical supplies.[1] OCOPHARMA is tasked with ensuring the supply of generic medication and quality medical supplies.[2] The health ministry reported in February 2020 that it was developing a new National Pharmaceutical Policy, together with the National Agency for Medicines and Evacuations (ANAMEV), which would address availability of medications.[3] Neither OCOPHARMA nor ANAMEV have an online presence. No further evidence is available regarding the existence of a national procurement protocol for laboratory or medical supplies. The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning; there is no additional information from the health ministry's Facebook page, and the agriculture ministry has no online presence.[4,5] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these laboratories has an online presence. There is no media reporting suggesting a new procurement system has been introduced.

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 25 August 2020.

[2] Comoros Ministry of Health. 11 April 2018. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 25 August 2020.

[3] Comoros Ministry of Health. 21 February 2020. Facebook

post.[[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 25 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 25 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 25 August 2020.

## 4.2.2 Stockpiling for emergencies

### 4.2.2a

**Does the country have a stockpile of medical supplies (e.g. MCMs, medicines, vaccines, medical equipment, PPE) for national use during a public health emergency?**

Yes = 2, Yes, but there is limited evidence about what the stockpile contains = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a stockpile of medical supplies for use during a public health emergency. The 2018 JEE report stated that Comoros' medical institutions did not have emergency stockpiles of medicines, that emergency stocks (unspecified) for responding to public health emergencies were not available, and that medical supplies were brought in from abroad during public health emergencies. It recommended putting in place stockpiles of emergency medical kits. It did however state that Comoros had good storage capacity for vaccines.[1] There is no evidence that emergency medical stockpiles have since been introduced. The Comorian Office for Pharmaceuticals (OCOPHARMA) and the National Agency for Medicines and Evacuations (ANAMEV) are responsible for ensuring medical supplies.[1,2,3] Neither has an online presence. Between March and May 2020, Comoros received medical kits, testing equipment, respirators, thermoscans and PPE from various external donors.[4,5,6,7,8] There is no evidence of pre-existing stockpiles from the government's dedicated website or Facebook page set up to provide information on the Covid-19 response.[9,10] The main government website, which

formerly hosted a page for the health ministry, is not functioning; nor is the website of the General Directorate of Civil Protection (GDCP), which is responsible for emergency planning.[11,12] No additional information is available from the Facebook pages of the health ministry or the GDCP.[13,14] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these laboratories has an online presence.

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacités RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 6 March 2021.

[2] Comoros Ministry of Health. 11 April 2018. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 6 March 2021.

[3] Comoros Ministry of Health. 21 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 6 March 2021.

[4] Government of Comoros. 14 April 2020. "Update on dispatch of equipment sent to Comoros by Jack Ma and China (Le point sur le dispatching du lot de matériel envoyé aux Comores par Jack Ma et la Chine)." [<https://stopcoronavirus.km/actualités/2020/04/14/le-point-sur-le-dispatching-du-lot-de-mat%C3%A9riel-envoy%C3%A9-par-jack-ma-aux-comores/>]. Accessed 6 March 2021.

[5] Government of Comoros. 16 April 2020. "Press Release No.7 (Communiqué No.7)." [<https://stopcoronavirus.km/actualités/2020/04/16/communiqué-n%C2%B07/>]. Accessed 6 March 2021.

[6] World Health Organization (WHO) Comoros. 2 March 2020. "Medical kits and equipment worth 60 million Comorian francs handed over to Comoros Ministry of Health by WHO (Des kits médicaux et des équipements d'une valeur de 60 millions kmf remis au Ministère de la santé de l'Union des Comores par l'OMS)." [<https://www.afro.who.int/fr/news/des-kits-m%C3%A9dicaux-et-des-%C3%A9quipements-d'une-valeur-de-60-millions-kmf-remis-au-minist%C3%A8re-de-la-sant%C3%A9-de-l-union-des-comores-par-l-oms/>]. Accessed 6 March 2021.

[7] World Health Organization (WHO) Comoros. 29 May 2020. "Strengthening Covid-19 diagnostic capacities in Comoros (Renforcement des capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/renforcement-des-capacit%C3%A9s-diagnostiques-du-covid-19-aux-comores/>]. Accessed 6 March 2021.

[8] Comoros Ministry of Health. 14 April 2020. "Medical donation from the Ben Zayed Al-Nahyan foundation (Don médical de la fondation Ben Zayed Al-Nahyan)." [<https://stopcoronavirus.km/actualités/2020/04/14/don-m%C3%A9dical-de-la-fondation-ben-zayed-al-nahyan/>]. Accessed 6 March 2021.

[9] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 6 March 2021.

[10] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 6 March 2021.

[11] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 6 March 2021.

[12] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 6 March 2021.

[13] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 6 March 2021.

[14] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-G%C3%A9n%C3%A9rale-de-la-S%C3%A9curit%C3%A9-Civile-Comores-102997257812263/>]. Accessed 6 March 2021.

#### 4.2.2b

**Does the country have a stockpile of laboratory supplies (e.g. reagents, media) for national use during a public health emergency?**

Yes = 2, Yes, but there is limited evidence about what the stockpile contains = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a stockpile of laboratory supplies for use during a public health emergency. The 2018 JEE report stated that emergency stocks (unspecified) for responding to public health emergencies were not available in Comoros, and that medical supplies were brought in from abroad during emergencies. It did not mention the existence of a stockpile of laboratory supplies, and stated that laboratories face supply problems.[1] There is no evidence that stockpiles have since been introduced. In March and again in May 2020, the World Health Organization (WHO) provided laboratory supplies (materials, consumables and accessories) to assist with surveillance of, and the response to, both Covid-19 and cholera.[2,3] There is no evidence of a pre-existing stockpile of laboratory supplies from the government's dedicated website or Facebook page set up to provide information on the Covid-19 response.[4,5] The main government website, which formerly hosted a page for the health ministry, is not functioning; nor is the website of the General Directorate of Civil Protection (GDCP), which is responsible for emergency planning.[6,7] No additional information is available from the Facebook pages of the health ministry or the GDCP.[8,9] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these laboratories has an online presence.

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 25 August 2020.

[2] World Health Organization (WHO) Comoros. 2 March 2020. "Medical kits and equipment worth 60 million Comorian francs handed over to Comoros Ministry of Health by WHO (Des kits médicaux et des équipements d'une valeur de 60 millions kmf remis au Ministère de la santé de l'Union des Comores par l'OMS)." [<https://www.afro.who.int/fr/news/des-kits-medicaux-et-des-equipements-dune-valeur-de-60-millions-kmf-remis-au-ministere-de-la>]. Accessed 25 August 2020.

[3] World Health Organization (WHO) Comoros. 29 May 2020. "Strengthening Covid-19 diagnostic capacities in Comoros (Renforcement des capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/renforcement-des-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 25 August 2020.

[4] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 25 August 2020.

[5] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 25 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 25 August 2020.

[7] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 25 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 25 August 2020.

[9] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 25 August 2020.

#### 4.2.2c

**Is there evidence that the country conducts or requires an annual review of the national stockpile to ensure the supply is sufficient for a public health emergency?**

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a stockpile of medical supplies for use during a public health emergency, nor that it conducts any reviews of stockpiles. The 2018 JEE report stated that Comoros' medical institutions did not have emergency

stockpiles of medicines, that emergency stocks (unspecified) for responding to public health emergencies were not available, and that medical supplies were brought in from abroad during public health emergencies. It recommended putting in place stockpiles of emergency medical kits. It did however state that Comoros had good storage capacity for vaccines.[1] There is no evidence that emergency medical stockpiles have since been introduced. The Comorian Office for Pharmaceuticals (OCOPHARMA) and the National Agency for Medicines and Evacuations (ANAMEV) are responsible for ensuring medical supplies.[1,2,3] Neither has an online presence. Between March and May 2020, Comoros received medical kits, testing equipment, respirators, thermoscans and PPE from various external donors.[4,5,6,7,8] There is no evidence of pre-existing stockpiles from the government's dedicated website or Facebook page set up to provide information on the Covid-19 response.[9,10] The main government website, which formerly hosted a page for the health ministry, is not functioning; nor is the website of the General Directorate of Civil Protection (GDPC), which is responsible for emergency planning.[11,12] No additional information is available from the Facebook pages of the health ministry or the GDPC.[13,14] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these laboratories has an online presence.

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 6 March 2021.

[2] Comoros Ministry of Health. 11 April 2018. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 6 March 2021.

[3] Comoros Ministry of Health. 21 February 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 6 March 2021.

[4] Government of Comoros. 14 April 2020. "Update on dispatch of equipment sent to Comoros by Jack Ma and China (Le point sur le dispatching du lot de matériel envoyé aux Comores par Jack Ma et la Chine)."

[<https://stopcoronavirus.km/actualités/2020/04/14/le-point-sur-le-dispatching-du-lot-de-mat%C3%A9riel-envoy%C3%A9-par-jack-ma-aux-comores/>]. Accessed 6 March 2021.

[5] Government of Comoros. 16 April 2020. "Press Release No.7 (Communiqué No.7)."

[<https://stopcoronavirus.km/actualités/2020/04/16/communiqué-n%C2%B07/>]. Accessed 6 March 2021.

[6] World Health Organization (WHO) Comoros. 2 March 2020. "Medical kits and equipment worth 60 million Comorian francs handed over to Comoros Ministry of Health by WHO (Des kits médicaux et des équipements d'une valeur de 60 millions kmf remis au Ministère de la santé de l'Union des Comores par l'OMS)." [<https://www.afro.who.int/fr/news/des-kits-medicaux-et-des-equipements-dune-valeur-de-60-millions-kmf-remis-au-ministere-de-la>]. Accessed 6 March 2021.

[7] World Health Organization (WHO) Comoros. 29 May 2020. "Strengthening Covid-19 diagnostic capacities in Comoros (Renforcement des capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/renforcement-des-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 6 March 2021.

[8] Comoros Ministry of Health. 14 April 2020. "Medical donation from the Ben Zayed Al-Nahyan foundation (Don médical de la fondation Ben Zayed Al-Nahyan)." [<https://stopcoronavirus.km/actualités/2020/04/14/don-m%C3%A9dical-de-la-fondation-ben-zayed-al-nahyan/>]. Accessed 6 March 2021.

[9] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 6 March 2021.

[10] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 6 March 2021.

[11] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 6 March 2021.

[12] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 6 March 2021.

[13] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 6 March 2021.

[14] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 6 March 2021.

## 4.2.3 Manufacturing and procurement for emergencies

### 4.2.3a

Does the country meet one of the following criteria?

- Is there evidence of a plan/agreement to leverage domestic manufacturing capacity to produce medical supplies (e.g. MCMs, medicines, vaccines, equipment, PPE) for national use during a public health emergency?

- Is there evidence of a plan/mechanism to procure medical supplies (e.g. MCMs, medicines, vaccines, equipment, PPE) for national use during a public health emergency?

Needs to meet at least one of the criteria to be scored a 1 on this measure., Yes for both = 1, Yes for one = 1, No for both = 0

**Current Year Score: 0**

There is no evidence that Comoros has a plan or mechanism either to leverage domestic manufacturing capacity to produce, or to procure, medical supplies during a public health emergency. The 2018 JEE report made no mention of a relevant plan or mechanism. It noted there was a central procurement agency for medical supplies, the Comorian Office for Pharmaceuticals (OCOPHARMA), and that medical supplies were brought in from abroad during emergencies. It recommended strengthening regional and international agreements on the acquisition of medical supplies.[1] There is no evidence that plans to increase production or procurement of medical supplies during an emergency have since been introduced. Information from the health ministry and World Health Organization (WHO) in Comoros during the 2020 Covid-19 pandemic showed a reliance on external donors for additional medical supplies, but did not mention a mechanism for planning this.[2,3,4] OCOPHARMA is tasked with ensuring the supply of generic medication and medical supplies, including manufacturing.[5] The National Agency for Medicines and Evacuations (ANAMEV) is the national regulator for medications.[6] Neither OCOPHARMA nor ANAMEV has an online presence. There is no evidence of a relevant plan or mechanism from the government's dedicated website or Facebook page set up to provide information on the Covid-19 response.[7,8] The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no additional information from the health ministry's Facebook page.[9,10] The agency responsible for general emergency response planning is the General Directorate of Civil Protection (GDGP).[11] The GDGP's website is not functioning, and there is no additional information available from its Facebook page.[11,12]

[1] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 7 March 2021.

[2] World Health Organization (WHO) Comoros. 2 March 2020. "Medical kits and equipment worth 60 million Comorian francs handed over to Comoros Ministry of Health by WHO (Des kits médicaux et des équipements d'une valeur de 60 millions kmf remis au Ministère de la santé de l'Union des Comores par l'OMS)." [<https://www.afro.who.int/fr/news/des-kits-medicaux-et-des-equipements-dune-valeur-de-60-millions-kmf-remis-au-ministere-de-la>]. Accessed 7 March 2021.

[3] World Health Organization (WHO) Comoros. 29 May 2020. "Strengthening Covid-19 diagnostic capacities in Comoros (Renforcement des capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/renforcement-des-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 7 March 2021.

[4] Comoros Ministry of Health. 14 April 2020. "Medical donation from the Ben Zayed Al-Nahyan foundation (Don médical de la fondation Ben Zayed Al-Nahyan)." [<https://stopcoronavirus.km/actualités/2020/04/14/don-médical-de-la-fondation-ben-zayed-al-nahyan/>]. Accessed 7 March 2021.

[5] Comoros Ministry of Health. 11 April 2018. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 7 March 2021.

[6] Mzembaba, A. 15 November 2018. "Public health: Towards the end of uncontrolled imports of medicines? (Santé publique : Vers la fin de l'importation incontrôlée des médicaments?)." Al-watwan. Accessed 7 March 2021.

[7] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 7 March 2021.

[8] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 7 March 2021.

[9] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 7 March 2021.

[10] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 7 March 2021.

[11] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 7 March 2021.

[12] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 7 March 2021.

### 4.2.3b

**Does the country meet one of the following criteria?**

- Is there evidence of a plan/agreement to leverage domestic manufacturing capacity to produce laboratory supplies (e.g. reagents, media) for national use during a public health emergency?

- Is there evidence of a plan/mechanism to procure laboratory supplies (e.g. reagents, media) for national use during a public health emergency?

Needs to meet at least one of the criteria to be scored a 1 on this measure., Yes for both = 1, Yes for one = 1, No for both = 0

**Current Year Score: 0**

There is no evidence that Comoros has a plan to leverage domestic manufacturing capacity to produce, or procure, laboratory supplies during a public health emergency. The 2018 JEE report made no mention of such mechanisms. It stated that laboratories face supply problems and recommended developing a laboratories strategy addressing the supply of reagents.[1] There is no evidence that plans to increase production or procurement of laboratory supplies during an emergency have since been introduced. In March and May 2020, the World Health Organization (WHO) provided laboratory supplies (materials, consumables and accessories) to assist with surveillance of, and the response to, both Covid-19 and cholera; there is no evidence that this was done under a pre-agreed plan.[2,3] There is no evidence of an emergency plan for acquiring additional laboratory supplies from the government's dedicated website or Facebook page set up to provide information on the Covid-19 response.[4,5] The main government website, which formerly hosted a page for the health ministry, is not functioning; nor is the website of the General Directorate of Civil Protection (GDPC), which is responsible for emergency planning.[6,7] No additional information is available from the Facebook pages of the health ministry or the GDPC.[8,9] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither of these laboratories has an online presence. The Comorian Office for Pharmaceuticals (OCOPHARMA) and the National Agency for Medicines and Evacuations (ANAMEV) are responsible for ensuring and overseeing medical supplies.[1,10,11] Neither has an online presence.

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 25 August 2020.

[2] World Health Organization (WHO) Comoros. 2 March 2020. "Medical kits and equipment worth 60 million Comorian francs handed over to Comoros Ministry of Health by WHO (Des kits médicaux et des équipements d'une valeur de 60

millions kmf remis au Ministère de la santé de l'Union des Comores par l'OMS)." [<https://www.afro.who.int/fr/news/des-kits-medicaux-et-des-equipements-dune-valeur-de-60-millions-kmf-remis-au-ministere-de-la>]. Accessed 25 August 2020.

[3] World Health Organization (WHO) Comoros. 29 May 2020. "Strengthening Covid-19 diagnostic capacities in Comoros (Renforcement des capacités diagnostiques du Covid-19 aux Comores)." [<https://www.afro.who.int/fr/news/renforcement-des-capacites-diagnostiques-du-covid-19-aux-comores>]. Accessed 25 August 2020.

[4] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 25 August 2020.

[5] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 25 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 25 August 2020.

[7] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 25 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 25 August 2020.

[9] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 25 August 2020.

[10] Comoros Ministry of Health. 11 April 2018. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 25 August 2020.

[11] Comoros Ministry of Health. 21 February 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 25 August 2020.

## 4.3 MEDICAL COUNTERMEASURES AND PERSONNEL DEPLOYMENT

### 4.3.1 System for dispensing medical countermeasures (MCM) during a public health emergency

#### 4.3.1a

**Does the country have a plan, program, or guidelines in place for dispensing medical countermeasures (MCM) for national use during a public health emergency (i.e., antibiotics, vaccines, therapeutics and diagnostics)?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has a plan for dispensing medical countermeasures (MCM) during a public health emergency. The 2018 JEE report stated that there were no written plans for this and recommended addressing this gap.[1] There is no evidence that the situation has since changed. Information on public health emergency response planning, and on the 2020 Covid-19 response, is available from the health ministry's Facebook page; from the dedicated government Facebook page and website on the Covid-19 response; and from the World Health Organization (WHO) in Comoros. There is no evidence from these sources of a plan for dispensing MCM during an emergency.[2,3,4,5] The government announced in September 2018 that a national action plan on health security had been approved, but it is not publicly available.[6] The General Directorate of Civil Protection (GDPC), responsible for general emergency planning, published a National Contingency Plan 2017-18, which took into account epidemiological risks.[1,7] The Contingency Plan does not address how to dispense MCM.[7] The main government website, which formerly hosted a page for the health ministry, is not functioning; nor is the website of the GDPC.[8,9] No relevant information is available from the GDPC's Facebook page.[10]

- [1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 26 August 2020.
- [2] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.
- [3] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 26 August 2020.
- [4] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 26 August 2020.
- [5] World Health Organization (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 26 August 2020.
- [6] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire-/préparer-le-pays-à-faire-face-aux-épidémies.html>]. Accessed 26 August 2020.
- [7] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)." [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 26 August 2020.
- [8] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.
- [9] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 26 August 2020.
- [10] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 26 August 2020.

### 4.3.2 System for receiving foreign health personnel during a public health emergency

#### 4.3.2a

Is there a public plan in place to receive health personnel from other countries to respond to a public health emergency?

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros has basic plans in place to receive personnel from other countries during a public health emergency, but there is no evidence of an operational plan for identifying, managing and deploying such personnel. The 2017-18 National Contingency Plan published by the General Directorate of Civil Protection (GDPC), which covers epidemics but is not specific to them, makes brief mention of arrangements for receiving international assistance during an emergency, but provides no details specific to health personnel.[1,2] The government announced in September 2018 that a national action plan on health security had been approved, but it is not publicly available.[3] Comoros is a member of the Indian Ocean Commission (IOC)'s SEGA One Health Network, whose members have committed to deploy personnel to each other's countries in an epidemic.[1] There is no evidence from the JEE report or the IOC that a detailed plan exists regarding such deployments.[1,4,5] Information on public health emergency response planning, and on the 2020 Covid-19 response, is available from the health ministry's Facebook page; from the dedicated government Facebook page and website on the Covid-19 response; and from the World Health Organization (WHO) in Comoros. There is no evidence from these sources of a plan to receive health personnel during an emergency.[6,7,8,9] The main government website, which formerly hosted a page for the health ministry, is not functioning; nor is the website of the GDPC.[10,11] No relevant information is available from



the GDCP's Facebook page.[12]

- [1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 26 August 2020.
- [2] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)." [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 26 August 2020.
- [3] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire-/-preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 26 August 2020.
- [4] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)." [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 26 August 2020.
- [5] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 26 August 2020.
- [6] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.
- [7] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 26 August 2020.
- [8] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 26 August 2020.
- [9] World Health Organization (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 26 August 2020.
- [10] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.
- [11] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 26 August 2020.
- [12] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 26 August 2020.

## 4.4 HEALTHCARE ACCESS

### 4.4.1 Access to healthcare

#### 4.4.1a

**Does the constitution explicitly guarantee citizens' right to medical care?**

Guaranteed free = 4, Guaranteed right = 3, Aspirational or subject to progressive realization = 2, Guaranteed for some groups, not universally = 1, No specific provision = 0

**Current Year Score: 0**

2020

World Policy Analysis Center

#### 4.4.1b

##### Access to skilled birth attendants (% of population)

Input number

Current Year Score: 82.2

2012

WHO/World Bank/United Nations Children's Fund (UNICEF)

#### 4.4.1c

##### Out-of-pocket health expenditures per capita, purchasing power parity (PPP; current international \$)

Input number

Current Year Score: 91.95

2017

WHO Global Health Expenditure database

### 4.4.2 Paid medical leave

#### 4.4.2a

##### Are workers guaranteed paid sick leave?

Paid sick leave = 2, Unpaid sick leave = 1, No sick leave = 0

Current Year Score: 2

2020

World Policy Analysis Center

### 4.4.3 Healthcare worker access to healthcare

#### 4.4.3a

##### Has the government issued legislation, a policy, or a public statement committing to provide prioritized healthcare services to healthcare workers who become sick as a result of responding to a public health emergency?

Yes = 1, No = 0

Current Year Score: 0

There is no evidence that the government of Comoros has committed to provide prioritised healthcare services to workers who become sick as a result of responding to a public health emergency. There was no evidence of such a commitment in the 2018 JEE report. The General Directorate for Civil Protection (GDPC) is responsible for general emergency planning.[1] Its website is not functioning, and no information on treatment of healthcare workers in an emergency is available from its Facebook page or its 2017-18 National Contingency Plan.[2,3,4] The government announced in September 2018 that a national action plan on health security had been approved, which covers epidemic response planning.[5] The plan is not available. The 1995 law no. 1995-13, "Code on public health and social action", only states that "all persons who conduct a

professional activity exposing them to risks of contamination must be vaccinated." [6] The health code was updated in 2011. [7] The new version is not available. No further relevant evidence is available. Information on public health emergency response planning, and on the 2020 Covid-19 response, is available from the health ministry's Facebook page; from the dedicated government Facebook page and website on the Covid-19 response; and from the World Health Organization (WHO) in Comoros. There is no relevant evidence from these sources. [8,9,10,11] The main government website, which formerly hosted a page for the health ministry, is not functioning. [12] No additional information is available from the WHO's repository of Comoros health policies, or from the Droit Afrique legal database. [13,14]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 26 August 2020.

[2] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 26 August 2020.

[3] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 26 August 2020.

[4] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)". [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 26 August 2020.

[5] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire/-préparer-le-pays-à-faire-face-aux-épidémies.html>]. Accessed 26 August 2020.

[6] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 26 August 2020.

[7] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 26 August 2020.

[8] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.

[9] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 26 August 2020.

[10] Government of Comoros. Stop Coronavirus: Official website. [<https://stopcoronavirus.km/>]. Accessed 26 August 2020.

[11] World Health Organization (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 26 August 2020.

[12] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.

[13] World Health Organization (WHO). "National health planning cycles: Comoros."

[<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 26 August 2020.

[14] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 26 August 2020.

## 4.5 COMMUNICATIONS WITH HEALTHCARE WORKERS DURING A PUBLIC HEALTH EMERGENCY

### 4.5.1 Communication with healthcare workers

#### 4.5.1a

**Is there a system in place for public health officials and healthcare workers to communicate during a public health emergency?**

Yes = 1, No = 0

**Current Year Score: 0**

There is evidence that Comoros has a communication plan specifically intended for use during the Covid-19 public health emergency, but it is not publicly available, and there is insufficient evidence that it addresses communication between health officials and healthcare workers, or that a plan applicable to other diseases exists. In March 2020, the health ministry reported that under the framework for preparation, prevention and response to Covid-19, a sub-committee on risk communication was putting in place measures for public communication, including coordination with civil society organisations.[1,2,3] In April 2020, the World Health Organization (WHO) Comoros reported that it had supported the development of a risk communication plan for Covid-19, along with a national plan for preparation and response.[4] The government approved a national action plan on health security, addressing epidemic response, in September 2018.[5] Neither this action plan, nor the plan specific to Covid-19, are publicly available. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating the Covid-19 response.[6,7,8,9] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDGP).[10] The GDGP's website is not functioning, and no additional relevant information is available from its Facebook page.[11,12] No additional information is available from the WHO Comoros.[13]

[1] Comoros Ministry of Health. 17 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=881172322339784&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=881172322339784&id=320950001695355)]. Accessed 26 August 2020.

[2] Comoros Ministry of Health. 22 March 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=884859461971070&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=884859461971070&id=320950001695355)]. Accessed 26 August 2020.

[3] Comoros Ministry of Health. 28 March 2020. "Volunteer training for awareness and prevention (Formation de volontaires pour sensibiliser et prévenir)." Stop Coronavirus. [<https://stopcoronavirus.km/actualités/2020/03/28/formation-de-volontaires-pour-sensibiliser-et-prevenir/>]. Accessed 26 August 2020.

[4] World Health Organization (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores : l'OMS sur tous les fronts contre le Covid-19)." [<https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19>]. Accessed 26 August 2020.

[5] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Préparer le pays à faire face aux épidémies (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire-/preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 26 August 2020.

[6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.

[8] Comoros Coordination Against Covid-19. Official Facebook page. [<https://www.facebook.com/Coordination-Comores->

Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 26 August 2020.

[9] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 26 August 2020.

[10] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1]. Accessed 26 August 2020.

[11] General Directorate of Civil Protection. Official website. [http://securitecivile-comores.org/index.php]. Accessed 26 August 2020.

[12] General Directorate of Civil Protection. Official Facebook page. [https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\_internal]. Accessed 26 August.

[13] World Health Organisation (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 26 August 2020.

#### 4.5.1b

##### **Does the system for public health officials and healthcare workers to communicate during an emergency encompass healthcare workers in both the public and private sector?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is evidence that Comoros has a communication plan specifically intended for use during the Covid-19 public health emergency, but it is not publicly available, and there is insufficient evidence that it encompasses healthcare workers in the public or private sectors, or that a plan applicable to other diseases exists. In March 2020, the health ministry reported that under the framework for preparation, prevention and response to Covid-19, a sub-committee on risk communication was putting in place measures for public communication, including coordination with civil society organisations. [1,2,3] In April 2020, the World Health Organization (WHO) Comoros reported that it had supported the development of a risk communication plan for Covid-19, along with a national plan for preparation and response.[4] The government approved a national action plan on health security, addressing epidemic response, in September 2018.[5] Neither this action plan, nor the plan specific to Covid-19, are publicly available. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook page of the health ministry, or from the government's dedicated Facebook page and website for communicating the Covid-19 response.[6,7,8,9] The agency responsible for general emergency response preparation is the General Directorate of Civil Protection (GDPC).[10] The GDPC's website is not functioning, and no additional relevant information is available from its Facebook page.[11,12] No additional information is available from the WHO Comoros.[13] Comoros' health system is highly reliant on the private and charitable sectors, which are unregulated, though a World Bank-funded program launched in 2019 aims to strengthen regulation of private healthcare.[14,15,16]

[1] Comoros Ministry of Health. 17 March 2020. Facebook post.

[https://www.facebook.com/permalink.php?story\_fbid=881172322339784&id=320950001695355]. Accessed 26 August 2020.

[2] Comoros Ministry of Health. 22 March 2020. Facebook post.

[https://www.facebook.com/permalink.php?story\_fbid=884859461971070&id=320950001695355]. Accessed 26 August 2020.

[3] Comoros Ministry of Health. 28 March 2020. "Volunteer training for awareness and prevention (Formation de volontaires pour sensibiliser et prévenir)." Stop Coronavirus. [https://stopcoronavirus.km/actualités/2020/03/28/formation-de-volontaires-pour-sensibiliser-et-prévenir/]. Accessed 26 August 2020.

[4] World Health Organization (WHO) Comoros. 17 April 2020. "Comoros: WHO on all fronts against Covid-19 (Comores :

l'OMS sur tous les fronts contre le Covid-19)." [https://www.afro.who.int/fr/news/comores-loms-sur-tous-les-fronts-contre-le-covid-19]. Accessed 26 August 2020.

[5] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Préparer le pays à faire face aux épidémies (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html]. Accessed 26 August 2020.

[6] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 26 August 2020.

[7] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 26 August 2020.

[8] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 26 August 2020.

[9] Stop Coronavirus. "Archives." [https://stopcoronavirus.km/archives/]. Accessed 26 August 2020.

[10] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018-6-fre.pdf?sequence=1]. Accessed 26 August 2020.

[11] General Directorate of Civil Protection. Official website. [http://securitecivile-comores.org/index.php]. Accessed 26 August 2020.

[12] General Directorate of Civil Protection. Official Facebook page. [https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\_internal]. Accessed 26 August.

[13] World Health Organisation (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 26 August 2020.

[14] World Health Organisation (WHO) Africa. 2009. "WHO strategy for country-level cooperation 2009-2013: Comoros." [https://apps.who.int/iris/bitstream/handle/10665/136990/ccs\_com.pdf?sequence=1]. Accessed 26 August 2020.

[15] World Bank. 10 June 2019. Comoros Comprehensive Approach to Health System Strengthening (COMPASS) project: Project appraisal document. [http://documents1.worldbank.org/curated/en/988861560788593578/pdf/Comoros-Comprehensive-Approach-to-Health-System-Strengthening-Project.pdf]. Accessed 26 August 2020.

[16] World Bank. 2 July 2019. "World Bank supports comoros to improve primary health care."

[https://www.worldbank.org/en/news/press-release/2019/07/02/world-bank-supports-comoros-to-improve-primary-health-care]. Accessed 26 August 2020.

## 4.6 INFECTION CONTROL PRACTICES AND AVAILABILITY OF EQUIPMENT

### 4.6.1 Healthcare associated infection (HCAI) prevention and control programs

#### 4.6.1a

**Is there evidence that the national public health system is monitoring for and tracking the number of healthcare associated infections (HCAI) that take place in healthcare facilities?**

Yes = 1 , No = 0

**Current Year Score: 0**

There is insufficient evidence that Comoros' public health system is monitoring healthcare associated infections (HCAI). The 2018 JEE report did not provide evidence of any monitoring activities, and stated that Comoros needed to develop an HCAI prevention policy, create committees to oversee HCAI at national, regional and local levels, and strengthen training.[1] There is no information about monitoring for HCAI in the National Health Policy (2015-2024) or the latest health plan (2014-

2019).[2,3] In August 2020, the health ministry reported that together with the World Health Organization (WHO), it had developed the country's first document setting standards and guidelines on the prevention and control of infections, for use in healthcare facilities. It aimed to promote hygiene and safety, protect healthcare workers, and help prevent antimicrobial resistance.[4] The document is not available online, and no further evidence is available on its content or implementation, from the health ministry's Facebook page; the government's dedicated Facebook page and website for communicating the Covid-19 response; the WHO in Comoros; the WHO's repository of health policies; or the Droit Afrique legal database.[5,6,7,8,9,10] The main government website (which formerly hosted a page for the health ministry) is not functioning.[11] The two laboratories designated with roles in epidemiology are those at Ngazidja Hospital ("El Maarouf") for human health and at the National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) for animal health.[1] Neither has an online presence.

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 26 August 2020.

[2] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National Health Policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 26 August 2020.

[3] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete Multi-Annual Plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 26 August 2020.

[4] Comoros Ministry of Health. 7 August 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=983050858818596&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=983050858818596&id=320950001695355)]. Accessed 26 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.

[6] Comoros Coordination Against Covid-19. Official Facebook page. [[https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\\_internal](https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page_internal)]. Accessed 26 August 2020.

[7] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 26 August 2020.

[8] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 26 August 2020.

[9] World Health Organization (WHO). "National health planning cycles: Comoros."

[<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 26 August 2020.

[10] Droit Afrique. "Comores: Documentation." [<http://www.droit-afrique.com/pays/Comores/#documentation>]. Accessed 26 August 2020.

[11] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.

## 4.7 CAPACITY TO TEST AND APPROVE NEW MEDICAL COUNTERMEASURES

### 4.7.1 Regulatory process for conducting clinical trials of unregistered interventions

#### 4.7.1a

**Is there a national requirement for ethical review (e.g., from an ethics committee or via Institutional Review Board approval) before beginning a clinical trial?**

Yes = 1 , No = 0

**Current Year Score: 0**

Comoros does not have a policy or legal framework for conducting clinical trials, and there is no requirement for ethical review. When the latest pharmaceutical profile of Comoros was published by the World Health Organization (WHO) in 2011, there was no research and development of pharmaceutical products taking place in Comoros. The Pharmaceutical Regulation Authority (PRA) was in charge of registration and quality control of medications, but had no function regarding clinical trials. There was no legislation requiring authorisation from the PRA, an ethics committee or an institutional review board to conduct a clinical trial.[1] There is no evidence that the situation has changed. The authority regulating medicines was changed in 2018 to the National Agency of Medicines and Medical Evacuations (ANAMEV). Its main role is to ensure the quality and correct usage of imported medications.[2] The Comorian Office for Pharmaceuticals (OCOPHARMA), created in 2017, has been given a role in researching and manufacturing medicines.[3] Neither ANAMEV nor OCOPHARMA has an online presence. In February 2020, the health ministry reported that it was developing an updated national pharmaceutical policy, but did not provide evidence that this would address clinical trials.[4] There is no information regarding requirements for clinical trials in the National Health Policy 2015-24; the latest health plan (2014-2019); or the 1995 Law no. 1995-13, "Code on public health and social action".[5,6,7] The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the health ministry's Facebook page, or the National Centre of Documentation and Scientific Research.[8,9,10]

[1] Health Ministry of Comoros and the World Health Organization (WHO). 2011. "Comoros: Pharmaceutical country profile." [[http://www.who.int/medicines/areas/coordination/Comoros\\_PSCPNarrativeQuestionnaire\\_FR\\_30062011.pdf](http://www.who.int/medicines/areas/coordination/Comoros_PSCPNarrativeQuestionnaire_FR_30062011.pdf)]. Accessed 26 August 2020.

[2] World Health Organization (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)." [<https://www.afro.who.int/pt/node/10584>]. Accessed 26 August 2020.

[3] Comoros Ministry of Health. 11 April 2018. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 26 August 2020.

[4] Comoros Ministry of Health. 21 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 26 August 2020.

[5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)." [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 26 August 2020.

[6] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019,



revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[https://extranet.who.int/countryplanningcycles/sites/default/files/country\_docs/Comoros/cmyp\_2014\_-\_2019\_-\_comores\_1.pdf]. Accessed 26 August 2020.

[7] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf]. Accessed 26 August 2020.

[8] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 26 August 2020.

[9] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 26 August 2020.

[10] National Centre of Documentation and Scientific Research (CNDRS). 2018. Official site. [http://www.cndrs-comores.org]. Accessed 26 August 2020

#### 4.7.1b

##### Is there an expedited process for approving clinical trials for unregistered medical countermeasures (MCM) to treat ongoing epidemics?

Yes = 1, No = 0

**Current Year Score: 0**

There is no evidence of an expedited process in Comoros for approving clinical trials for unregistered medical countermeasures (MCM). Comoros does not have a policy or legal framework for conducting clinical trials, and there is no requirement for ethical review. When the latest pharmaceutical profile of Comoros was published by the World Health Organization (WHO) in 2011, there was no research and development of pharmaceutical products taking place in Comoros. The Pharmaceutical Regulation Authority (PRA) was in charge of registration and quality control of medications, but had no function regarding clinical trials. There was no legislation requiring authorisation from the PRA, an ethics committee or an institutional review board to conduct a clinical trial.[1] There is no evidence that the situation has changed. The authority regulating medicines was changed in 2018 to the National Agency of Medicines and Medical Evacuations (ANAMEV). Its main role is to ensure the quality and correct usage of imported medications.[2] The Comorian Office for Pharmaceuticals (OCOPHARMA), created in 2017, has been given a role in researching and manufacturing medicines.[3] Neither ANAMEV nor OCOPHARMA has an online presence. In February 2020, the health ministry reported that it was developing an updated national pharmaceutical policy, but did not provide evidence that this would address clinical trials.[4] There is no information regarding requirements for clinical trials in the National Health Policy 2015-24; the latest health plan (2014-2019); or the 1995 Law no. 1995-13, "Code on public health and social action".[5,6,7] The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the health ministry's Facebook page, or the National Centre of Documentation and Scientific Research.[8,9,10]

[1] Health Ministry of Comoros and the World Health Organization (WHO). 2011. "Comoros: Pharmaceutical country profile." [http://www.who.int/medicines/areas/coordination/Comoros\_PSCPNarrativeQuestionnaire\_FR\_30062011.pdf]. Accessed 26 August 2020.

[2] World Health Organization (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)." [https://www.afro.who.int/pt/node/10584]. Accessed 26 August 2020.

[3] Comoros Ministry of Health. 11 April 2018. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=429417750848579&id=320950001695355]. Accessed 26 August 2020.

[4] Comoros Ministry of Health. 21 February 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 26 August 2020.

[5] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 26 August 2020.

[6] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 26 August 2020.

[7] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 26 August 2020.

[8] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.

[9] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.

[10] National Centre of Documentation and Scientific Research (CNDRS). 2018. Official site. [<http://www.cndrs-comores.org>]. Accessed 26 August 2020.

## 4.7.2 Regulatory process for approving medical countermeasures

### 4.7.2a

**Is there a government agency responsible for approving new medical countermeasures (MCM) for humans?**

Yes = 1, No = 0

**Current Year Score: 1**

Comoros has an agency responsible for approving new medical countermeasures (MCMs) for humans, the National Agency of Medicines and Medical Evacuations (ANAMEV). The latest pharmaceutical profile of Comoros, published by the World Health Organization (WHO) in 2011, stated that the Pharmaceutical Regulation Authority (PRA) was in charge of registration and quality control of medications.[1] The PRA was replaced in 2018 by the National Agency of Medicines and Medical Evacuations (ANAMEV). Its main role is to ensure the quality and correct usage of imported medications. The WHO has assisted ANAMEV to introduce systems for registering new pharmaceutical products.[2,3] The Comorian Office for Pharmaceuticals (OCOPHARMA), created in 2017, is responsible for ensuring the supply of quality essential medicines and medical consumables to medical facilities, and for some manufacturing of human medicines.[4] Neither ANAMEV nor OCOPHARMA has an online presence. In February 2020, the health ministry reported that it was developing an updated national pharmaceutical policy, but did not provide evidence that this would address MCM approvals.[5] There is no information regarding approval of MCMs in the National Health Policy 2015-24; the latest health plan (2014-2019); or the 1995 Law no. 1995-13, "Code on public health and social action".[6,7,8] The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the health ministry's Facebook page, or the National Centre of Documentation and Scientific Research.[9,10,11]

[1] Health Ministry of Comoros and the World Health Organization (WHO). 2011. "Comoros: Pharmaceutical country profile." [[http://www.who.int/medicines/areas/coordination/Comoros\\_PSCPNarrativeQuestionnaire\\_FR\\_30062011.pdf](http://www.who.int/medicines/areas/coordination/Comoros_PSCPNarrativeQuestionnaire_FR_30062011.pdf)]. Accessed 26 August 2020.

[2] World Health Organization (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale

- des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)." [https://www.afro.who.int/pt/node/10584]. Accessed 26 August 2020.
- [3] Comoros Ministry of Health. 5 November 2018. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=558817577908595&id=320950001695355]. Accessed 26 August 2020.
- [4] Comoros Ministry of Health. 11 April 2018. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=429417750848579&id=320950001695355]. Accessed 26 August 2020.
- [5] Comoros Ministry of Health. 21 February 2020. Facebook post. [https://www.facebook.com/permalink.php?story\_fbid=863934667396883&id=320950001695355]. Accessed 26 August 2020.
- [6] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)." [https://extranet.who.int/countryplanningcycles/sites/default/files/planning\_cycle\_repository/comoros/comoros\_-\_pns\_2015-2024\_version\_adoptee\_cns.pdf]. Accessed 26 August 2020.
- [7] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)." [https://extranet.who.int/countryplanningcycles/sites/default/files/country\_docs/Comoros/cmyp\_2014\_-\_2019\_-\_comores\_1.pdf]. Accessed 26 August 2020.
- [8] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf]. Accessed 26 August 2020.
- [9] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 26 August 2020.
- [10] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 26 August 2020.
- [11] National Centre of Documentation and Scientific Research (CNDRS). 2018. Official site. [http://www.cndrs-comores.org]. Accessed 26 August 2020.

#### 4.7.2b

##### Is there an expedited process for approving medical countermeasures (MCM) for human use during public health emergencies?

Yes = 1 , No = 0

**Current Year Score: 0**

There is no evidence that Comoros has an expedited process for approving new medical countermeasures (MCM) during a public health emergency. According to the latest pharmaceutical profile of Comoros, published in 2011 by the World Health Organization, the Pharmaceutical Regulation Authority (PRA) was responsible for registering (granting market authorization for) all medications coming onto the market, but there were no publicly available criteria for this. [1] The PRA was replaced in 2018 by the National Agency of Medicines and Medical Evacuations (ANAMEV), tasked with registering new, imported medications. [2,3] The Comorian Office for Pharmaceuticals (OCOPHARMA), created in 2017, is responsible for ensuring the supply of quality essential medicines and medical consumables to medical facilities, and for some manufacturing of human medicines. [4] Neither ANAMEV nor OCOPHARMA has an online presence. In February 2020, the health ministry reported that it was developing an updated national pharmaceutical policy, but did not provide evidence that this would address MCM approvals. [5] There is no information regarding approval of MCMs in the National Health Policy 2015-24; the latest health plan (2014-2019); or the 1995 Law no. 1995-13, "Code on public health and social action". [6,7,8] The government approved a national action plan on health security, addressing epidemic response, in September 2018. [9] It is not publicly available.

The main government website (which formerly hosted a page for the health ministry) is not functioning, and no further evidence is available from the Facebook pages of the health ministry or the General Directorate for Civil Protection, which is in charge of general emergency planning; or from the website of the National Centre of Documentation and Scientific Research. [10,11,12,13]

[1] Health Ministry of Comoros and the World Health Organization (WHO). 2011. "Comoros: Pharmaceutical country profile." [[http://www.who.int/medicines/areas/coordination/Comoros\\_PSCPNarrativeQuestionnaire\\_FR\\_30062011.pdf](http://www.who.int/medicines/areas/coordination/Comoros_PSCPNarrativeQuestionnaire_FR_30062011.pdf)]. Accessed 26 August 2020.

[2] World Health Organization (WHO) Comoros. 6 November 2018. "Reinforcing the capacity of the National Agency of Medicines and Medical Evacuations: For more reliable medicines in Comoros (Renforcer les capacités de l'Agence Nationale des Médicaments et des Evacuations Sanitaires : pour des médicaments plus sûrs en Union des Comores)." [<https://www.afro.who.int/pt/node/10584>]. Accessed 26 August 2020.

[3] Comoros Ministry of Health. 5 November 2018. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=558817577908595&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=558817577908595&id=320950001695355)]. Accessed 26 August 2020.

[4] Comoros Ministry of Health. 11 April 2018. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=429417750848579&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=429417750848579&id=320950001695355)]. Accessed 26 August 2020.

[5] Comoros Ministry of Health. 21 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=863934667396883&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863934667396883&id=320950001695355)]. Accessed 26 August 2020.

[6] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)." [[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 26 August 2020.

[7] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)." [[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 26 August 2020.

[8] Government of Comoros. Law no. 1995-13 of 24 June 1995 "Code on public health and social action for the wellbeing of the population (Code de la santé publique et de l'action sociale pour le bien être de la population)". [<http://droit-afrique.com/upload/doc/comores/Comores-Code-1995-sante-publique.pdf>]. Accessed 26 August 2020.

[9] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 26 August 2020.

[10] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 26 August 2020.

[11] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 26 August 2020.

[12] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 26 August.

[13] National Centre of Documentation and Scientific Research (CNDRS). 2018. Official site. [<http://www.cndrs-comores.org>]. Accessed 26 August 2020.

## Category 5: Commitments to improving national capacity, financing plans to address gaps, and adhering to global norms

### 5.1 INTERNATIONAL HEALTH REGULATIONS (IHR) REPORTING COMPLIANCE AND DISASTER RISK REDUCTION

#### 5.1.1 Official IHR reporting

##### 5.1.1a

Has the country submitted IHR reports to the WHO for the previous calendar year?

Yes = 1 , No = 0

Current Year Score: 1

2020

World Health Organization

#### 5.1.2 Integration of health into disaster risk reduction

##### 5.1.2a

Are epidemics and pandemics integrated into the national risk reduction strategy or is there a standalone national disaster risk reduction strategy for epidemics and pandemics?

Yes = 1 , No = 0

Current Year Score: 0

There is no evidence that epidemics or pandemics are integrated into Comoros' national disaster risk reduction (DRR) strategy and there is no standalone DRR strategy for these. Comoros approved a national DRR strategy in 2014, developed by the General Directorate of Civil Protection (GDPCP) with support from the United Nations Development Program (UNDP), but it does not address epidemics.[1,2] The GDPCP's website is not functioning and there is no evidence of a DRR strategy for epidemics from its Facebook page.[3,4] The 2018 JEE assessment did not mention a DRR plan for epidemics and stated that mapping of public health risks and resources needed to be carried out.[1] The government announced in September 2018 that a national action plan on health security had been approved, which would allow Comoros to reinforce its capacity to prepare and respond to epidemics.[5] The plan is not available online, and there is no evidence that it contains a DRR strategy. The main government website (which formerly hosted a page for the health ministry) is not functioning, and there is no relevant information on the health ministry's Facebook page.[6,7] There is no mention of a DRR plan in the current national health policy or plan.[8,9] No relevant information is available from the World Health Organization (WHO)'s repository of health policies or its news pages for Comoros; or from the UNDP's page related to DRR projects in Comoros.[10,11,12]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 27 August 2020.

- [2] Government of Comoros. March 2014. "Action plan for disaster risk reduction (DRR) in Comoros (Plan d'action pour la réduction des risques de catastrophes (RRC) en Union des Comores)".  
[[https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwi9oJ2g9LrrAhWcWhUIHQRWCmUQFjABegQlChAE&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FPlan%2520action%2520RRC%2520-%2520GRC-%2520Comores%252020140331.docxAMA.docx&usg=AOvVaw3O\\_l-GMYcSq4Ampa30oTC](https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwi9oJ2g9LrrAhWcWhUIHQRWCmUQFjABegQlChAE&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FPlan%2520action%2520RRC%2520-%2520GRC-%2520Comores%252020140331.docxAMA.docx&usg=AOvVaw3O_l-GMYcSq4Ampa30oTC)] Accessed 27 August 2020.
- [3] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 27 August 2020.
- [4] General Directorate of Civil Protection. Official Facebook page. [[https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page\\_internal](https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/?ref=page_internal)]. Accessed 27 August 2020.
- [5] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Preparing the country to face epidemics (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatwan.net/sante/validation-du-plan-d'action-national-de-sécurité-sanitaire-/préparer-le-pays-à-faire-face-aux-épidémies.html>]. Accessed 27 August 2020.
- [6] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 27 August 2020.
- [7] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 27 August 2020.
- [8] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."  
[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 27 August 2020.
- [9] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."  
[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 27 August 2020.
- [10] World Health Organization (WHO). "National health planning cycles: Comoros."  
[<https://extranet.who.int/countryplanningcycles/country/com>]. Accessed 27 August 2020.
- [11] World Health Organisation (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 27 August 2020.
- [12] United Nations Development Program (UNDP) Comoros. "Integration of disaster risk reduction in policies to reduce poverty in the Union of Comoros (Intégration de la réduction des risques des catastrophes dans les politiques en vue de réduire la pauvreté en Union des Comores)."  
[<https://www.km.undp.org/content/comoros/fr/home/projects/GRC-Comores.html>]. Accessed 27 August 2020.

## 5.2 CROSS-BORDER AGREEMENTS ON PUBLIC HEALTH AND ANIMAL HEALTH EMERGENCY RESPONSE

### 5.2.1 Cross-border agreements

#### 5.2.1a

Does the country have cross-border agreements, protocols, or MOUs with neighboring countries, or as part of a regional group, with regards to public health emergencies?

Yes = 2, Yes, but there is evidence of gaps in implementation = 1, No = 0

Current Year Score: 2

Comoros has an agreement with the Indian Ocean Commission member states to support each other during public health emergencies. Comoros is a member of the Indian Ocean Commission's SEGA One Health Network, a regional human and animal health surveillance and mutual support network, whose members have committed to deploy personnel to each other's countries in an epidemic.[1,2,3] The SEGA Network was mobilised during the 2020 Covid-19 pandemic. Support missions were deployed in February to Comoros and Madagascar, and a joint emergency response plan was developed, covering surveillance, awareness, prevention and response.[4] Funds were allocated to Comoros in order to put Covid-19 response measures and resources in place.[5]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 27 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 27 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 27 August 2020.

[4] Indian Ocean Commission. "Coronavirus: SEGA - One Health network on the ground (Coronavirus : le réseau SEGA - One Health sur le terrain)". [<https://www.commissionoceanindien.org/coronavirus-reseau-sega-one-health/>]. Accessed 27 August 2020.

[5] Comoros Ministry of Health. 25 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=866668407123509&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=866668407123509&id=320950001695355)]. Accessed 27 August 2020.

### 5.2.1b

**Does the country have cross-border agreements, protocols, or MOUs with neighboring countries, or as part of a regional group, with regards to animal health emergencies?**

Yes = 2, Yes, but there is evidence of gaps in implementation = 1, No = 0

**Current Year Score: 2**

Comoros has an agreement with the Indian Ocean Commission (IOC) member states to support each other during animal health emergencies. Comoros is a member of the Indian Ocean Commission's SEGA One Health Network, a regional human and animal health surveillance and mutual support network, whose members have committed to deploy personnel to each other's countries in an epidemic.[1,2,3] The SEGA Network was mobilised during the 2020 Covid-19 pandemic, with support missions and funds sent to Comoros in order to put response measures and resources in place.[4,5] There is no evidence of gaps in implementation with regard to animal health emergencies from the IOC website or a search for media and academic reports.[6] A May 2018 presentation by organizations involved in operating and funding the network showed that Comoros was actively participating in animal health surveillance and other collaboration through the SEGA Network.[7]

[1] World Health Organization (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 27 August 2020.

[2] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)". [<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 27 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 27 August 2020.

[4] Indian Ocean Commission. "Coronavirus: SEGA - One Health network on the ground (Coronavirus : le réseau SEGA - One Health sur le terrain)." [<https://www.commissionoceanindien.org/coronavirus-reseau-sega-one-health/>]. Accessed 27 August 2020.

[5] Comoros Ministry of Health. 25 February 2020. Facebook post. [[https://www.facebook.com/permalink.php?story\\_fbid=866668407123509&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=866668407123509&id=320950001695355)]. Accessed 27 August 2020.

[6] Indian Ocean Commission. Official website. [<https://www.commissionoceanindien.org/>]. Accessed 27 August 2020.

[7] Cardinale, E, Rasamoelina, H, Héraut JM, Gay, Cetre-Sossah, C, Collard, J and Flachet, L. May 2018. "The One Health Concept in the Indian Ocean: A concept in action! (Le Concept One Health dans l'Océan Indien: Un concept en action!)." [[https://www.researchgate.net/publication/341671068\\_Le\\_Concept\\_One\\_Health\\_dans\\_l'Ocean\\_Indien\\_Un\\_concept\\_en\\_action/link/5ece373b299bf1c67d204a98/download](https://www.researchgate.net/publication/341671068_Le_Concept_One_Health_dans_l'Ocean_Indien_Un_concept_en_action/link/5ece373b299bf1c67d204a98/download)]. Accessed 27 August 2020.

## 5.3 INTERNATIONAL COMMITMENTS

### 5.3.1 Participation in international agreements

#### 5.3.1a

**Does the county have signatory and ratification (or same legal effect) status to the Biological Weapons Convention?**

Signed and ratified (or action having the same legal effect) = 2, Signed = 1, Non-compliant or not a member = 0

**Current Year Score: 0**

2021

Biological Weapons Convention

#### 5.3.1b

**Has the country submitted confidence building measures for the Biological Weapons Convention in the past three years?**

Yes = 1, No = 0

**Current Year Score: 0**

2021

Biological Weapons Convention

#### 5.3.1c

**Has the state provided the required United Nations Security Council Resolution (UNSCR) 1540 report to the Security Council Committee established pursuant to resolution 1540 (1540 Committee)?**

Yes = 1, No = 0

**Current Year Score: 1**

2021

Biological Weapons Convention



### 5.3.1d

Extent of United Nations Security Council Resolution (UNSCR) 1540 implementation related to legal frameworks and enforcement for countering biological weapons:

Very good (60+ points) = 4, Good (45–59 points) = 3, Moderate (30–44 points) = 2, Weak (15–29 points) = 1, Very weak (0–14 points) or no matrix exists/country is not party to the BWC = 0

Current Year Score: 0

2021

Biological Weapons Convention

## 5.3.2 Voluntary memberships

### 5.3.2a

Does the country meet at least 2 of the following criteria?

- Membership in Global Health Security Agenda (GHSA)
- Membership in the Alliance for Country Assessments for Global Health Security and IHR Implementation (JEE Alliance)
- Membership in the Global Partnership Against the Spread of Weapons and Materials of Mass Destruction (GP)
- Membership in the Australia Group (AG)
- Membership in the Proliferation Security Initiative (PSI)

Needs to meet at least two of the criteria to be scored a 1 on this measure. , Yes for five = 1 , Yes for four = 1 , Yes for three = 1 , Yes for two = 1 , Yes for one = 0 , No for all = 0

Current Year Score: 0

2021

Global Health Security Agenda; JE Alliance; Global Partnership; Australia Group; PSI

## 5.4 JOINT EXTERNAL EVALUATION (JEE) AND PERFORMANCE OF VETERINARY SERVICES PATHWAY (PVS)

### 5.4.1 Completion and publication of a Joint External Evaluation (JEE) assessment and gap analysis

#### 5.4.1a

Has the country completed a Joint External Evaluation (JEE) or precursor external evaluation (e.g., GHSA pilot external assessment) and published a full public report in the last five years?

Yes = 1 , No = 0

Current Year Score: 1

2021

WHO Strategic Partnership for IHR and Health Security (SPH); Global Health Security Agenda

### 5.4.1b

Has the country completed and published, within the last five years, either a National Action Plan for Health Security (NAPHS) to address gaps identified through the Joint External Evaluation (JEE) assessment or a national GHSA roadmap that sets milestones for achieving each of the GHSA targets?

Yes = 1, No = 0

Current Year Score: 0

2021

WHO Strategic Partnership for IHR and Health Security (SPH); Global Health Security Agenda

## 5.4.2 Completion and publication of a Performance of Veterinary Services (PVS) assessment and gap analysis

### 5.4.2a

Has the country completed and published a Performance of Veterinary Services (PVS) assessment in the last five years?

Yes = 1, No = 0

Current Year Score: 0

2021

OIE PVS assessments

### 5.4.2b

Has the country completed and published a Performance of Veterinary Services (PVS) gap analysis in the last five years?

Yes = 1, No = 0

Current Year Score: 0

2021

OIE PVS assessments

## 5.5 FINANCING

### 5.5.1 National financing for epidemic preparedness

#### 5.5.1a

Is there evidence that the country has allocated national funds to improve capacity to address epidemic threats within the past three years?

Yes = 1, No = 0

Current Year Score: 0

There is no evidence that Comoros has allocated national funds to improve capacity to address epidemic threats within the past three years. The government approved a National Action Plan on Health Security, addressing epidemic response, in

September 2018.[1] There is no evidence from the media or the health ministry's Facebook page that funds have been committed for implementing the plan.[1,2] The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning, and the agriculture ministry currently has no online presence.[3] The World Health Organization (WHO) assists Comoros with epidemic prevention and response. There is no evidence from reporting by the WHO in Comoros of national funds dedicated to strengthening the country's capacity to address epidemic threats.[4] There have been no announcements of relevant funds from the president's office in the past three years.[5] Comoros' budget laws for each year are published on the Droit Afrique legal database. In the past three years, the budget allocation for health was not broken down to show spending on health security capacity-building.[6]

[1] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Préparer le pays à faire face aux épidémies (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [https://alwatwan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html]. Accessed 27 August 2020.

[2] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355]. Accessed 27 August 2020.

[3] Government of Comoros. Official website. [https://www.gouvernement.km/]. Accessed 27 August 2020.

[4] World Health Organization (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 27 August 2020.

[5] Comoros Presidency of the Republic. "News." [https://beit-salam.km/actualités/]. Accessed 27 August 2020.

[6] Droit Afrique. "Comoros - Documents: Fiscal, customs (Comores - Documentation: Fiscal, douanes)." [https://www.droit-afrique.com/pays/comores/]. Accessed 27 August 2020.

## 5.5.2 Financing under Joint External Evaluation (JEE) and Performance of Veterinary Services (PVS) reports and gap analyses

### 5.5.2a

**Does the Joint External Evaluation (JEE) report, National Action Plan for Health Security (NAPHS), and/or national GHSA roadmap allocate or describe specific funding from the national budget (covering a time-period either in the future or within the past five years) to address the identified gaps?**

Yes = 1 , No/country has not conducted a JEE = 0

**Current Year Score: 0**

2021

WHO Strategic Partnership for IHR and Health Security (SPH); Global Health Security Agenda

### 5.5.2b

**Does the Performance of Veterinary Services (PVS) gap analysis and/or PVS assessment allocate or describe specific funding from the national budget (covering a time-period either in the future or within the past five years) to address the identified gaps?**

Yes = 1 , No/country has not conducted a PVS = 0

**Current Year Score: 0**

2021

OIE PVS assessments

## 5.5.3 Financing for emergency response

### 5.5.3a

Is there a publicly identified special emergency public financing mechanism and funds which the country can access in the face of a public health emergency (such as through a dedicated national reserve fund, an established agreement with the World Bank pandemic financing facility/other multilateral emergency funding mechanism, or other pathway identified through a public health or state of emergency act)?

Yes = 1 , No = 0

**Current Year Score: 1**

Comoros is eligible for the World Bank pandemic financing facility. Comoros is on the list of countries eligible for International Development Association (IDA) funding, and is therefore eligible for the World Bank's Pandemic Emergency Financing Facility.[1] This provides surge financing to low-income countries affected by a large-scale disease outbreak to prevent it from reaching pandemic proportions.[2] There is no evidence of other sources of emergency funding from the latest national health policy or plan produced by the health ministry, or from the 2014 National Disaster Risk Reduction Strategy, or the National Contingency Plan 2017-18, produced by the General Directorate for Civil Protection (GDCP).[3,4,5,6] Neither the main government website (which formerly hosted a page for the health ministry) nor the website of the GDCP is functioning, and there is no information regarding another emergency financing mechanism or fund on the Facebook pages of the health ministry or GDCP.[7,8,9,10] During the 2020 Covid-19 outbreak, emergency assistance came from the World Health Organization, the Indian Ocean Commission's SEGA One Health Network, the International Monetary Fund's Rapid Credit Facility, and philanthropic donors.[11,12,13,14]

[1] International Development Association (IDA). "Borrowing countries." [<http://ida.worldbank.org/about/borrowing-countries>]. Accessed 27 August 2020.

[2] World Bank. "Pandemic Emergency Financing Facility." [<http://pubdocs.worldbank.org/en/119961516647620597/PEF-Operational-Brief-Dec-2017.pdf>]. Accessed 27 August 2020.

[3] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "National health policy 2015-2024 (Politique nationale de santé 2015-2024)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/planning\\_cycle\\_repository/comoros/comoros\\_-\\_pns\\_2015-2024\\_version\\_adoptee\\_cns.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/planning_cycle_repository/comoros/comoros_-_pns_2015-2024_version_adoptee_cns.pdf)]. Accessed 27 August 2020.

[4] Comoros Ministry of Health, Solidarity, Social Cohesion and Gender. 2014. "Complete multi-annual plan 2014-2019, revised version (Plan pluriannuel complet 2014-2019, version révisée)."

[[https://extranet.who.int/countryplanningcycles/sites/default/files/country\\_docs/Comoros/cmyp\\_2014\\_-\\_2019\\_-\\_comores\\_1.pdf](https://extranet.who.int/countryplanningcycles/sites/default/files/country_docs/Comoros/cmyp_2014_-_2019_-_comores_1.pdf)]. Accessed 27 August 2020.

[5] Government of Comoros. March 2014. "Action plan for disaster risk reduction (DRR) in Comoros (Plan d'action pour la réduction des risques de catastrophes (RRC) en Union des Comores)".

[[https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwi9oJ2g9LrrAhWcWhUIHQrWCmUQFjABegQIChAE&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FPlan%2520action%2520RRC%2520-%2520GRC-%2520Comores%252020140331.docxAMA.docx&usg=AOvVaw3O\\_l-IGMYcSq4Ampa3OoTC](https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwi9oJ2g9LrrAhWcWhUIHQrWCmUQFjABegQIChAE&url=https%3A%2F%2Finfo.undp.org%2Fdocs%2Fpdc%2FDocuments%2FCOM%2FPlan%2520action%2520RRC%2520-%2520GRC-%2520Comores%252020140331.docxAMA.docx&usg=AOvVaw3O_l-IGMYcSq4Ampa3OoTC)] Accessed 27 August 2020.

[6] General Directorate of Civil Protection. February 2017. "National Contingency Plan 2017-18 (Plan National de Contingence 2017-18)." [[https://documentspublics.org/wp-content/uploads/2019/07/SR\\_Plan-National-de-Contingence\\_Comores-2017-2018.pdf](https://documentspublics.org/wp-content/uploads/2019/07/SR_Plan-National-de-Contingence_Comores-2017-2018.pdf)]. Accessed 27 August 2020.

[7] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 27 August 2020.

[8] General Directorate of Civil Protection. Official website. [<http://securitecivile-comores.org/index.php>]. Accessed 27 August 2020.

[9] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 27 August 2020.

[10] General Directorate of Civil Protection. Official Facebook page. [<https://www.facebook.com/Direction-Générale-de-la-Sécurité-Civile-Comores-102997257812263/>]. Accessed 27 August 2020.

[11] Comoros Ministry of Health. 20 February 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=863454010778282&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=863454010778282&id=320950001695355)]. Accessed 27 August 2020.

[12] Comoros Ministry of Health. 25 February 2020. Facebook post.

[[https://www.facebook.com/permalink.php?story\\_fbid=866668407123509&id=320950001695355](https://www.facebook.com/permalink.php?story_fbid=866668407123509&id=320950001695355)]. Accessed 27 August 2020.

[13] Stop Coronavirus. "Archives." [<https://stopcoronavirus.km/archives/>]. Accessed 27 August 2020.

## 5.5.4 Accountability for commitments made at the international stage for addressing epidemic threats

### 5.5.4a

Is there evidence that senior leaders (president or ministers), in the past three years, have made a public commitment either to:

- Support other countries to improve capacity to address epidemic threats by providing financing or support?
- Improve the country's domestic capacity to address epidemic threats by expanding financing or requesting support to improve capacity?

Needs to meet at least one of the criteria to be scored a 1 on this measure., Yes for both = 1, Yes for one = 1, No for both = 0

**Current Year Score: 0**

There is no evidence that in the past three years, senior leaders in Comoros have made a public commitment either to support other countries to improve capacity to address epidemic threats by providing financing or support; or to improve its own domestic capacity to address epidemic threats by expanding financing or requesting support to improve capacity. The main government website (which formerly hosted a page for the health ministry) is not functioning, and no relevant evidence is available from the health ministry's Facebook page.[1] No relevant news or press releases are available from the website of the president's office, the World Health Organization (WHO) in Comoros, the United Nations Development Program (UNDP) in Comoros, or a wider search for media articles.[2,3,4]

[1] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355>]. Accessed 27 August 2020.

[2] Government of Comoros. "News from the president (Actualité du président)."

[<https://www.gouvernement.km/actualit%C3%A9-du-pr%C3%A9sident/>]. Accessed 27 August 2020.

[3] World Health Organization (WHO) Comoros. "Comoros News." [<https://www.afro.who.int/fr/countries/903/news>]. Accessed 27 August 2020.

[4] United Nations Development Program (UNDP) Comoros. "Comoros: Press centre (Comores: Centre de presse)."

[<https://www.km.undp.org/content/comoros/fr/home/presscenter.html>]. Accessed 27 August 2020.

### 5.5.4b

Is there evidence that the country has, in the past three years, either:

- Provided other countries with financing or technical support to improve capacity to address epidemic threats?
- Requested financing or technical support from donors to improve the country's domestic capacity to address epidemic threats?

Needs to meet at least one of the criteria to be scored a 1 on this measure., Yes for both = 1, Yes for one = 1, No for both = 0

**Current Year Score: 1**

There is evidence that in the past three years, Comoros has received financing and technical support from donors to improve its own domestic capacity to address epidemic threats (though there is no evidence of public statements requesting this); but not that it has provided financing or technical support to help other countries to improve their capacity. According to the Georgetown Global Health Security Tracking dashboard, from 2018-2020 inclusive, US\$77.83m was committed to Comoros by other countries/organisations, of which US\$31.7m was disbursed. The largest share of funding from 2014-2020 went to building real-time surveillance systems.[1] The government of Comoros approved a National Action Plan on Health Security in September 2018. The World Health Organization (WHO) provided support in developing this plan.[2] Comoros has not committed any funds to other countries in the past three years.[3]

[1] Talus Analytics and the Georgetown University Center for Global Health Science and Security. Global Health Security Tracking: Comoros recipient profile. [<https://tracking.ghscosting.org/details/52/recipient>]. Accessed 27 August 2020.

[2] Abdallah, A. 5 Sep 2018. "Approval of national action plan on health security / Préparer le pays à faire face aux épidémies (Validation du Plan d'action national de sécurité sanitaire / Préparer le pays à faire face aux épidémies)". Al-Watwan. [<https://alwatan.net/sante/validation-du-plan-d'action-national-de-securite-sanitaire/-preparer-le-pays-a-faire-face-aux-epidemies.html>]. Accessed 27 August 2020.

[3] Talus Analytics and the Georgetown University Center for Global Health Science and Security. Global Health Security Tracking: Comoros funder profile. [<https://tracking.ghscosting.org/details/52/funder>]. Accessed 27 August 2020.

### 5.5.4c

Is there evidence that the country has fulfilled its full contribution to the WHO within the past two years?

Yes = 1, No = 0

**Current Year Score: 0**

2021

Economist Impact analyst qualitative assessment based on official national sources, which vary by country

## 5.6 COMMITMENT TO SHARING OF GENETIC AND BIOLOGICAL DATA AND SPECIMENS

### 5.6.1 Commitment to sharing genetic data, clinical specimens, and/or isolated specimens (biological materials) in both emergency and nonemergency research

#### 5.6.1a

Is there a publicly available plan or policy for sharing genetic data, clinical specimens, and/or isolated specimens (biological materials) along with the associated epidemiological data with international organizations and/or other countries that goes beyond influenza?

Yes = 1, No = 0

Current Year Score: 0

There is no evidence that Comoros has a plan or policy to share genetic data, epidemiological data, clinical specimens, and/or isolated specimens (biological materials) with international organizations and/or other countries that goes beyond influenza. Comoros has committed to share weekly surveillance data and outbreak alerts with other countries in the Indian Ocean sub-region through the Indian Ocean Commission's SEGA One Health Network. There is no evidence from the 2018 JEE assessment, or from the Indian Ocean Commission, that this network shares other forms of epidemiological data or specimens.[1,2,3] There is no evidence of other relevant plans or policies. The main government website (which formerly hosted pages for the health and agriculture ministries) is not functioning.[4] There is no relevant evidence on the Facebook page of the health ministry, and the agriculture ministry currently has no online presence.[5] No additional information is available from a wider search for media and academic articles.

[1] Indian Ocean Commission. 2016. "The SEGA One Health Network (Le réseau SEGA One Health)."

[<http://téréproduction.com/wp-content/uploads/2016/11/BROCHURE-SEGA-V-FRA-2.pdf>]. Accessed 28 August 2020.

[2] World Health Organisation (WHO). 2018. "Joint external evaluation of IHR core capacities of Comoros: Mission report 20-25 August 2017 (Evaluation externe conjointe des principales capacité RSI de l'Union des Comores: Rapport de mission 20-25 Août 2017)". [<http://apps.who.int/iris/bitstream/handle/10665/260523/WHO-WHE-CPI-REP-2018.6-fre.pdf?sequence=1>]. Accessed 28 August 2020.

[3] Indian Ocean Commission. "RSIE 3." [<https://www.commissionoceanindien.org/portfolio-items/sega-onehealth/>]. Accessed 28 August 2020.

[4] Government of Comoros. Official website. [<https://www.gouvernement.km/>]. Accessed 28 August 2020.

[5] Comoros Ministry of Health. Official Facebook page. [<https://www.facebook.com/Ministère-de-la-Santé-Union-des-Comores-320950001695355>]. Accessed 28 August 2020.

#### 5.6.1b

Is there public evidence that the country has not shared samples in accordance with the Pandemic Influenza Preparedness (PIP) framework in the past two years?

Yes = 0, No = 1

Current Year Score: 1

There is no public evidence that Comoros has not shared samples in accordance with the PIP framework in the past year. There is no evidence via the World Health Organisation (WHO) or a wider search for media reports of any non-compliance in

the past year by Comoros. [1,2]

[1] World Health Organization. "News releases." [https://www.who.int/news-room/releases]. Accessed 28 August 2020.

[2] World Health Organization (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 28 August 2020.

### 5.6.1c

**Is there public evidence that the country has not shared pandemic pathogen samples during an outbreak in the past two years?**

Yes = 0, No = 1

**Current Year Score: 1**

There is no public evidence that the country has not shared pandemic pathogen samples during an outbreak in the past two years, including during the Covid-19 pandemic. Comoros had its first confirmed case of Covid-19 in late April 2020. The World Health Organization (WHO) was closely involved throughout the country's preparation and response to the Covid-19 pandemic, providing support for surveillance and testing.[1,2,3,4] There is no evidence from WHO news releases, or from a wider search for media reports, to suggest that Comoros has failed to share a sample of Covid-19 or any other pandemic pathogen during an outbreak in the past two years.[4,5]

[1] Comoros Ministry of Health. Official Facebook page. [https://www.facebook.com/Minist%C3%A8re-de-la-Sant%C3%A9-Union-des-Comores-320950001695355]. Accessed 28 August 2020.

[2] Comoros Coordination Against Covid-19. Official Facebook page. [https://www.facebook.com/Coordination-Comores-Contre-Covid-19-111330413896638/?ref=page\_internal]. Accessed 28 August 2020.

[3] Government of Comoros. Stop Coronavirus: Official website. [https://stopcoronavirus.km/]. Accessed 28 August 2020.

[4] World Health Organization (WHO) Comoros. "Comoros News." [https://www.afro.who.int/fr/countries/903/news]. Accessed 28 August 2020.

[5] World Health Organization. "News releases." [https://www.who.int/news-room/releases]. Accessed 28 August 2020.

## Category 6: Overall risk environment and vulnerability to biological threats

### 6.1 POLITICAL AND SECURITY RISK

#### 6.1.1 Government effectiveness

##### 6.1.1a

Policy formation (Economist Intelligence score; 0-4, where 4=best)

Input number

**Current Year Score: 0**

2020



Economist Intelligence

**6.1.1b**

Quality of bureaucracy (Economist Intelligence score; 0-4, where 4=best)

Input number

Current Year Score: 0

2020

Economist Intelligence

**6.1.1c**

Excessive bureaucracy/red tape (Economist Intelligence score; 0-4, where 4=best)

Input number

Current Year Score: 0

2020

Economist Intelligence

**6.1.1d**

Vested interests/cronyism (Economist Intelligence score; 0-4, where 4=best)

Input number

Current Year Score: 0

2020

Economist Intelligence

**6.1.1e**

Country score on Corruption Perception Index (0-100, where 100=best)

Input number

Current Year Score: 21

2020

Transparency International

**6.1.1f**

Accountability of public officials (Economist Intelligence score; 0-4, where 4=best)

Input number

**Current Year Score: 0**

2020

Economist Intelligence

### **6.1.1g**

**Human rights risk (Economist Intelligence score; 0-4, where 4=best)**

Input number

**Current Year Score: 0**

2020

Economist Intelligence

## **6.1.2 Orderly transfers of power**

### **6.1.2a**

**How clear, established, and accepted are constitutional mechanisms for the orderly transfer of power from one government to another?**

Very clear, established and accepted = 4, Clear, established and accepted = 3, One of the three criteria (clear, established, accepted) is missing = 2, Two of the three criteria (clear, established, accepted) are missing = 1, Not clear, not established, not accepted = 0

**Current Year Score: 2**

2021

Economist Intelligence

## **6.1.3 Risk of social unrest**

### **6.1.3a**

**What is the risk of disruptive social unrest?**

Very low: Social unrest is very unlikely = 4, Low: There is some prospect of social unrest, but disruption would be very limited = 3, Moderate: There is a considerable chance of social unrest, but disruption would be limited = 2, High: Major social unrest is likely, and would cause considerable disruption = 1, Very high: Large-scale social unrest on such a level as to seriously challenge government control of the country is very likely = 0

**Current Year Score: 0**

2021

Economist Intelligence

## 6.1.4 Illicit activities by non-state actors

### 6.1.4a

How likely is it that domestic or foreign terrorists will attack with a frequency or severity that causes substantial disruption?

No threat = 4, Low threat = 3, Moderate threat = 2, High threat = 1, Very high threat = 0

Current Year Score: 4

2021

Economist Intelligence

### 6.1.4b

What is the level of illicit arms flows within the country?

4 = Very high, 3 = High, 2 = Moderate, 1 = Low, 0 = Very low

Current Year Score: 3

2020

UN Office of Drugs and Crime (UNODC)

### 6.1.4c

How high is the risk of organized criminal activity to the government or businesses in the country?

Very low = 4, Low = 3, Moderate = 2, High = 1, Very high = 0

Current Year Score: 0

2021

Economist Intelligence

## 6.1.5 Armed conflict

### 6.1.5a

Is this country presently subject to an armed conflict, or is there at least a moderate risk of such conflict in the future?

No armed conflict exists = 4, Yes; sporadic conflict = 3, Yes; incursional conflict = 2, Yes, low-level insurgency = 1, Yes; territorial conflict = 0

Current Year Score: 3

2021

Economist Intelligence

## 6.1.6 Government territorial control

### 6.1.6a

Does the government's authority extend over the full territory of the country?

Yes = 1, No = 0

Current Year Score: 1

2021

Economist Intelligence

## 6.1.7 International tensions

### 6.1.7a

Is there a threat that international disputes/tensions could have a negative effect?

No threat = 4, Low threat = 3, Moderate threat = 2, High threat = 1, Very high threat = 0

Current Year Score: 3

2021

Economist Intelligence

## 6.2 SOCIO-ECONOMIC RESILIENCE

### 6.2.1 Literacy

#### 6.2.1a

Adult literacy rate, population 15+ years, both sexes (%)

Input number

Current Year Score: 58.82

2018

United Nations Development Programme (UNDP); United Nations Educational, Scientific and Cultural Organization (UNESCO);  
The Economist Intelligence Unit

### 6.2.2 Gender equality

#### 6.2.2a

United Nations Development Programme (UNDP) Gender Inequality Index score

Input number

Current Year Score: 0.41

2018

United Nations Development Programme (UNDP); The Economist Intelligence Unit

## 6.2.3 Social inclusion

### 6.2.3a

#### Poverty headcount ratio at \$1.90 a day (2011 PPP) (% of population)

Input number

**Current Year Score: 6.8**

2014

World Bank; Economist Impact

### 6.2.3b

#### Share of employment in the informal sector

Greater than 50% = 2, Between 25-50% = 1, Less than 25% = 0

**Current Year Score: 2**

A clear majority of employment in Comoros is in the informal sector. According to a 2018 study by the International Labour Office (ILO), the share of informal labour in total employment was 89.2%. This was based on a 2004 survey.[1] A 2017 World Bank study found that while the share of waged workers in Comoros had increased from 2004-2014 to 29.2%, even waged employment was almost entirely informal in nature. Looking at employers rather than employees, the informal sector accounted for 73% of all Comoros' units of production, with the formal sector accounting for just 21% (the remainder comprised household units). [2] A May 2020 report by the United Nations Development Program (UNDP) cited data from Comoros' official statistics agency (no date given), stating that informal production units accounted for 79.2% of employment.[3]

[1] International Labour Office (ILO). 2018. Women and Men in the Informal Economy: A Statistical Picture (Third Edition). [[https://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/documents/publication/wcms\\_626831.pdf](https://www.ilo.org/wcmsp5/groups/public/---dgreports/---dcomm/documents/publication/wcms_626831.pdf)]. Accessed 28 August 2020.

[2] World Bank. April 2017. "Comoros Poverty Assessment." [<http://documents1.worldbank.org/curated/en/342321528113131924/pdf/125069-WP-P156542-OUO-9-Comoros-Poverty-Assessment-revised.pdf>]. Accessed 28 August 2020.

[3] United Nations Development Program (UNDP). 29 May 2020. "Note on the implications of the COVID-19 pandemic on the economic and social development of the Union of the Comoros (Note sur les implications de la pandémie COVID-19 sur le développement économique et social de l'Union des Comores)."

[[https://www.km.undp.org/content/dam/comoros/docs/Library/UNDP-KM-Note\\_impacts%20socioeconomiques-COVID19.pdf](https://www.km.undp.org/content/dam/comoros/docs/Library/UNDP-KM-Note_impacts%20socioeconomiques-COVID19.pdf)]. Accessed 28 August 2020.

### 6.2.3c

#### Coverage of social insurance programs (% of population)

Scored in quartiles (0-3, where 3=best)

**Current Year Score: 0**

2016, or latest available

World Bank; Economist Impact calculations

## 6.2.4 Public confidence in government

### 6.2.4a

Level of confidence in public institutions

Input number

Current Year Score: 1

2021

Economist Intelligence Democracy Index

## 6.2.5 Local media and reporting

### 6.2.5a

Is media coverage robust? Is there open and free discussion of public issues, with a reasonable diversity of opinions?

Input number

Current Year Score: 1

2021

Economist Intelligence Democracy Index

## 6.2.6 Inequality

### 6.2.6a

Gini coefficient

Scored 0-1, where 0=best

Current Year Score: 0.45

Latest available.

World Bank; Economist Impact calculations

## 6.3 INFRASTRUCTURE ADEQUACY

### 6.3.1 Adequacy of road network

#### 6.3.1a

What is the risk that the road network will prove inadequate to meet needs?

Very low = 4, Low = 3, Moderate = 2, High = 1, Very high = 0

Current Year Score: 0

2021

Economist Intelligence

### 6.3.2 Adequacy of airports

#### 6.3.2a

What is the risk that air transport will prove inadequate to meet needs?

Very low = 4, Low = 3, Moderate = 2, High = 1, Very high = 0

Current Year Score: 1

2021

Economist Intelligence

### 6.3.3 Adequacy of power network

#### 6.3.3a

What is the risk that power shortages could be disruptive?

Very low = 4, Low = 3, Moderate = 2, High = 1, Very high = 0

Current Year Score: 0

2021

Economist Intelligence

## 6.4 ENVIRONMENTAL RISKS

### 6.4.1 Urbanization

#### 6.4.1a

Urban population (% of total population)

Input number

Current Year Score: 29.16

2019

World Bank

## 6.4.2 Land use

### 6.4.2a

Percentage point change in forest area between 2006–2016

Input number

Current Year Score: -2.35

2008-2018

World Bank; Economist Impact

## 6.4.3 Natural disaster risk

### 6.4.3a

What is the risk that the economy will suffer a major disruption owing to a natural disaster?

Very low = 4, Low = 3, Moderate = 2, High = 1, Very high = 0

Current Year Score: 1

2021

Economist Intelligence

## 6.5 PUBLIC HEALTH VULNERABILITIES

### 6.5.1 Access to quality healthcare

#### 6.5.1a

Total life expectancy (years)

Input number

Current Year Score: 64.12

2018

United Nations; World Bank, UNICEF; Institute for Health Metrics and Evaluation (IHME); Central Intelligence Agency (CIA)  
World Factbook

#### 6.5.1b

Age-standardized NCD mortality rate (per 100 000 population)

Input number

Current Year Score: 577.9

2019

WHO



### 6.5.1c

Population ages 65 and above (% of total population)

Input number

Current Year Score: 3.06

2019

World Bank

### 6.5.1d

Prevalence of current tobacco use (% of adults)

Input number

Current Year Score: 19.5

2018

World Bank

### 6.5.1e

Prevalence of obesity among adults

Input number

Current Year Score: 7.8

2016

WHO

## 6.5.2 Access to potable water and sanitation

### 6.5.2a

Percentage of homes with access to at least basic water infrastructure

Input number

Current Year Score: 80.17

2017

UNICEF; Economist Impact

### 6.5.2b

Percentage of homes with access to at least basic sanitation facilities

Input number

Current Year Score: 35.86

2017

UNICEF; Economist Impact

### 6.5.3 Public healthcare spending levels per capita

#### 6.5.3a

Domestic general government health expenditure per capita, PPP (current international \$)

Input number

**Current Year Score: 12.43**

2018

WHO Global Health Expenditure database

### 6.5.4 Trust in medical and health advice

#### 6.5.4a

Trust medical and health advice from the government

Share of population that trust medical and health advice from the government , More than 80% = 2, Between 60-80%, or no data available = 1, Less than 60% = 0

**Current Year Score: 0**

2018

Wellcome Trust Global Monitor 2018

#### 6.5.4b

Trust medical and health advice from medical workers

Share of population that trust medical and health advice from health professionals , More than 80% = 2, Between 60-80%, or no data available = 1, Less than 60% = 0

**Current Year Score: 1**

2018

Wellcome Trust Global Monitor 2018