ACRONYMS

AFP Acute Flaccid Paralysis
AFRO WHO Regional Office for Africa
CCS Country Cooperation Strategy
CHW Community Health Worker
EPI Expanded Programme on Immunization
EU European Union
FDA Food and Drugs Authority
GF Global Fund
GPW 13 Global Programme of Work 13
HiAP Health in All Policies
IDSR Integrated Disease Surveillance and Response
IHR International Health Regulations
JEE Joint External Evaluation
MoH Ministry of Health
RMNCAH Reproductive, Maternal, Newborn, Child and Adolescent Health
NAPHS National Action Plan for Health Security
NCDs Non-communicable diseases
NFM New Funding Mechanisms
OPV Oral polio vaccine
PMTCT Prevention of mother-to-child transmission
TB Tuberculosis
U5MR Under-5 Mortality Rate
UHC Universal Health Coverage
UN United Nations
UNICEF United Nations Children’s Fund
WCO WHO Country Office
WHO World Health Organization
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Foreword

The focus of the World Health Organization (WHO’s) support during the year under review was on priority areas for both Government and WHO including: addressing public health emergencies especially the COVID-19 pandemic and cVDPV outbreak response, improved access to quality essential health services, attainment of Universal Health Coverage (UHC) through strengthening of health systems and Primary Health Care, and promoting healthier populations through multisector actions and approaches.

In the reporting year the COVID-19 Pandemic had already hit the world and Ghana was in preparedness mode. WHO assumed the leadership role in supporting Ghana’s preparedness and response efforts, and in March 2020 when Ghana recorded its first cases, WHO played a critical role in rallying the UN in Ghana as well as Health Partners to support the Government’s Response.

Even though the temporary lockdown and public health measures put in place by Government may have resulted in delays in carrying out some priority actions, significant achievements registered by WCO in support of the country’s efforts included the continuous provision of essential services including sexual and reproductive, maternal, neonatal, child and adolescent health (SRMNCAH) and priority interventions amidst COVID, increased and sustained routine vaccination coverage, strengthened country capacity to prevent, detect and respond to public health emergencies, strengthening national capacity and coordination mechanisms in the area of HIV/AIDS, Malaria, TB, non-communicable diseases, NTDs and Mental Health.

It is worth noting that the Country Office played an important role in strengthening national, regional and district health systems and services through people-centered service delivery approaches in line with the implementation of the Primary Health Care (PHC) principles.

Like preceding years, the office continued to play an active role in existing partnerships and coordination mechanisms including Development Partners (DPs) Group, UN Sustainable Development Partnership (UNSDP) Thematic Working Groups, and the Health Sector Working Group among others.
The country office owes a debt of gratitude to office of the Regional Director for Africa, AFRO including IST and HQ for the support during the year. The office owes same gratitude to the Ministry of Health, the Ghana Health Service, Development Partners and other stakeholders for the collaboration and teamwork during the year 2020.

I would also want to seize the opportunity to thank all WHO staff who dedicated their expertise and time to support their counterparts and closely worked with health development partners for better alignment and harmonization of programmes to the benefit of the Ghanaian people. The country office will continue to work with the same team spirit and enthusiasm in the year 2021 and beyond.

Dr. Francis Kasolo
WHO Country Representative for Ghana
Executive Summary

As is the tradition, the WHO country office for Ghana, usually begins every year with a staff retreat to plan and priorities and strategies to strengthen WHO’s contribution to the national health agenda during the year. Albeit the COVID-19 pandemic situation and inability to organize a face-to-face retreat, the planning processes was done by clusters.

Working in collaboration with the Ministry of Health/Ghana Health Service and other allied health institutions and stakeholders, the WHO country office, provided support aimed at achieving its mission which is attaining the highest level of health by the people in the country though its six operational areas which are (i) Communicable Diseases (ii) Non-Communicable Diseases, (iii) Promoting Health through the Life Course (iv), Health Systems, (v) Preparedness, Surveillance and Response (vi) Corporate services and enabling functions.

In addition to the financial support, technical assistance was also provided to build capacity and strengthen health governance structures at all levels. The following are some of the achievements from the support provided:

- Strengthened key coordination functions of the National Public Health Emergency Operation Centre and the National Technical Coordinating Committee (NTCC) and for all the pillars of response (Surveillance, Case Management, Infection Prevention and Control (IPC), Laboratory, Points of Entry (POEs) Risk Communication
- Capacity strengthening for case management and Surveillance for COVID response
- Procured and donated equipment, PPEs, laboratory reagents and swabs to the Ministry of Health/Ghana Health Service to support COVID-19 pandemic response
- Actions towards continuation of essential health service provision in the face of COVID-19
- Country Coordinating Mechanism efforts to develop and submit Grant Applications for Global Fund for effective HIV, TB and Malaria control interventions
- Development of the Polio Transition Plan and successful response for the recent polio outbreak and response to contain various epidemics in the country in record time
- Implementation of the UK- Foreign, Commonwealth and Development Office (FCDO) funded mental health project in-country
• Strengthening Climate Change and Health interventions, the One Health approach to addressing critical health issues including, Anti-Microbial Resistance and addressing public health emergencies

• Advocate for and promote actions towards Universal Health Coverage and Ghana’s attainment of SDG 3 and other Health Related SDGs.

• Commemoration of key official health-days to create more awareness on health living and lifestyle.

• Development, launch and dissemination of the National Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAH&N) Strategic Plan

• Capacity building for stakeholders in National Health Account for Universal Health Coverage (UHC)

• Improving the Quality of Care for Maternal, Newborn and Child Health
SIGNIFICANT ACHIEVEMENTS BY CATEGORY OF WORK

1.0 COMMUNICABLE DISEASES

1.1 Malaria

Malaria is endemic and perennial in all parts of the country, with varying transmission intensity and seasonal variations that are more pronounced in the northern part of the country. Malaria affects persons of all ages although children under age five and pregnant women are more affected. The burden of malaria though reducing over time, still affects every aspect of the health, social and economic life of the people. The parasite Plasmodium falciparum still accounts for over 90% of the malaria illness in the country with the principal vectors (mosquitoes) being Anopheles gambiae and Anopheles funestus.

Malaria Indicator Surveys conducted over time have shown that, Parasite prevalence has reduced from 27.5% (MICS, 2011) to 14% (MIS, 2019). Confirmed malaria cases per 1000 population on reduced from 192 in 2019 to 1590 per 1000 in 2020, while malaria test positivity rate increase from 22.4% in 2019 to 30.9% in 2020. Unfortunately, Ghana is one of the top ten high malaria burdened countries which together with India account for more than 70% of the global burden. The country is therefore pursuing the High Burden to High Impact approach which was introduced in 2018 and which seeks to accelerate the key interventions such as promotion of the use of Insecticide treated nets, access of quality antimalarial medicines, indoor residual spraying and seasonal malaria chemoprevention for children under five years in seasonal transmission zones.

Key Activities, Outcomes and Achievements

1.1.1 Continuity of services during covid-19 pandemic

During the Covid-19 pandemic, there were mitigation and containment measures including physical distancing, restriction of movements and other infection prevention protocols observed in accordance with the national guidelines. Focus was on protecting providers of malaria treatment and prevention services including the other interventions such as indoor spraying in the context of Covid-19 through capacity building in infection prevention and control and making available essential PPEs. Again, it was ensured that all activities including training and supervision were carried out in the context of Covid-19 protocols.
calls and virtual meetings were used mostly to minimize the risk of face-to-face encounters. There was timely order of logistics to prevent stock out of ACTs, RDTs and other essential logistics. While malaria case management continued uninterrupted and indoor residual spraying was carried out on schedule and in compliance with COVID-19 protocols, some activities such as the school net distribution had to be rescheduled for the necessary measures to be put in place and schools reopen before implementation.

**Seasonal Malaria Chemoprevention (SMC)**

An important achievement was with the successful implementation of the Seasonal Malaria Chemoprevention which was carried out under strict COVID-19 protocols. The four rounds of Seasonal Malaria Chemoprevention (SMC) were conducted in the five eligible regions in the northern zone. A total of 1,078,635 children aged 6m - 5 years were covered with 4 rounds of dosing representing 94% (fully dosed/treated).

### 1.1.2 Finalization of The New Malaria Strategic Plan 2021 -2025 and Support for NFM3 Grant

WCO in collaboration with AFRO and HQ supported finalization of the new National Malaria Strategic Plan 2021-2025 after providing technical assistance for a prior review of the previous strategic plan. This new strategic plan is aligned with the global malaria strategy and informed the concept note that was submitted to the Global Fund for the NFM 3 grant application which was subsequently approved. Technical support was provided for the NFM3 application for Global Fund grant to support malaria control interventions towards pre-elimination. Support provided included stakeholder discussions, sessions write ups and reviews.

### 1.1.3 High Burden High Impact Approach

This approach seeks to accelerate malaria control efforts through improved political will, high-level advocacy and scaling up of interventions among others. WCO engaged a consultant to support the NMCP in this advocacy drive with clear terms of reference. Activities carried out included a few partnership and advocacy meetings, one of which was the meeting with the government’s “One Village One Dam” Initiative from the Ministry of Special Development Initiatives (MSDI). This initiative is to support develop the agricultural sector through the
building of dams in certain communities to enhance irrigation. The engagement from the malaria control was the advocacy for a sound larval source management to ensure the control of malaria transmission. With the covid-19 restrictions some other scheduled engagements had to be postponed.

1.2 HIV, Tuberculosis
The year 2020 began with the focus of the HIV/TB program on development of National Strategic Plans and Global Fund grant applications for NFM 3. The country had just received an allocation letter for some $226 Million in December 2019. With the programs just beginning to improve in performance it was critical to maintain a balance between development of new strategic plans for HIV and TB (2021 – 2025), Global Fund NFM 3 application and sustained implementation of the revised operational plans that were beginning to yield results. The situation was further complicated by leadership crisis of the Country Coordinating Mechanism of the Global Fund (CCM) emanating from allegations of conflict of interest against the CCM leadership by some CCM members and contesting of the elections to appoint the CCM leadership. This created the situation where as at the beginning of 2020 there was weak leadership and governance for the grant application process.

The role of WHO across the three levels was critical in providing the appropriate technical assistance to ensure the country maintained progress in current implementation of TB / HIV program activities whiles developing new strategic plans and the funding application. The Country office support was also included support for ensuring continuity of essential services for HIV/TB and Hepatitis on the context of the COVID-19 pandemic.

Key Activities, Outcomes and Achievements
1.2.1 Development of Global Fund NFM 3 Grant Application
2. WCO provided technical support for the development of the NFM 3 grant application and grant making process to ensure resources are available in a timely manner. Ghana’s NFM 3 grant application was successfully reviewed by the technical review panel (TRP) of the global fund and recommended as technically sound and strategically focused. Final grant documents were signed on December 24, 2020 making available over $238 million to the country for the
fight against HIV, TB and Malaria as well as supporting Resilient and Sustainable Systems for Health (RSSH). The support provided included the following:

- Essential high-level leadership and guidance for process as Chair of CCM Steering Committee made up of WHO, UNAIDS, USAID, MOH, GHS and CSO representative.
- Facilitated several country dialogue sessions and assisted to resolve stakeholder differences as part of the prioritization process.
- Facilitated high level meetings and discussions between the Minister of Health and the Global Fund leadership to resolve outstanding government of Ghana commitments and obligations to the Global Fund.
- Provided technical support and critical guidance to the HIV and TB task teams for the development of targets and other monitoring and evaluation related issues including the performance framework.
- Provided technical support and guidance to grant application task teams for HIV/TB and RSSH to ensure proposed interventions were aligned with WHO guidelines and global and regional best practice.
- Facilitated mock TRP review of the TB/HIV application by a team of international experts from WHO, UNAIDS and other international agencies and supported the integration of comments received into the final grant applications.
- Coordinated additional technical support for the development of the RSSH grant application from WHO AFRO and HQ following request from the CCM Ghana.
- Provided financial support for the recruitment of a budget consultant who coordinated preparation of budget for the grant applications.
- Support for grant making which included providing technical support and guidance for refining targets for the performance framework, improving the strategies and budgets to make them grant ready and response to TRP comments.

1.2.3 Provision of leadership of the Country Coordination Mechanism (CCM)

WCO provided critical leadership of the Country Coordination Mechanism (CCM) as interim Chair due to the conflict-of-interest allegations that resulted in resignation of leadership of the CCM. Without this critical role the country had risk not being eligible for submitting grant
application to the Global Fund for NFM 3. WCO is supporting a CCM evolution process that is aimed at restructuring the Ghana CCM, restoring new leadership and making the CCM more efficient and responsive in protecting the Global Fund investments in Ghana. WCO facilitated series of meetings between the Evolution Task Force, International Consultants and the CCM Hub and played critical conflict resolution and arbitrator roles. Technical support was provided to the CCM for the development and submission of a funding request to the Global Fund COVID-19 Response Mechanism Fund. The Global Fund approved the application to make available USD 13,493,109 of additional investments for the country’s COVID-19 response and to mitigate the impact of the pandemic on the three diseases and support health and community systems in Ghana.

1.2.4 Provision of essential services for HIV, TB
WHO support was also critical in ensuring continuity of essential services for TB, HIV and Hepatitis in the context of COVID-19, this included the development of guidelines for the care of PLHIV in the context of COVID-19; supporting the utilization of technology and innovative approaches for training, monitoring and evaluation activities of the programs and supporting the supply of essential commodities. Differentiated testing including index testing as well as differentiated treatment and care approaches was scaled up and emphasized through health staff orientation using both virtual and in-person meetings. These interventions resulted in the country meeting targets for newly diagnosed persons and current on treatment for the year 2020. Also, support was provided to the NACP/MOH for the development of a national implementation guide for HIVST to guide the roll out of HIVST in Ghana.
WCO support was essential for ensuring availability of essential health commodities for diagnostic and treatment for HIV and TB. This was particularly important as the economic impact of COVID 19 made it challenging for government to meet commodity obligations for 2020.

1.2.5 Development of guidelines, plans and data management mechanisms for HIV, TB
The review of the National Pediatric Acceleration Plan including advocacy and guidance for the adoption of new pediatric ARV formulations Dolutegravir – 10 mg (DTG-10) and
Lopinavir/Ritonavir (LPV/r) 4 in1 was carried out with technical assistance from WHO. Support was also provided for the development of national guideline for implementation of HIV Self testing (HIVST) and HIV Pre-exposure prophylaxis (PreP) roll out in partnership with USAID EpiC/360 and other stakeholders. Similarly, the National TB Control Program was supported to review the National guidelines for Pediatric Tuberculosis and adopt new all-oral treatment guidelines for multi-drug resistance TB.

WHO supported the configuration and deployment of the TB e-tracker that enables electronic reporting of transactional data for relevant WHO recommended indicators and improvements in the HIV e-tracker module that had earlier been deployed.

The Ghana AIDS Commission was also supported to engage a national stakeholder's dialogue to improve the quality of HIV data and make it more accessible. The meeting led to the adoption of the 2020 WHO SI guidelines for Ghana and consensus building among key HIV stakeholders including USAID, CSOs and the GHS on the set of indicators for HIV reporting in Ghana.

The National TB control program in partnership with the IMPACT4TB project rolled out TB Preventive therapy in Ghana. The country office facilitated the discussions between AURUM Ghana (CSO Implementor of IMPACT4TB) and the National TB and Aids Control programs for the planning and roll out of the TB preventive program, of particular importance was the role of the country office in the development of harmonized training manuals and M&E tools. Whiles the global challenges with supply of Rifapentine (3HP) derailed the IMPACT for TB program the country made good progress by using isoniazid whiles the challenges with 3HP are resolved.

### 1.3 Hepatitis

The National Hepatitis Control Program is relatively new and poorly resourced with an infantile hepatitis surveillance system. The focus in the year under review as has been over the last few years has been to build up the capacity of national program. A new program manager was appointed in 2020 and the country office was critical in providing guidance and support for his orientation and facilitating linkages with relevant stakeholders.
Key Activities, Outcomes and Achievements

1.3.1.1 Advocacy and Awareness for scale up of Viral Hepatitis Prevention, Care and Treatment

With technical and financial support from WHO, the National Viral Hepatitis Control Program (NVHCP) provided orientation to over 120 district and regional level Health promotion officers on the Hepatitis Free Future message and how they can engage their communities as part of the World Hepatitis Day celebration.

1.3.1.2 Review of National Viral Hepatitis Surveillance Tools

With technical support from WHO AFRO, the NVHCP was supported to review and update national data collection tools for Viral Hepatitis to ensure that they were aligned with current WHO reporting requirements and global best practice.

1.4 Neglected Tropical Diseases

Ghana is pursuing the control and elimination of 14 out of the group of over 20 neglected tropical diseases globally. In the country, these diseases are grouped under four programs as follows; Buruli ulcer and Yaws Control Program; Leprosy Control Program; Human African Trypanosomiasis and Leishmaniasis Program; and the main NTD Control Program overseeing the Preventive Chemotherapy diseases such as Onchocerciasis, Lymphatic Filariasis, Soil transmitted Helminthiasis, Schistosomiasis, Scabies, rabies etc. Each of these disease groups has a Program Manager with a management team.

Ghana has been certified Guinea Worm free since 2015. In 2018, Ghana became the first sub-Saharan African country to eliminate blinding trachoma. The country has maintained a stable programmatic intervention of Mass Drug Administration (MDA) for Onchocerciasis, Lymphatic Filariasis and a school-based deworming for soil transmitted helminthiasis and schistosomiasis. With the MDAs, transmission of Lymphatic filariasis has been broken in 83 out of the 98 previously endemic districts with only 15 districts remaining.

Ghana is still pursuing a Yaws eradication program through a targeted total treatment with Azithromycin in endemic communities based on experience from a pilot exercise carried out in three districts in 2019 with funding support from WHO-TDR.
Key activities, Outcomes and Achievements

1.4.1 Elimination of Human African Trypanosomiasis (HAT)
Human African Trypanosomiasis (HAT) has been earmarked for elimination as a public health problem in Ghana. As part of the elimination effort for disease, the country continued intensive surveillance in the ten sentinel hospitals. There was a joint supervisory support to two of these sites which were updated on the elimination process. The major achievement in the year was the finalization of an elimination dossier prepared with technical inputs from AFRO and HQ. The draft is currently ready to be officially submitted by the government to WHO.

Joint monitoring at the Ejura sentinel site.

1.4.2 Leprosy Program Review
WCO supported a comprehensive review of the 2016-2020 Strategic Plan of the National Leprosy Program. This review was led by an external consultant and supported by a team of local experts. Activities included the development of protocol for the review, interviews and field assessments which culminated in a stakeholder validation meeting. Findings from this review further informed the development of a draft NTD master plan 2021-2030.
1.4.3  Guinea Worm Eradication Programme

The WHO support the GHS to sustain the Post Certified status of the country by maintaining Guinea worm (GW) rumour registry of all rumors investigated in the regions.

In February 2019 WHO supported a joint WHO/GHS monitoring and advocacy visit to the Northern region. The visit was to identify gaps in the integration of Guinea worm eradication activities into the IDSR/DMIS for reporting and to address post certification surveillance activities in the region.

1.5  Vaccine Preventable Diseases (VPDs)

Introduction

WHO supported the Ministry of Health and the Ghana Health Service (GHS) to implement immunization and disease surveillance activities. These were done through the Expanded Programme on Immunization (EPI) and the Disease Surveillance Department; all of the Public Health Division (PHD) of the GHS. The mandate of the EPI Programme is to reduce morbidity, mortality and disability due to vaccine preventable diseases (VPDs) through immunization; an essential component of Primary Health Care (PHC). Accomplishing this mandate requires achieving and maintaining high vaccination coverage levels, improving vaccination strategies among under-vaccinated populations, prompt reporting and thorough investigation of suspected diseases, and rapid institution of control measures.
The WHO provided support through the (i) strengthening of routine immunization activities which focuses on the implementation of the reaching every district/child (RED/REC) approach (ii) Accelerated Disease Control (ADC) and (iii) Vaccine Preventable Disease (VPD) surveillance.

**Key activities, Outcomes and Achievements**

**1.4.1 Strengthening of Routine Immunization**

WHO supported the delivery of routine immunization in all regions and districts through the implementation of the Reaching Every District (RED) Strategy. Table 1 shows routine immunization performance for 2020.

Table 1: Trends in EPI Performance, 2018-2020

<table>
<thead>
<tr>
<th>Antigens</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
<th>Difference</th>
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<td></td>
<td># Vac’d</td>
<td>Coverage</td>
<td># Vac’d</td>
<td>Coverage</td>
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<td>1,121,489</td>
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<td>1,135,697</td>
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<tr>
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<td>OPV-0</td>
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<td>957,093</td>
<td>81</td>
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</table>

*Rota-3 was introduced into routine immunization in the 3rd Quarter of 2020*

Table 1 shows a 3-year trend in EPI performance for 2018 to 2020. From the table, the country did not achieve the targeted coverage of 95% for any of the vaccines. Specifically, there was a drop of 4,629 in the number of children vaccinated Penta-3 in 2020 compared to 2019.
A total of 167 (64.2%) districts achieved Penta-3 coverage of 95% and above compared to 178 (68.4%) in 2019. Seven districts had coverage rates of less than 50% in 2020 compared to three in 2020. Figure 1 shows district level Penta-3 performance.

Figure 1: Penta-3 Performance by performance category by districts, Ghana 2015-2020

Immunization service delivery was directly affected by the COVID-19 pandemic which resulted in a reduction in number of people vaccinated as well as the coverage rates;

1. Lockdown in major cities and restricted movement in all other parts of the country
2. Near complete ‘shutdown’ of public transport system affected access to services
3. Re-assignment of key staff in EPI and surveillance for COVID-19 duties reduced the human resource
4. Redirection of already limited EPI resources to support COVID-19 response
5. Apprehension among health workers affecting supply of services
6. Some health workers were chased out on their usual home visits
7. Vaccine shortages were reported in a couple of health facilities
8. Fear among caregivers leading to non-patronization of services even where provided
9. caregivers unsure whether to send their children for vaccines
WHO supported efforts to sustain essential health services during COVID-19 to ensure delivery of immunization activities. The following were some of the measures that were taken;

1. Sustained coordination mechanisms: MOH/GHS, WHO and UNICEF
2. Movement passes provided to essential staff including EPI: MOH and Partners
3. Virtual meetings with key staff at the periphery to understand challenges faced and better plan for them
4. MoH and WHO supplied PPEs and hand sanitizer for routine/essential health services albeit, inadequate
5. Guidelines for continuity of child health services (including EPI) was developed and disseminated
6. Developed Immunization Recovery Plan which will ensure performance is restored following the disruption caused by COVID-19
7. Medical drones were used to supply vaccines in situations where means of transport was not readily available

WHO supported the Ministry of Health/Ghana Health Service to commemorate the 2020 edition of the African Vaccination Week (AVW) which was jointly celebrated with the National Child Health Promotion Week. The rationale for the commemoration was to showcase available immunization and child health services and to also highlight the need to get every child vaccinated whilst adhering to the COVID-19 prevention protocols.

A press statement was prepared and released for the commemoration which was under the theme “Vaccines work for all”. The press release was published in the Daily Graphic and Ghanaian Times newspapers.

1.4.2 Vaccination Response to the cVDPV2 Outbreak

Ghana confirmed outbreak of circulating vaccine-derived poliovirus Type 2 (cVDPV2) in August 2019 which led to the declaration of Public Health Emergency of National Concern by the Ministry of Health. WHO and other partners of the Global Polio Eradication Initiative (GPEI) supported
the Government of Ghana to develop and implement a comprehensive polio outbreak response plan which was executed in phases.

In 2020, the country confirmed a total of 31 cVDPV2 out of which 12 were from AFP cases and the remaining 19 were confirmed from the Environmental Surveillance System. Five supplemental immunization activities (SIAs) were implemented to respond to these confirmed cases. The response was part of the Phases 2 and 3. The Round 0 of the Phase 2 was conducted in 2019 and the rounds 1 and 2 were done in January and February 2020 respectively.

Following the confirmation of the first few cases of COVID-19 and the institution of the prevention protocols, the Ghana Health Service suspended the implementation of mass vaccination campaigns including the response to the polio outbreak. In June 2020, WHO, other GPEI partners and the Ministry of Health/Ghana Health Service took the decision to re-start vaccination response to the cVDPV2 outbreak and the decision was communicated to AFRO. WHO led the development of a National mOPV2 Campaign Plan and Budget which was subsequently approved by the outbreak preparedness and rapid response teams (OPRRT).

The round 1 and 2 of the Phase 2 response were conducted in 38 districts in 5 regions (Ahafo, Bono, Bono East, Oti and Savanna). The Phase 3 response was conducted in 179 districts in 8 regions. The administrative coverage of the SIAs are shown in the figure below;

*Figure 2: Administrative coverage of Polio SIAs, January – October 2020*
Lot quality assurance sampling (LQAS) survey was conducted to validate the administrative coverage and identify poorly covered lots or districts. The LQAS was conducted in all implementing districts by trained independent assessors. The results of the LQAS, which is essentially a pass or fail assessment, is shown in the figure below;

**Figure 3: LQAS results of the Polio Outbreak Response Vaccination Campaigns**

Adequate preparations were made to ensure prevention of COVID-19 infection during the campaign. Among the mechanisms were;
- Standard PowerPoint presentations with extensive discussion on infection prevention during the training sessions at all levels.
- Provision of guidelines on conducting mass vaccination during COVID-19 to all coordinators, vaccinators and volunteers
- Sufficient logistics such as face masks and hand sanitizers procured and distributed to field staff
- Adherence to wearing face masks and regular use of hand sanitizers during the campaign by all staff involved in the campaign at all levels.
- Adequate supervision by Monitors/Supervisors to ensure full compliance with Covid-19 prevention protocols.

1.5.3 Inactivated Polio Vaccine (IPV) Catch-Up Campaign
The Government of Ghana, with the support of WHO and other health partners conducted a nationwide inactivated polio vaccine (IPV) Catch-up Campaign from 19-25 February 2020.

Ghana switched from the use of tOPV to bOPV on 14 April 2018. Inactivated polio vaccine (IPV) was not introduced into routine immunization until June 2018. The delay in the introduction was due to global shortage of IPV. This resulted in over two (2) cohorts of children in the country who did not have protection against the poliovirus type 2.

The main objective of the IPV catch-up campaign was to increase population immunity against poliovirus type 2. Specifically, the campaign sought to raise population immunity against poliovirus type 2, prevent polio outbreaks in the country, strengthen AFP surveillance and strengthen routine immunization.

The national coverage of the campaign was 99% and the coverage of the post-campaign independent monitoring was 89%.
The COVID-19 measures that were used for the mOPV2 campaign were also used for the IPV Catch-up Campaign

1.5.4 Yellow Fever Preventive Mass Vaccination Campaign

WHO supported the Ministry of Health/Ghana Health Service to conduct the Phase B of the Yellow Fever Preventive Mass Vaccination Campaign (PMVC) from 12 – 18 November 2020. The Phase B was the last phase of the PMVC which ensured all persons in all districts in the country were protected. This was in line with Global Strategy for Elimination of Yellow Fever Epidemics (EYE) which aims at protecting risk populations, preventing international spread and containing outbreaks rapidly.
The performance is shown in the table below;

**Summary of Administrative coverage by regions**

<table>
<thead>
<tr>
<th>No</th>
<th>Region</th>
<th>No of Dists</th>
<th>Target (10-60ys)</th>
<th>No Vaccinated during campaign</th>
<th>Already vaccinated with card</th>
<th>Total vaccinated/protected</th>
<th>% vaccinated/protected</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Ashanti</td>
<td>5</td>
<td>440,981</td>
<td>422,178</td>
<td>4,401</td>
<td>426,579</td>
<td>97</td>
</tr>
<tr>
<td>2</td>
<td>Ahafo</td>
<td>2</td>
<td>87,361</td>
<td>89,433</td>
<td>981</td>
<td>90,414</td>
<td>103</td>
</tr>
<tr>
<td>3</td>
<td>Bono</td>
<td>4</td>
<td>224,138</td>
<td>222,325</td>
<td>2,244</td>
<td>224,569</td>
<td>100</td>
</tr>
<tr>
<td>4</td>
<td>Bono East</td>
<td>2</td>
<td>170,957</td>
<td>178,415</td>
<td>508</td>
<td>178,923</td>
<td>105</td>
</tr>
<tr>
<td>5</td>
<td>Central</td>
<td>11</td>
<td>923,751</td>
<td>849,662</td>
<td>6,052</td>
<td>855,714</td>
<td>93</td>
</tr>
<tr>
<td>6</td>
<td>Eastern</td>
<td>20</td>
<td>1,255,881</td>
<td>1,210,807</td>
<td>25,269</td>
<td>1,236,076</td>
<td>98</td>
</tr>
<tr>
<td>7</td>
<td>G Accra</td>
<td>6</td>
<td>560,069</td>
<td>449,129</td>
<td>45,320</td>
<td>494,449</td>
<td>88</td>
</tr>
<tr>
<td>8</td>
<td>Northern</td>
<td>13</td>
<td>1,069,548</td>
<td>1,009,754</td>
<td>3,310</td>
<td>1,013,064</td>
<td>95</td>
</tr>
<tr>
<td>Region</td>
<td>ID</td>
<td>Total</td>
<td>Reaches</td>
<td>Mortality</td>
<td>Completed</td>
<td>Coverage</td>
<td></td>
</tr>
<tr>
<td>------------</td>
<td>----</td>
<td>---------</td>
<td>---------</td>
<td>-----------</td>
<td>-----------</td>
<td>----------</td>
<td></td>
</tr>
<tr>
<td>North East</td>
<td>9</td>
<td>146,604</td>
<td>116,377</td>
<td>143</td>
<td>116,520</td>
<td>79</td>
<td></td>
</tr>
<tr>
<td>Savannah</td>
<td>10</td>
<td>36,644</td>
<td>36,135</td>
<td>58</td>
<td>36,193</td>
<td>99</td>
<td></td>
</tr>
<tr>
<td>Upper East</td>
<td>11</td>
<td>538,842</td>
<td>485,762</td>
<td>3,670</td>
<td>489,432</td>
<td>91</td>
<td></td>
</tr>
<tr>
<td>Upper West</td>
<td>12</td>
<td>63,760</td>
<td>43,280</td>
<td>345</td>
<td>43,625</td>
<td>68</td>
<td></td>
</tr>
<tr>
<td>Volta</td>
<td>13</td>
<td>51,613</td>
<td>41,822</td>
<td>841</td>
<td>42,663</td>
<td>83</td>
<td></td>
</tr>
<tr>
<td>Oti</td>
<td>14</td>
<td>150,798</td>
<td>112,265</td>
<td>3,714</td>
<td>115,979</td>
<td>77</td>
<td></td>
</tr>
<tr>
<td>National</td>
<td>15</td>
<td>5,720,947</td>
<td>5,267,344</td>
<td>96,856</td>
<td>5,364,200</td>
<td>94</td>
<td></td>
</tr>
</tbody>
</table>

The COVID-19 measures that were used for the mOPV2 campaign were also used for the Yellow Fever PMVC.

### 1.5.5 Preparation and Submission of Reports

WHO provided support for the preparation and finalization of reports. These were;

1. WHO-UNICEF Joint Reporting Form (JRF)
2. Annual Progress Report (APR) for Polio Eradication Activities

### Major Outcomes/Achievements

1. WHO supported the Ghana Health Service to put in measures to sustain routine immunization during COVID-19. The disruption of immunization services was minimal
2. Guidelines and job-aids were developed and disseminated across all levels to ensure the delivery of essential services including immunization
3. Ghana was able to break transmission of the cVDPV2 outbreak; the country did not record any cVDPV2 case after March 2020
4. WHO played a key role in the decision to re-start outbreak response campaigns as well as the Yellow Fever Preventive Campaign
1.5.6 VPD Surveillance

Introduction

WHO continued to provide support to the Government of Ghana to strengthen polio eradication activities in the country. Major activities conducted included support for the polio eradication committees such as National Certification Committee (NCC), National Polio Expert Committee (NPEC) and the National Taskforce for Laboratory Containment (NTF).

Twelve cVDPV2 cases were reported in the first quarter of the year bringing the cumulative to 31 cVDPV2 cases as at end of 2020. Ten Surge Officers were recruited to provide support for cVDPV2 response activities in the regions and districts. They also provided support for routine surveillance and COVID-19 response activities. The Country Office benefitted from the deployment of an International Surveillance Officer between the period of September to December 2020.

The WHO Office procured freezers for the regional level to temporarily keep samples, in the event they could not immediately be shipped to referral laboratories in Accra.

The Country Office facilitated the completion of a pilot phase of using drones to ship specimens from parts of the Northern and Upper East Regions to Tamale airport and onward shipment to Kotoka International Airport, before transporting to the Polio Laboratory.

Data validation exercises were reintroduced at the national level to help improve the quality of immunization and surveillance data.

The WHO Surge Team also developed an algorithm for the Ghana Health Service on how to conduct active surveillance in health facilities.

Key Activities, Outcomes/Achievements

1.5.6.1 Acute Flaccid Paralysis

The country achieved the two core AFP Performance indicators; Non-Polio AFP rate of 4.89 and Stool Adequacy of 86.0%. The achievement for previous year was 4.7 and 88.9 for the Non-Polio AFP Rate and percentage Stool Adequacy respectively.
1.5.6.2 Environmental Surveillance:

The country established 2 new Environmental Surveillance sites in the Ashanti Region and 1 new in the Bono East Region, bringing the total to 14 sites in 2020. The Environmental Surveillance platform confirmed 90 samples investigated from 7 sites in Greater Accra and Eastern Regions as positive for cVDPV2.

1.5.6.3 Yellow Fever

A total of 917 suspected Yellow Fever cases were reported from 234 (90%) districts. All regions attained and exceeded the target of at least 80% districts reporting, same situation as previous year. Two probable cases were reported from Bosomtwe (Ashanti Region) and Techiman North (Bono East Region) but turned out negative.

1.5.4.4 Neonatal Tetanus

No case was documented in 2020 as against of 9 neonatal tetanus cases reported and investigated from 5 regions namely Eastern, Central, Northern, Volta and Western in 2019.

1.5.6.4 Measles

A total of 1,795 suspected cases was reported out of which 78 (4.3%) was confirmed. Districts involved in reporting numbered 253 (97%), above the expected 80%. Measles outbreaks were detected in 4 districts namely; Wassa Amenfi West, Sissala West, Pusiga and Central Gonja.

1.5.6.6 Support for other VPDs

WHO supported surveillance activities for other VPDs including, congenital rubella syndrome (CRS), rotavirus diarrhoea and paediatric bacterial meningitis (PBM). Support for rotavirus diarrhoea, CRS and PBM were implemented through sentinel sites at Komfo-Anokye Teaching Hospital and Korle-Bu Teaching Hospital.
### Table 3: AFP Surveillance Performance Indicators, Ghana, 2020

<table>
<thead>
<tr>
<th>Region</th>
<th>Population Under 15</th>
<th>Expected Non-Polio AFP Cases</th>
<th>True AFP Cases Reported</th>
<th>Discarded as Non-Polio AFP</th>
<th>Annualized Non-Polio AFP Rate</th>
<th>Timely AFP Stools</th>
<th>Percentage of Stool Timeliness</th>
<th>Surveillance Adequate Stools</th>
<th>Percentage Surveillance Adequacy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ahafo</td>
<td>257,481</td>
<td>8</td>
<td>15</td>
<td>15</td>
<td>5.72</td>
<td>14</td>
<td>93</td>
<td>14</td>
<td>93</td>
</tr>
<tr>
<td>Ashanti</td>
<td>2,488,205</td>
<td>75</td>
<td>105</td>
<td>94</td>
<td>3.71</td>
<td>95</td>
<td>90</td>
<td>93</td>
<td>89</td>
</tr>
<tr>
<td>Bono</td>
<td>490,899</td>
<td>15</td>
<td>31</td>
<td>28</td>
<td>5.60</td>
<td>28</td>
<td>90</td>
<td>28</td>
<td>90</td>
</tr>
<tr>
<td>Bono East</td>
<td>476,183</td>
<td>14</td>
<td>33</td>
<td>32</td>
<td>6.59</td>
<td>29</td>
<td>88</td>
<td>29</td>
<td>88</td>
</tr>
<tr>
<td>Central</td>
<td>1,094,306</td>
<td>33</td>
<td>68</td>
<td>64</td>
<td>5.74</td>
<td>60</td>
<td>88</td>
<td>59</td>
<td>87</td>
</tr>
<tr>
<td>Eastern</td>
<td>1,393,918</td>
<td>42</td>
<td>55</td>
<td>52</td>
<td>3.66</td>
<td>49</td>
<td>89</td>
<td>48</td>
<td>87</td>
</tr>
<tr>
<td>Greater Acre</td>
<td>2,123,421</td>
<td>64</td>
<td>53</td>
<td>48</td>
<td>2.22</td>
<td>40</td>
<td>75</td>
<td>40</td>
<td>75</td>
</tr>
<tr>
<td>North East</td>
<td>247,296</td>
<td>7</td>
<td>19</td>
<td>19</td>
<td>7.54</td>
<td>14</td>
<td>74</td>
<td>14</td>
<td>74</td>
</tr>
<tr>
<td>Northern</td>
<td>818,543</td>
<td>25</td>
<td>41</td>
<td>41</td>
<td>4.91</td>
<td>39</td>
<td>95</td>
<td>38</td>
<td>93</td>
</tr>
<tr>
<td>Oti</td>
<td>319,116</td>
<td>10</td>
<td>14</td>
<td>13</td>
<td>4.00</td>
<td>13</td>
<td>93</td>
<td>13</td>
<td>93</td>
</tr>
<tr>
<td>Savannah</td>
<td>249,776</td>
<td>7</td>
<td>18</td>
<td>18</td>
<td>7.07</td>
<td>18</td>
<td>100</td>
<td>17</td>
<td>94</td>
</tr>
<tr>
<td>Upper East</td>
<td>547,142</td>
<td>16</td>
<td>65</td>
<td>60</td>
<td>10.76</td>
<td>62</td>
<td>95</td>
<td>62</td>
<td>95</td>
</tr>
<tr>
<td>Upper West</td>
<td>364,761</td>
<td>11</td>
<td>74</td>
<td>69</td>
<td>18.56</td>
<td>63</td>
<td>85</td>
<td>60</td>
<td>81</td>
</tr>
<tr>
<td>Volta</td>
<td>801,225</td>
<td>24</td>
<td>36</td>
<td>36</td>
<td>4.41</td>
<td>33</td>
<td>92</td>
<td>31</td>
<td>86</td>
</tr>
<tr>
<td>Western</td>
<td>930,157</td>
<td>28</td>
<td>51</td>
<td>45</td>
<td>4.75</td>
<td>41</td>
<td>80</td>
<td>41</td>
<td>80</td>
</tr>
<tr>
<td>Western North</td>
<td>398,619</td>
<td>12</td>
<td>18</td>
<td>14</td>
<td>3.45</td>
<td>15</td>
<td>83</td>
<td>14</td>
<td>78</td>
</tr>
<tr>
<td>Ghana</td>
<td>13001048</td>
<td>391</td>
<td>696</td>
<td>648</td>
<td>4.89</td>
<td>613</td>
<td>88</td>
<td>601</td>
<td>86</td>
</tr>
</tbody>
</table>

### Table 4: AFP surveillance indicators Ghana, 2014 - 2020

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of cases reported</td>
<td>376</td>
<td>352</td>
<td>468</td>
<td>554</td>
<td>514</td>
<td>633</td>
<td>696</td>
</tr>
<tr>
<td>Non-Polio AFP rate</td>
<td>2.95</td>
<td>2.36</td>
<td>3.5</td>
<td>4.28</td>
<td>3.98</td>
<td>4.7</td>
<td>4.89</td>
</tr>
<tr>
<td>% Timely stools</td>
<td>88</td>
<td>87</td>
<td>91</td>
<td>91</td>
<td>92</td>
<td>90</td>
<td>88</td>
</tr>
<tr>
<td>% adequate stool</td>
<td>86</td>
<td>73</td>
<td>83</td>
<td>88</td>
<td>88</td>
<td>89</td>
<td>86</td>
</tr>
<tr>
<td>Number of Wild poliovirus isolated</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>19*</td>
<td>12*</td>
</tr>
<tr>
<td>Number compatible with Polio</td>
<td>24</td>
<td>24</td>
<td>29</td>
<td>26</td>
<td>12</td>
<td>7</td>
<td>2</td>
</tr>
<tr>
<td>Number discarded as non-Polio</td>
<td>338</td>
<td>277</td>
<td>422</td>
<td>528</td>
<td>512</td>
<td>607</td>
<td>648</td>
</tr>
</tbody>
</table>

* - circulating Vaccine Derived Polio Virus
1.6 Malaria Vaccine Implementation Programme (MVIP)

Introduction

The phased vaccine introduction programme has seen the administration of over half a million doses (541,648) of the RTS,S/AS01E malaria vaccine to eligible children in 42 districts (across 7 regions) since May 2019 (Table 1). The WHO coordinated MVIP seeks to evaluate the feasibility of delivering the 4-dose schedule RTS,S malaria vaccine through routine immunization, document its safety profile and assess the impact of the vaccine on malaria morbidity and mortality in the context of routine use. Ghana, Malawi and Kenya are participating in the initial pilot programme. In Ghana, the implementation is led by the Ministry of Health (MOH) and the Ghana Health Service (GHS) with support from other partners (PATH, UNICEF).

The pilot vaccine implementation programme is complemented by a robust evaluation programme which will generate evidence to answer the three core objectives of the MVIP and guide the process towards a policy decision. The Ghana evaluation programme is led by a local consortium (CEM-Ghana). All the evaluation modules (safety, impact and feasibility) are fully operational and data is submitted according to agreed timelines. A qualitative study, the household utilization study (HUS) is also currently underway and will document community experience with regards to the use of malaria interventions, uptake of the malaria vaccine and other EPI vaccines as well as other contextual factors. Finally, a costing study has also been commissioned to generate data and evidence to guide country policy makers in arriving at policy decision.

With the pilot evaluations fully operational in all 3 MVIP countries, it is expected that significant data and evidence will be accrued to make a policy decision on the potential roll out of the RTS,S vaccine on a wider scale by the end of 2021.

Key activities, Outcomes and Achievements

1.6.1 Improving vaccine coverage and support supervision.

The WCO provided support to the MVIP districts through the EPI to periodically intensify routine immunisation activities, generate demand, improve defaulter tracing and strengthen data quality and management. This led to significant improvement of coverage and low drop-out rates in 2020 despite the challenges with vaccine stock out and COVID-19.
Vaccine coverage appreciated in 2020 with Dose 1 coverage ranging from 90% in the Bono East region to 51% in the Upper East region. Dose 2 coverage was 67% over the same period (84% - 49%) and the annualized dose 3 coverage was 66% ranging from 84% to 49%. Drop-out rates were below the threshold of 10% (Table 5).

Fourth dose vaccinations introduced in September 2020 and has slowly improved though not fully optimized. There are significant variations in vaccination coverage across the 42 districts, a reflection of the disparities of uptake of routine immunisation services across districts (Figure 5).

Table 5: Coverage and drop-out rates for the RTS,S malaria vaccine

<table>
<thead>
<tr>
<th>Doses/ Dropout-out</th>
<th>Annualized coverage (%)</th>
<th>Annualized coverage (%)</th>
<th>Number of doses administered since introduction</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>May - Dec 2019</td>
<td>Jan - Dec 2020</td>
<td></td>
</tr>
<tr>
<td>RTS,S 1</td>
<td>66%</td>
<td>71%</td>
<td>195,452</td>
</tr>
<tr>
<td>RTS,S 2</td>
<td>62%</td>
<td>67%</td>
<td>176,533</td>
</tr>
<tr>
<td>RTS,S 3</td>
<td>51%</td>
<td>66%</td>
<td>156,833</td>
</tr>
<tr>
<td>RTS,S 4&lt;sup&gt;1&lt;/sup&gt;</td>
<td>-</td>
<td>22%**</td>
<td>12,830</td>
</tr>
<tr>
<td>RTS,S 1 - 2 drop-out rate</td>
<td>6%</td>
<td>5%</td>
<td></td>
</tr>
<tr>
<td>RTS,S 1 - 3 drop-out rate</td>
<td>7%</td>
<td>6%</td>
<td></td>
</tr>
</tbody>
</table>
1.6.2 **Strengthening vaccine safety surveillance**

Health system strengthening, particularly, immunisation service delivery is one of the expected outcomes of the MVIP. Vaccine safety surveillance is a key component of the immunisation programme. The balance of Adverse Events Following Immunisation (AEFI) reporting has been disproportionately lower from the routine surveillance system with majority of the reports (> 90%) from the Phase IV and evaluation studies. Adverse events of special interest (AESI) surveillance which is also an important aspect of the MVIP has also been sub-optimal.

To further improve routine AEFI and AESI surveillance, WHO provided financial and technical support to the Food and Drugs Authority (FDA) and the EPI to conduct refresher training for regional AEFI investigation teams in all seven MVIP regions. The workshop also provided the opportunity to build the capacity of the evaluation team on AEFI and AESI surveillance.
Overall, 44 persons were trained during the first phase of the refresher training and for the first time this will be scaled down to reach districts and sub-districts. All participants completed the WHO online courses on vaccine safety basics and AEFI investigation.

Training of the Volta and Oti regional AEFI investigation teams and officers from the evaluation consortium.

2.0 NON-COMMUNICABLE DISEASES AND MENTAL HEALTH

2.1 Global Initiative for Childhood Cancer (GICC)

Introduction

WHO announced the Global Initiative for Childhood Cancer (GICC) in September 2018. This initiative aims to reach at least a 60% survival rate for children with cancer by 2030, thereby saving an additional one million lives.

The objectives of the initiative are two-fold: to increase prioritization of childhood cancer through awareness raising at global and national levels and to expand the capacity of countries to deliver best practice in childhood cancer care. A number of countries including: Ghana, Morocco, Myanmar, Peru, Senegal and Zambia were chosen to implement this strategy. A technical package (CURE-ALL) was developed to guide countries assess their current situation, develop an action plan, implement and monitor progress.

Through efforts led by WHO, World Childhood Cancer (WCC) and the Ministry of Health in Ghana, an initial national stakeholder workshop was held in Ghana in November 2019, resulting in plans supported by local, regional and international partners to form a national childhood cancer steering committee as well as a national professional society for Paediatric hematology/oncology.

The objective of this report is to highlight activities undertaken over the period July 2019 to December 2020 by the childhood cancer stakeholders in Ghana with support from WHO.
Key Activities, Outcomes and Achievements

2.1.1 Set up of a National Steering Committee on Childhood Cancer (NSCCC)

As a follow up to stakeholder engagements on childhood cancer in Ghana, the Ministry of Health developed terms of reference TOR for the setup of the NSCSS and then requested for nominations from relevant institutions. Subsequently a national steering committee was formed to lead efforts aimed at prevention and control of childhood cancer. Activities undertaken by the steering committee include the following:

a. Map out stakeholder in the childhood cancer space

b. Seek expert responses on the childhood cancer situation in Ghana in terms of governance, available human resource, infrastructure and partners organizations.

c. Form a Technical Working Group (TWG) to develop a draft National Strategy for Childhood Cancer in Ghana

The steering committee has representation from the MOH, GHS, Health Partners Academia, NHIA, Teaching Hospitals, WHO, patient groups among others

2.1.2 Development of CC Strategy, Action and M&E plans

An existing framework tool for the conduct of a situational analysis of Childhood Cancers (CC) was shared by AFRO and was adapted and revised for the Ghana Context by the Steering Committee (SC). Subsequently, the SC worked with relevant stakeholders to develop the Situational Analysis which formed a reference and evidence tool for the development of the strategy, action and M&E plans for CC

The TWG was tasked to develop a draft strategy, an action plan and an M&E framework to guide childhood cancer activities in Ghana. This document was developed over a twelve-week period resulting in a draft strategy.

The draft strategy covered a five-year period- 2021-2025, with the following objectives:

• Objective one: Strengthen Governance for Childhood Cancer in Ghana
Objective two: Awareness Creation and Community Sensitization

Objective three: Build capacity for cure of Childhood Cancer in Ghana

Objective four: Promote Research into Childhood Cancer in Ghana

The TWG as part of their TOR was also tasked to produce an action plan as well as an M&E framework to guide implementation of the strategy.

Following the development of the zero draft the SC continued to provide inputs to fine tune the documents after which a larger stakeholder meeting was done to validate the documents with participation of the Director General of the Ghana Health Service, Directors from the Ministry of Health, Chief Executive Officer (CEO) of the National Health Insurance Authority amongst others.

2.1.3 Childhood Cancer Surveillance Interventions

The SC developed guidelines for CC surveillance and used it as a tool to facilitate the orientation and training on childhood cancer surveillance for health information officers and biostatisticians across Ghana, working in the area of pediatric oncology care.

Pediatric oncology care in Ghana is only available in the two major teaching hospitals in Ghana, namely the KBTH and the KATH. However, a few hospitals across the country provide some pediatric oncology in close collaboration with the two afore-mentioned teaching hospitals. These hospitals include:

- Agogo PresbyterIan Hospital
- Cape-Coast Teaching Hospital
- Tamale Teaching Hospital
- Greater Accra Regional Hospital

A total of 15 Health information and biostatisticians from these hospitals were purposively selected by their respective institutions and trained in childhood cancer surveillance.
2.1.4 Logistics Support

WHO also provided IT equipment (2 laptops, 1 photocopier) to the NCDP to facilitate their secretariat roles for GICC Project. Procurement processes have been initiated to procure additional 5 desktop computers and 2 laptops to support CC surveillance activities in Teaching Hospitals.

2.2 Mental Health

Introduction

In the context of improving access to care and service quality, WHO recommends the development of comprehensive community-based mental health and social care services; the integration of mental health care and treatment into general hospitals and primary care; continuity of care between different providers and levels of the health system; an effective collaboration between formal and informal care providers; and the promotion of self-care, for instance, through the use of electronic and mobile health technologies Developing mental health services of good quality requires the use of evidence-based protocols and practices, including early intervention, incorporation of human rights principles, respect for individual autonomy and the protection of people's dignity. The human rights violations and poor quality of care and support for people with mental health conditions, psychosocial or intellectual disabilities in Ghana have been well documented in recent NGOs and other reports. These are occurring in health and mental health services, in faith-based settings (including prayer camps) as well as in the community more generally. To effectively and sustainably address this situation and to promote rights and recovery in all settings and at all levels, focusing on gender inclusiveness and ensuring gender equality, it is essential to improve knowledge, attitudes, and practices for mental health among all stakeholder groups. In this regard, the Ministry of Health of Ghana is collaborating on the implementation of WHO QualityRights, an initiative which aims to:

- Assess and improve the quality and human rights conditions of mental health facilities
- Build capacity among health care professionals, family members, people with lived experience, NGOs, Organizations of Persons with Disabilities (OPDs) to understand and promote human rights
- Support civil society movement to conduct advocacy and influence policy-making
- Reform policies in line with best practice and international human rights standards

The implementing partners for the project are the Ministry of Health, Ghana Health Service, and the Mental Health Authority. The programme is focused on 3 thematic areas which are improvement in policy, leadership, resources and governance systems for people with mental health conditions, psychosocial and intellectual disabilities, interventions and services across community-based health settings scaled up to improve access to high-quality support and negative attitudes to key stakeholder stakeholders changed.

2.2.1 MhGAP training for Prescribers at Primary Health Care Level

As part of achieving access to quality integrated mental health care, requires building the capacity of providers at the primary care level. The WHO Mental Health Gap Action Programme (MhGAP) intervention guide was used in training prescribers in 13 regions of the country. A total of 443 primary care providers made up of 75 doctors, 176 physician assistants, and 192 nurses trained as of November 2020. This will improve the capacity of these primary care staff in managing common mental health conditions as well as share the knowledge gained as part of the dissemination to other colleagues. As part of the evaluation, almost all participants said the training had increased their knowledge, increased their interest, and boosted their confidence to manage common mental health conditions. Some participants suggest the training should be rolled out to include a lot more clinical staff such as nurses, midwives, etc, periodic supportive supervision should be organized for participants to coach and motivate them to use the knowledge gained. Also, some mentioned the need for a specialist in psychiatry in the regions to support the middle-level staff and oversee the mental health services. The number of mental health-related diagnoses from the District Health Information Management System (DHIMS), a national data reporting portal recorded six (6) months after the training was completed, will be compared to the value recorded before the training was initiated for the 13 regions. During the supportive supervision, consulting room registers and folders would be examined as means of verification to determine the level of usage of the knowledge gained.
2.2.2 Conduct of WHO ATLAS Survey

In 2020, the MHA and partners completed the WHO ATLAS Survey. However, a decision was made to conduct an additional AIMS Study to provide a detailed assessment of Mental Health Systems and Structures. The World Health Organization-Assessment Instrument for Mental Health Systems (WHO-AIMS) assessment is used to collect essential data on mental health systems of countries. The initial assessment is to provide reliable information as a baseline. The data collected is expected to inform plans for improvement and monitor progress made in subsequent assessments. A new assessment for the year 2020 compared with the 2011 data can be used to determine the level of the integration of mental health into primary care. The need for an objective and holistic assessment of progress made and gaps that may exist is important. A current assessment of Ghana's mental health system is important to provide the needed information to drive the policy agenda for the next decade. The plans to undertake the project have been initiated with a request for quotations issued to key research organizations to express their interest. The institution that meets the criteria will be offered the opportunity to conduct the assessment and submit its report within a specified time frame. The findings from the assessment can be used in advocacy for mental health.

2.2.3 QualityRights Assessment of Psychiatric Hospitals and Mental Health Units

The WHO QualityRights toolkit is used in the comprehensive assessments of quality and human rights conditions in services. The Toolkit covers 5 assessment areas including i) the social and physical conditions of the mental health service; (ii) whether the service is promoting a comprehensive recovery-based approach (iii) legal capacity, supported decision making and advance directives; (iv) protection from violence, coercion, and abuse (v) promotion of independent living and inclusion in the community. Through our implementing partner the Mental Health Authority, a total of seven (7) facilities comprising two (2) psychiatric hospitals namely Accra and Ankaful Psychiatric Hospitals, and five (5) regional hospitals with psychiatric units namely Koforidua and Sunyani Regional Hospitals, Korle-Bu, Ho and Okomfo Anokye Teaching Hospitals. The purpose of this exercise was to measure the quality-of-service delivery and human rights standards in psychiatric, teaching, and regional hospitals with psychiatric wings. The overall objective of the project is to address service delivery gaps and work towards consolidating gains in the targeted facilities in a manner that respect the rights and dignity of service users.
Preliminary findings from the reports indicate that in one of the psychiatric hospitals, for example, the relations between staff and service users were good and there was generally no report of abuse (physical, verbal, sexual, and emotional) while in the other there were reported cases of verbal and physical abuse by service users. In both psychiatric hospitals is open to all without discrimination based on sex, economic status, race, ethnicity, and religious affiliation. However, Ankaful does not have an in-patient facility for children and physically ill patients while in Accra admission is tied to one's ability to pay for the cost of treatment. Besides, Occupational therapy (OT), which is expected to also contribute to improving the occupations and recovery of service users is under-resourced and requires refurbishment. Also, some service users are unable to utilise the service due to their inability to pay for the number of sessions required.

Thus, the recommendations from the report will guide the development of an improvement plan, leveraging both internal and external resources. The improvement plan workshop will be held for each facility due to the unique nature of their challenges identified. The individual facility improvement plans will be preceded by the Trainer of Trainers workshop for the selected facilitators who will facilitate the workshops for the individual facilities. A reassessment would be conducted after a period of 6-12 months to identify the improvement made in offering a human rights-based service.

2.2.4 QualityRights E-training
The QualityRights initiative was launched in Ghana in 2018, WHO in partnership with the QualityRights Ghana team of 10 organizations comprising the Ministry of Health (Mental Health Authority and Ghana Health Services) and civil society organizations (Basic Needs Ghana, Ta-Excel Foundation, Inclusion Ghana, Christian Health Association of Ghana, Passion for Total Care, Special Olympics Ghana, Mental Health Society of Ghana, and Mind Freedom Ghana) have successfully collectively generated 2541 giving a cumulative figure of 7265 QR e-certificates since inception. The partners re-strategized due to the challenges of the COVID-19 pandemic to be able to continue their activities.
2.2.5 Bi-weekly Coordination Meetings
A biweekly coordination meeting offered the platform to review the activities of partners, strategies as well as share best practice to encourage others to learn from other partners and to motivate the entire group to attain their stated objectives.

2.2.6 QualityRights social media campaigns
An active social media campaign to create awareness on the QR Ghana website, Facebook, Instagram, and Twitter with posts, short videos on testimonials from service users, health professionals, and some celebrities on the impact of the QR training on their perception about mental illness and persons with psychosocial, intellectual disabilities. The activities on social media handles are linked to the e-training website to direct interested persons to learn about the initiative and encouraged them to enroll.

The work of the partners and the social media campaign has culminated in 17,138 people registering for the e-training, 10,542 starting the course, and 8745 people as of 15 January 2021, receiving the WHO QR e-training certificate equivalent to a Diploma certificate in Human Rights.

2.3 Nutrition and Food Safety

Introduction

Over the past decade Ghana has made some progress in nutrition, the current rates are stunting 19%, wasting 5%, underweight 11% (DHS, 2014). However, challenges also exist, the exclusive breastfeeding rate has seen reversing trends from 62.8% in 2008 to 52% in 2014 (DHS, 2008 and 2014). The MICS 2017 showed further decline to 43%. Overweight is an emerging problem particularly among urban dwellers 49% among urban women versus 28% among rural women (DHS, 2014). In the reporting year WHO provided support to the Food and Drugs Authority (FDA) to develop a National Food Safety Emergency Plan. Technical support was provided for the roll out of the training package on Infant and Young Child Feeding and Growth Assessment, the launch of the Start Right Feed Right Campaign and the development of guidance documents on nutrition and COVID-19.
Key activities, Outcomes and Achievements

2.3.1 National Food Safety Emergency Response Plan

Food Safety Emergencies are becoming a challenge within countries globally by virtue of their public health impact and economic implications. It was deemed necessary for Ghana to develop a National Emergency Response Plan as part of it’s efforts to strengthen it’s food safety alert system and to minimize the impact of foodborne disease outbreaks. The FDA with technical and financial support from WHO developed a national Food Safety Emergency Response Plan (FoSERP). The FoSERP was drafted by a Technical Committee (TC) put in place by FDA. The draft was shared with key institution for comments and subjected to a stakeholder review at a workshop. Following the workshop, participants comments were incorporated into the document. The objective of the FoSERP is to provide a coordinated and consistent inter-agency approach to prepare for, prevent, protect against, mitigate, respond to, and recover from foodborne disease outbreaks / incidents.

The FoSERP serves as an overarching national operational plan to address the full spectrum of natural and technological hazards and bioterrorist threats along the food chain into which all supporting agency emergency plans, procedural documents, and other guidance integrate. The plan clearly outlined the steps to follow in the event of a foodborne outbreak and the roles and responsibilities of the key players. It provides mechanisms for vertical and horizontal command, control and coordination. It also covers the communication mechanisms both internally and externally in fulfilment of international regulations. The detail arrangements for investigating food complaints involving food import and export are also clearly outlined. The next steps include a final stakeholder validation / adoption of the FoSERP and a dissemination meeting.

Participants at a stakeholders’ workshop  FDA official giving the opening address

2.3.2 Training of Trainers in Growth Assessment and Infant Young Child Feeding

The WHO Combined Course on Growth Assessment and Infant and Young Child Feeding (IYCF) Counselling combines the individual courses on IYCF Counseling and Growth Assessment. As effective counseling is based on correct assessment of a child’s nutritional status and feeding
practices, the course is designed to give health workers the competencies required to correctly carry out growth assessment and effectively counsel caregivers on breastfeeding and complementary feeding. In 2020, the GHS in collaboration with partners including WHO trained a core team of trainers comprising of Nutritionist, Paediatricians, Obstetricians and Midwives on the WHO adapted national Growth Assessment and Infant and Young child feeding Counselling Training Package developed with technical and financial WHO support. The training of trainers funded by the World Bank has been scaled-up to all 16 regions of Ghana.

World Breastfeeding Week 2020

The world breastfeeding week was commemorated in the first week of August. Her excellency the First Lady of the Republic of Ghana launched the “Start Right, Feed Right Campaign” -Breastmilk only for the first 6 months of life and adequate complementary thereafter. This campaign is under the Regional Campaign “Stronger with Breastmilk - Breastmilk only for the first 6 months of life” launched in Cote D’Ivoire in 2019. The Campaign was developed by the GHS with support from UNICEF and WHO. At the launch the WRai Dr. Neema Kimambo joined the UNICEF country represent in a video to advocate for early initiation of breastfeeding, exclusive breastfeeding for the first 6 months of life and timely introduction of complementary feeding.

Campaign Rationale

Children who are breastfeed exclusively in the first six months of their lives and are provided with foods with the right balance of nutrients from birth to 2 years are more likely to survive, to do better at school and be more productive throughout their lifetime as adults.

Main Objectives

1. Increase awareness of government leaders and policy makers, businesses, program managers, health workers, community support groups, families & communities, mothers and caregivers on the importance of optimal IYCF practices and the specific role each of these stakeholders can play
2. Advocate for the implementation and enforcement of code on BMS and maternity protection act.
3. Advocate for implementation of the action framework to improve diets of young children through engaging food, health, water and sanitation, and social protection systems.

The campaign was rolled out nationally in a phased manner to sustain the interest and momentum throughout the year.

3.0 PROMOTING HEALTH THROUGH THE LIFE COURSE

REPRODUCTIVE, MATERNAL, NEWBORN, CHILD & ADOLESCENT HEALTH

Introduction

Ghana’s maternal mortality ratio is currently 310 per 100,000 live births and under 5 mortality is 52 per 1000 live births. Although Ghana did not meet its MDG 4 and 5 targets, it made significant progress in reducing maternal and under 5 mortalities. The neonatal mortality rate is 25 per 1000 live births making up 68% of infant mortality and 48% of under-five mortality. Antenatal clinic attendance (at least 4 visits) is 89% with a skilled attendance at birth being 79%. Modern contraceptive prevalence rate is 25% and the unmet need for family planning is 30% with an adolescent pregnancy rate of 14.0% (GMHS 2017). The country still has high maternal, neonatal and child mortality rates in spite of the relatively good coverages of Maternal and Child health interventions. Inadequate access to quality skilled delivery, emergency obstetric and newborn care and family planning has been identified as some contributing factors.

WHO provides technical support to the Ministry of Health/Ghana Health Service (GHS) and partners for planning, implementation, monitoring and evaluation of Reproductive, Maternal, Newborn, Child and Adolescent Health (RMNCAH) programmes in the country in line with the Global Strategy for Women’s, Children’s and Adolescents’ Health (GSWCAH) 2016 - 2030. WHO is working to improve access to, coverage and quality of health services for pregnant women, newborns, children and adolescents along the continuum of care.

The RMNCAH program will continue to support the achievement of the health-related Sustainable Development Goals by supporting country adoption and adaptation of various WHO guidelines.
and strategies for implementation as well as the development of national strategic documents and capacity building of health workers.

**Key Activities, Outcomes and Achievements**

3.1. Development, launch and dissemination of the National Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAH&N) Strategic Plan

To accelerate efforts to reduce the high maternal and child mortality rates in the country, there are a number of protocols and guidelines in Reproductive, Maternal, Newborn, Child and Adolescent Health (RMNCAH) to guide clinical practice. Ghana has a number of strategies which are being implemented for Maternal Health, Child Health, Newborn Health, Adolescent Health and Family planning separately. There was the need for the development of an integrated Reproductive, Maternal, Newborn, Child and Adolescent Health (RMNCAH) Plan to guide and coordinate efforts at adapting and implementing the Global Strategy for Women, Children and Adolescent Health; 2016 – 2030 (GSWCAH) to achieve the SDGs, particularly Goal 3.

Support was provided to the Ministry of Health (MOH) and Ghana Health Service (GHS) to develop, launch and disseminate the National Integrated Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAHN) Strategic Plan. The Strategic Plan was launched by the deputy Minister of Health (Hon. Tina Mensah) on behalf of the Honourable Minister of Health and had good participation from all the 16 Regional Health Directorates and stakeholders in RMNCAHN. The launch was hosted by the Director General of the Ghana Health Service (Dr Patrick Kuma Aboagye) and chaired by the Ghana Health Service Council Chair. This is the first integrated RMNCAHN Strategic Plan developed by the country that has merged the various health and nutrition strategies in line with the Global Strategy for Women, Children and Adolescents Health; 2016 – 2030 (GSWCAH). It followed a comprehensive Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAHN) program review which was conducted using the WHO RMNCAH Program Review Tool to inform policy and programmatic strategic plans. The efforts of the H6 partnership in Ghana (WHO, UNICEF, UNFPA, UNAIDS, WB) was leveraged to support the government. The activity was supported with a grant from the global H6 Partnership/PMNCH and the in-country H6 partners with additional financial assistance from WHO and UNICEF.
3.2 Maintaining essential Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAHN) services amid the COVID-19 Pandemic

The response to the COVID-19 pandemic put great demand on the health system and it was important that amid the response a coordinated action was taken to maintain and guide essential health service delivery particularly for Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAHN). WHO together with other partners provided support to the Family Health Division of the Ghana Health Service to develop guidance on Reproductive, Maternal, Newborn, Child and Adolescent Health and Nutrition (RMNCAHN) Service delivery in the country during the COVID-19 pandemic. This provided a coordinated action to maintain and guide essential health service delivery. The guidelines cover Antenatal care, Intrapartum care, postnatal care, Child Welfare Clinic and Family Planning services and has key messages to ensure safe and quality service delivery with a minimal risk of transmission of the Corona Virus. Its implementation enabled the country to maintain essential health services for Women and Children amid the COVID-19 Pandemic after an initial dip in service utilization.
This support was highlighted during the visit of the United Nations Deputy Secretary General (Ms. Amina J. Mohammed) to Ghana. During the visit, the UN DSG interacted with healthcare staff at a facility (Adabraka Polyclinic) on how the various guidance documents have been utilized, the changes or redesigning of service delivery that had taken place and the impact on uptake for RMNCAH services during the pandemic.
Demonstration of work at a health facility to the United Nations’ Deputy Secretary General in Ghana

United Nations’ Deputy Secretary General interacting with postnatal clients in a health facility in Ghana
The Society of Obstetricians and Gynaecologists of Ghana (SOGOG) which is the country wing of the International Federation of Obstetrics and Gynecology (FIGO) was also supported to develop clinical practice guidelines for clinicians in obstetrics and gynaecology in Ghana in the context of the COVID-19 pandemic. This provides context-appropriate guidelines in order to safeguard favourable outcomes for women and their babies as well as ensure providers’ safety in the context of the COVID-19 pandemic.

3.3 Improving the Quality of Care for Maternal, Newborn and Child Health

Ghana has achieved a relatively good coverage rates for maternal, newborn and child health interventions. In spite of this, the country has high numbers of preventable maternal and neonatal deaths and sub-optimal quality of care has been identified as a key factor in this. The country is among eleven countries who have committed to the Global Network to improve the Quality of Care (QOC) for Maternal, Newborn and Child Health (MNCH) to ultimately reduce preventable maternal, newborn and child deaths to achieve the health targets of the SDGs. The other countries are Bangladesh, Côte d’Ivoire, Ethiopia, India, Kenya, Malawi, Nigeria, Sierra Leone, Tanzania, and Uganda.

The WHO supported the Ministry of Health (MOH) and Ghana Health Service (GHS) to coordinate the national mechanisms for implementing Quality of Care for Maternal, Newborn and Child Health through the national Technical Working Group (TWG) for QOC-MNCH. The TWG comprise of multi-stakeholders drawn from the MOH, GHS and Partners (WHO, UNICEF, JICA, UBORA Institute, JHPIEGO, PATH/MEBCI, USAID).

Continuous support has been provided to the country for the implementation of the WHO Standards for Quality of Care for Maternal, Newborn and Child Health in five regions in collaboration with UNICEF (Ashanti region, Western region, Bono region, Upper East region and Upper west region) through trainings and coaching. These five regions are implementing Quality Improvement (QI) interventions in their learning sites. The capacity of national and sub-national level trainers has been built to support downstream trainings across the five network regions. They were reoriented on the QOC strategic objectives, the newly launched GHS guidelines for implementation of the National Healthcare Quality Strategy and the role of the teams in the
accomplishment of the QOC for MNCH. Over a hundred (110) Quality Improvement coaches and trainers in 31 districts have acquired additional knowledge and skills as QI coaches to support district and facility QI teams to improve quality of care.

Training of national and sub-national trainers

Trainers supported the downstream Point of Care Quality Improvement (POCQI) trainings for 108 QI teams in health facilities. They have also supported coaching and supportive supervision of QI activities in their regions. The outcome of the trainings has been the implementation of several quality improvement interventions by health facilities and districts. The MNCH intervention packages include Essential Newborn Care, Kangaroo Mother Care, WASH/Infection Prevention and Control, Helping Babies Breathe, Postnatal care counselling, Partograph use and Maternal and Perinatal Death Surveillance and Response (MPDSR). The National Roadmap for Maternal and Newborn Health and the Implementation Guide developed with support from WHO and other partners are being used in conjunction with the National Healthcare Quality Strategy to improve the quality of healthcare services particularly for mothers and newborns beyond the five regions.
Point of Care Quality Improvement Training at the Regional Level
3.4 Community engagement in improving quality of healthcare: Community Scorecard trainings

Improving quality of maternal, newborn and child healthcare involves ensuring patient’s positive experience of care. The Ghana Community Scorecard is a tool for strengthening the concept of patient’s experience of care in health facilities. It is a management, action, accountability and advocacy tool used by community members to assess the quality of health service delivery in their communities. It empowers communities to take active part in the monitoring of health services in their communities and provides the needed platforms to develop actions for key stakeholders to address gaps in healthcare delivery.

The capacity of the Community Health Management Committees (CHMC), the regional, district and facility level leadership were built in the use of the Community Scorecard (CSC) to improve the experience of care especially for Maternal, Newborn and Child Health (MNCH). As part of improving community ownership and commitment to the QoC initiative and strengthening health systems, WHO supported the Ghana Health Service to upscale the community score card initiative across more regions and districts. Hundred (100) trainers were trained virtually from the five Network regions (Upper East, Bono East, Ashanti, Upper West, Western regions) and three additional implementing regions (Northern, North East, Savannah regions). The regional trainers for the community score card was assisted in downstream trainings of District Health Management Teams, health facility managements and Community Health Management Teams (CHMT). Overall, 46 Districts, 300 Health facilities, 300 Community Health Management Committees and about 3600 community members were involved.
3.5 Private sector engagement in the provision of quality Maternal, Newborn and Child health services

To achieve a greater impact of the drive to improve the quality of care for maternal, newborn and child health, it is critical that both the public and private health service delivery systems are engaged. WHO supported the Ministry of Health to conduct an exploratory study on the mechanisms for engaging the private sector in planning, delivering and demonstrating accountability for quality maternal and child health services. This study provides insights into how to effectively engage and sustain private sector involvement in delivering quality care. A multi-Stakeholder policy dialogue following this will generate recommendations that will help guide the involvement of the private sector in the provision of quality maternal and child health services in Ghana and in all the countries in the Global Network for improving the quality of care for maternal, newborn and child health. The process involved the various private health sector groups in the country including the Society of Private Medical and Dental Practitioners (SPDMP), Ghana Association of Quasi Healthcare Institutions (GAQHI), Christian Health Association of Ghana (CHAG), Ahmadiyya Muslim Missions and private practitioners.
3.6 National Newborn Stakeholders’ Conference and observation of Child Health Promotion Week to deliver integrated child survival interventions

Ghana’s neonatal mortality rate according to the 2017 Ghana Maternal Health Survey is 25 per 1000 live births. This still makes up 68% of infant mortality and 48% of under-five mortality. Annual National Newborn Stakeholders meetings are held to take stock of the progress of implementation of the National Newborn Healthcare Strategy and develop action plans for the following year. Due to the response to the COVID-19 pandemic and its attendant restrictions, the 2020 National Newborn Stakeholders conference was held virtually. WHO provided technical support and made the theme presentation on “Newborn health during Public Health Emergencies”.

The African Vaccination week and Child Health Promotion week were also commemorated to promote integrated service delivery to improve coverage of preventive child survival interventions like Immunization, Vitamin A Supplementation, Growth monitoring, birth registration and promotion of ITN use. It was used as a week of advocacy, awareness creation and for service delivery while maintaining the COVID-19 prevention protocols.

3.7 Gender, Equity and Human rights

In collaboration with the UN Gender Team, gender related UN Days were observed to raise awareness on gender issues and to promote gender mainstreaming. These included the International Women’s Day, the International Day of the Girl Child, International day for the Elimination of Violence against Women and 16 days of activism against Gender Based Violence from 25 November 2020 to 10 December 2020.

3.3 Environment and Health

In Ghana access to basic drinking water is a 78% whilst access to sanitation is 14% (DHS, 2014). The MICS 2017 provides national data on the WASH SDGs baseline and targets for SDGs. Basic services for water is 79%, Basic Sanitation 21% and Basic Hygiene 48%. In terms of the higher service ladder of safely managed WASH services, for drinking water 19% was reported but there was not sufficient data to calculate safely managed sanitation and hygiene services (MICS 2017). Sanitation is one of biggest challenges facing Ghana due to its low coverage with 22% of the population still practicing open defecation (MICS, 2017). Currently WASH in Healthcare
Facilities (HCF) is being championed by WHO and UNICEF. MOH has developed a WASH-HCF Strategy and the GHS has technical guidelines to that effect.

In the year in review, WHO supported an assessment of WASH services in COVID-19 Treatment centres, the Healthcare Waste Management Policy and Guidelines were finalized and printed with WHO support and launched by the Honourable Deputy Minister for Health. The National Plan of Action for the Reduction of the Use of Mercury in Small Scale Mining was also finalized.

### 3.3.1 WASH Assessments in Health Facilities

WASH services are fundamental in the prevention and control of infection; and prevention of hospital acquired infections. The COVID-19 pandemic has shown the critical role WASH in Health facilities plays in this regard. WHO has developed the Water Sanitation and Health Assessment Tool (WASH-FIT) which facilitates the assessment of WASH services in health facilities in four (4) main domains; water, sanitation, hygiene and management. WHO supported the GHS, led by the Institutional Care Division (ICD) to conduct an assessment of WASH in 7 COVID-19 Treatment Centres (TCs).

The objectives of the assessment were the following:

- Determine the availability and type of water services in all the units
- Determine hand hygiene facilities available eg. practices, job aids/posters
- Identify the number and type of sanitation services at the treatment centres
- Explore managerial practices related to WASH in these facilities
- Recognize waste management practices at these centres.

The strongest component in terms of availability of WASH services was water with 57% of the facilities meeting all indicators assessed, for the other three domains, i.e. sanitation and health care waste, hygiene and management none met the target for all indicators assessed. In sanitation and waste care two (2) of the treatment centers (TCs) 29% met more than half of the indicators, Similarly for Hygiene 5 TCs and for Management 6 TCs 71% and 86% respectively met half or more of the indicators. Feedback and recommendations were provided to all the treatment centres assessed and some logistic and supplies provided to fill in some of the gaps.
3.3.2 Launch of the Healthcare Waste Management Policy and Guidelines

Healthcare waste management practices reduce the spread of infection both at the health facility level and beyond. The GEF Healthcare Waste Management and Reduction of Mercury Releases in the Health Sector was successfully implemented by UNDP in collaboration with WHO and Healthcare without Harm. The National Healthcare Waste Policy and Guidelines developed and printed with WHO support were officially launched by the Honourable Deputy Minister for Health during the year in review. The policy and guidelines were disseminated to health facilities for the management of healthcare waste during COVID-19 outbreak. The project closures activities were implemented, and this included a stakeholder dissemination of lessons learned.
3.4 Urban Health Initiative (UHI)

Introduction

WHO has been implementing the “Urban Health and SLCP Reduction project” in Accra in collaboration with ICLEI, UN-Habitat, Ghana EPA, Ghana Health Service and the Accra Metropolitan Assembly as main international and project partners. The activities of the UHI pilot project seeks to promote the implementation of SLCP reduction strategies by mobilizing and empowering the health sector, building on its influential position, and by demonstrating the full range of health benefits that can be achieved from implementing SLCP reduction strategies, particularly at the city level. Air pollution is associated with higher risk of death from cardiovascular and respiratory diseases. In many cases, air pollution acts to exacerbate pre-existing conditions such as asthma and other heart diseases. According to figures from WHO, about 203 out of every 100,000 deaths in Ghana are air pollution-related. The major sources of pollution in Ghana include: poor land use, emissions from the transport sector (due to low quality fuels, over aged vehicles, poorly maintained vehicles), poor cooking technologies and poor waste management practices and land-use planning. Furthermore, over 73% of people in Ghana still
depend on solid fuel such as wood and charcoal for cooking, thereby contributing to the increasing levels of both indoor and ambient air pollution in the country.

Unfortunately, Ghana does not have policy regimes to regulate pollution levels from these major sources to curtail the impact on the country’s disease and economic burden. In this context, the Urban Health Initiative – BreatheLife Accra campaign sought to support respective state agencies develop air pollution guidelines and climate action plans to help improve air quality and its associated disease burden in the country. Unlike with malaria, polio, and Covid-19, the relation between health, environmental factors and air pollution was not widely thematized in Ghana’s public discourse. Awareness about the negative health impact of certain household practices in the country was also very low.

3.4.1 Awareness Creation Initiatives

WCO Ghana aimed to ensure a participatory process by crafting specific key messages and having directed communication with each economic livelihood group in the communities, and by openly welcoming all contributions of the groups into the project. For example, food vendors and fish mongers who were mostly females as well as the scrap dealers (predominantly male) and waste management companies were engaged rigorously to solicit their views on their practices and understand the underlying reasons. The Urban Health Initiative – BreatheLife Accra campaign has led to increased community awareness and increased capacity to demand interventions from city authorities on triggers of air pollution within their communities. For example, factories and dumpsites that were major contributing factors to pollution in the city has been closed through community’s activism and traditional authority actions.

3.4.2 Capacity and Results Dissemination Workshops

Within the period under review, the UHI project organized series of capacity and results dissemination workshops with major media in the country to increase advocacy and public awareness through media and stakeholder engagement. Through these engagements, the Environmental Protection Agency increased the number of Air Quality Monitoring sites from 15 within Accra Metropolitan Assembly to 32 monitoring sites to cover pollution levels from other cities within the country to inform holistic policy decisions. These engagements led to the rating of waste management companies within the Greater Accra Metropolitan Area to improve waste
segregation, timely waste collection and improved collaboration between the informal waste managers and formal waste management sectors.

### 3.4.3 Development of Strategic Documents

To ensure a coordinated vertical integration of best practices and recommendations of the project into government development plans, the UHI project with generated evidence from various researches and review of country data to develop strategic documents and guidelines (Air Quality Management Plan, Resilience Strategy and Climate Action Plans) to support the fight against climate change and air pollution. The project developed health issue briefs, published on the WHO website and shared with partners guidelines on business as usual-, best- and worst-case scenarios on the attribution and contribution of poor land use planning, poor waste management practices, poor household energy sources and unregulated transport sector would have on the country’s disease burden whether actions or no actions are taken. Some these reports include:

1. Health and Economic impacts of Transport Interventions in Accra, Ghana. This report is already published on the WHO website: https://apps.who.int/iris/handle/10665/338963
2. Ambient Air Pollution and Health in Accra, Ghana
3. Economic Costs of Air Pollution in Accra, Ghana
4. Health Issue Brief on Sustainable Transport for Health in Accra, Ghana
5. Evidence-Based Strategies to Reduce the Burden of Household Air Pollution in Accra, Ghana
6. Health and Economic impact of Waste management interventions in Accra
7. Health Issue Brief on Sustainable Waste Management for Health in Accra, Ghana

These reports are to serve as guidelines for government and development partners in Ghana to clearly identify and prioritize investments to reduce the health and economic burden of such activities on the general population. These guidelines will also provide evidence for medium-term development planning for the various sectors concerned.
3.4.4 Environment and Climate Change

WHO, UNICEF, UNDP and UNV in partnership with the Okyeman Environment Foundation have secured funding from the UN-Human Security to implement actions on “Accelerating the SDGs through a multi-stakeholder community-based approach to sustainable livelihoods and well-being. This project aims at supporting the Okyeman initiative on Fostering Reforestation, Environmental Sustainability and Tourism in the Okyeman Area (FOREST Okyeman). The project is a 36-month project, requesting USD 1 Million from UN-Human Security with a counterpart funding of USD 3 Million.

WHO HQ and WCO in partnership with Ghana Health Service have submitted an expression of interest and a concept note to the National Designated Authority (NDA) of Ministry of Finance for the Green Climate Fund Readiness and Preparatory facility to support the health sector develop climate centered actions to combat environment and climate change impacts on the sector. The GCF provides capacity building and technical assistance support to developing countries to enhance access to climate finance through the Readiness and Preparatory Support Programme. The Readiness Programme is mandated by the Governing Instrument of GCF to provide resources for strengthening institutional capacities, governance mechanisms, and planning and programming frameworks to identify and implement a transformational long-term climate action agenda for developing countries.

3.5 Celebration of Official Health Days

Due to the COVID pandemic and public health measures put in place by the Government, activities for official health day celebrations (World TB Day, World Malaria Day, World Health Day, World Blood Donor Day, World No Tobacco Day) were online events (press conferences, Webinars) and wider dissemination of posters, press releases and infographics and other awareness creation materials.

3.5.1 World Diabetes Day

World Diabetes Day was celebrated under the theme “The nurse and Diabetes”. The Diabetes Association of Ghana in collaboration with the Ministry of Health and the Keep Fi Associations in Ghana organized a 10 km walk to create awareness on the critical role of physical activity in the
overall improvement in diabetes management. Event was well attended by WHO Acting Country Representative, Dr Neema Kimambo and other WHO Staff.

Speaking at the event, Dr Kimambo emphasized the key role nurses play in providing lifelong care for people with diabetes, including screening, regular check-ups, psychological support and information on self-management and healthy living.

Dr Kimambo said that nurses and other health workers also needed to be enabled to play their roles in diabetes prevention and management, including being provided with training, equipment and conditions of service that create a conducive work environment.

She concluded by charging all to take actions to prevent diabetes by maintaining a healthy lifestyle, including avoiding sugary drinks, processed foods, tobacco and alcohol, and doing around three hours of physical activity every week, like walking, dancing or playing sport.

*Dr Kimambo participating in the walk and also making a brief statement at the event*
4.0 Health Systems
4.1 Health Financing and Human Resource for Health

Introduction
National Health Accounts (NHA) is a tool being used today in most low- and middle-income countries. The NHA is a process through which countries monitor the flow of money in their health sector. It is generally agreed that countries “cannot manage what they cannot measure”. Thus, policy makers in Member States and stakeholders are progressively more aware of the value of tracking resources for health. Through Health Accounts Country Platform, WHO provides countries with the framework, tools and technical support to institutionalize and set up a harmonized, integrated platform for annual and timely collection of health expenditure data. This serves to strengthen the capacity of the health account team in the country to report health expenditures using the global standard, the System of Health Accounts (SHA 2011), and to analyse and produce data relevant for national planning purposes. Health accounts deliver means to learn retrospectively from past expenditure, improving planning and allocation of resources and increasing systems accountability. This aims to help member states protect its people from catastrophic health bills, reduce inequities in health and make definitive strides towards universal health coverage (UHC).

Key Activities, Outcomes and Achievements

4.1.1 Capacity building in Health Accounts Production Tool
In ensuring that policymakers are well informed in their policy decisions, Ghana over the years have tried to institutionalize the Health Account process by producing annual health accounts reports. The aim is to generate as much information as possible for decision-making. Currently it tracks spending on all diseases categorized using the National Health Accounts Producer Manual. There has been remarkable progress in capacity and estimation techniques since the first attempt made by the Ghana National Health Accounts Team in using SHA 2011 methodology (used in the 2012 NHA report).

Notwithstanding, the NHA country team has been experiencing delays in data collection on health spending from non-state actors (such as CSOs, donors, nongovernmental organizations (NGOs), private companies, insurance providers). This is due to the limited knowledge and understanding of the SHA 2011 which tracks all health spending in a given country over a defined period of time regardless of the entity or institution that financed and managed that spending.
Successful collection, analysis and reporting of NHAs, is very much dependent on specific technical expertise, orientation and processes. This requires a need to increase country capacities in SHA 2011 and shared understanding of how to use the NHA as a monitoring and evaluation tool to track changes in policy priorities and if the introduction of reforms and new programs resulted in changes in health resources allocation and expenditure. At the Government side, there is the need to institute an effective succession planning through the creation of pool of experts to support/ facilitate annual data collection, analysis and reporting of NHA.

It is in this regard that the WHO-Ghana, with funding from AFRO, organized a 2-week long training workshop aimed at further building capacity of country stakeholders, especially CSOs and private sector in National Health Account for Universal Health Coverage (UHC), with particular focus on the core accounting framework organized around a tri-axial system for the recording of health care expenditure, namely classifications of the functions of health care (ICHA-HC), health care provision (ICHA-HP), and financing schemes (ICHA-HF).

Twenty-five participants for the workshop were drawn from the Ministry of Health (MoH), Ghana Health Service (GHS), National Health Insurance Authority (NHIA), Teaching Hospitals, School of Public Health - University of Ghana, Ghana Statistical Service (GSS), the Health Facilities Regulatory Agency (HeFRA), The Christian Health Association of Ghana (CHAG), The Mental Health Authority (MHA) and the World Health Organization (WHO).

The training targeted at the private sector, CSOs actors was conducted virtually due to the COVID-19 Pandemic. The structure of the training was based on abridged version of the standard National Health Accounts training manual. The capacity building event benefited representatives from the following organizations- Ghana Coalition of NGOs in Health, Association of Ghana Industries, Association of Bankers, Ghana Employers Association, Ghana Pharmaceutical Society, Ghana National Chamber of Commerce and Industry, Ghana insurers association, Ghana Chamber of Mines, Private Enterprise Federation, Ghana Hotels Association, Pharmaceutical Manufacturers Association of Ghana, Ghana Chamber of Pharmacy, Society of Private Medical and Dental Practitioners and Private Health Insurance.

The workshop set the stage for an expanded Technical Working Group (TWG) as a means of strengthening the quality of the NHA report for decision making. The TWG could also benefit from hands-on analytical support from partnership with academia. This could easily be combined
with partnership initiatives with existing players (such as the Ghana Statistical Service-GSS) would benefit from additional data collection and validation, research and reporting.

4.2 Essential Drugs and Medicines

Introduction

World Health Organization (WHO) Regulatory Systems Strengthening (RSS) Team of the Department of Regulation and Prequalification (RPQ) led a team of international experts to conduct the benchmarking of the national regulatory system of Ghana, represented by the Food and Drugs Authority (FDA) Ghana. The benchmarking was conducted in the area of regulation of medicines and vaccines from 25 to 29 March 2019 in close collaboration with the WHO Regional Office for Africa and the WHO Country Office in Ghana. The benchmarking is part of the WHO programme for regulatory system strengthening and builds upon previous assessments conducted between 2013 and 2015, as well as WHO capacity building activities organized for FDA Ghana over the years. Several areas for improvement were identified as a result of the benchmarking in March 2019. An institutional development plan (IDP) was formulated to guide FDA Ghana on required improvements. WHO and FDA Ghana were in contact since the benchmarking mission in March 2019 to address outstanding issues and recommendations. During the follow up visit to FDA Ghana from 11 to 12 February 2020 and subsequent virtual meetings in March and April 2020, the WHO RSS team confirmed that FDA Ghana had implemented all recommendations and met indicators that define a maturity level three (3) regulatory system on a scale of one to four.

In November 2019, the WHO Director General and the President of the African Commission signed a Memorandum covering three main areas of collaboration including WHO’s support to the establishment of the African Medicines Agency (AMA). At least fifteen (15) Member states were expected to fully ratify the Treaty for the AMA to be put in place. The AMA was established as a specialized Agency of the African Union. The objectives were to enhance capacity of States Parties and RECs to regulate medical products in order to improve access to quality, safe and efficacious medical products on the continent.
Key Activities, Outcomes and Achievements

4.2.1 Ghana’s National Regulatory Agency, the Food and Drug Authority attains WHO Maturity Level 3 and Ghana ratifies African Medicine Agency (AMA) Treaty

Ghana’s Food and Drug Authority achieved maturity level three (3) that took effect from 15 April 2020 following the implementation of all critical recommendations. With support of WHO and other partners, Ghana FDA strengthened its expertise, streamlined processes and resources up to maturity level 3 by WHO classification.

There are four levels of regulatory systems’ maturity starting from level 1, where only some elements of regulation exist, and up to 4 corresponding to the advanced regulatory system. Level 3 indicates that the system is well functioning and integrates all required elements to guarantee its stable performance.

The World Health Organization benchmarked the Ghana regulatory systems for medicines in 2014, 2015, and 2019. The benchmarking process is informed by a set of stringent criteria, which includes 268 sub-indicators across essential and product-specific functions, such as marketing authorisation, clinical trials, pharmacovigilance, licensing of pharmaceutical establishments, regulatory inspections, quality control laboratories, market surveillance and control, lot release and a special integrated indicator for the regulatory system.

Benchmarking of Ghana regulation identified strengths as well as areas for improvement. At the same time, development of an Institutional Development Plan (IDP) allowed to build on strengths and address areas for improvement. Afterwards, the WHO provided technical support in the implementation of the IDP followed by continued monitoring of progress and outcome/impact.
4.2.2 Ghana Ratifies the African Medicines Agency Treaty

WHO engaged with and supported the MOH in facilitating the documentation of ratification of the African Medicines Agency (AMA) Treaty. The treaty was ratified by the parliament of Ghana in August 2020 and forwarded to the Ministry of Foreign Affairs and Regional Integration who appropriated actions towards the ratification process for Ghana and for onward communication to the AU.

4.2.1 Antimicrobial Resistance (AMR) National Action Plan Implementation

Introduction

The 68th World Health Assembly 2015 endorsed the Global Action Plan (GAP) to tackle the growing problem of antimicrobial resistance (AMR). AMR poses threat to food security and achievement of Sustainable Development Goals (SDGs). Access to safe and effective antimicrobials could become a challenge and hence, a barrier to attaining Universal Health Coverage (UHC) because of treatment failures due to AMR.

The WHO in 2020 strategically collaborated with country tripartite colleagues and provided technical and financial support to implement intervention in the national action plan (NAP) on AMR. Key among activities carried out included the rapid mid-term review of the NAP;
strengthening governance activities, education and awareness creation, implementation of the SORT IT and the Extended Spectrum Beta Lactamase (ESBL) *E.coli* project among others.

Antimicrobial use and resistance activities are part of ongoing efforts to implement global and national action plans to tackle AMR and aligns with WHO’s GPW 13.

**Mid-term rapid review of the implementation of the NAP.**
The AMR Policy and National Action Plan recommends a mid-term evaluation of implementation. The WHO in 2020 supported the national AMR Secretariat to conduct a rapid midterm assessment to determine the level of implementation, identify gaps/challenges and make the appropriate recommendation for follow up. At the end of the assessment, 34% of the activities are on-going, 60% of the activities had no funding and therefore no attention, and only 6% of activities are completed.

![Graphical presentation of the level of implementation of Ghana AMR NAP mid-term review, 2020](attachment:image.png)

The review recommended for an independent external reviewer to conduct an in-depth assessment of the policy and NAP to identify challenges to its implementation in one health.
4.2.2.2 **Support to strengthen governance on AMR activities**

The multi sectoral nature of AMR requires a one-health approach to mitigating AMR with effective coordination across all actors. The concept of one-health recommends a comprehensive approach to health issues in environment, human and animal sectors underpinned by good governance structures, effective collaboration, coordination, communication and information sharing across and among affected sectors. A national AMR Secretariat with the mandated to coordinate the implementation of AMR activities is established in the Ministry of Health; the mother agency on AMR issues.

The WHO presented IT equipment to the AMR Secretariat to support governance and effective coordination of AMR interventions and the implementation of NAP. WHO also provided technical support to develop terms of reference for the Secretariat and the Inter-Ministerial Committee to strengthen governance mechanisms on AMR.

*Dr George Hedidor on behalf of the WHO (first right), presenting the items to the Chief Program Officer for Pharmacy; Mrs Joycelyn Azeez (first left) at the Ministry of Health.*
4.2.2.3 Education and Awareness Creation on AMR

**Training Workshop for Civil Society Organizations (CSOs) In Health On AMR**

Civil Society Organisations’ structure has developed into a coalition of non-governmental organisations with various specialties in specific areas of health. They play key roles in community education on general and specific health issues within their constituents at the community level. Leveraging on these roles and structures, WHO in collaboration with the AMR national platform trained 35 representatives of civil society organisations on responsible use of antimicrobials and antimicrobial resistance in one health. The training aimed at building capacity of these CSOs to include antimicrobial use themes in their health promotion activities in a language that targets behavioural change necessary for containing resistance. Participants were also supported with training and IEC materials for reference.
Engagement of Professional Bodies on AMR
The Emergency Centre for Transboundary Animal Diseases (ECTAD) of the FAO Ghana in collaboration with the AMR Platform, engaged professional bodies from the Ghana Veterinary Medical Association, the Ghana Medical Association, and the Environmental Protection Agency on antimicrobial resistance in a 2-day trainer the trainer workshop. This activity responds to the strategic objective one of the national action plan on antimicrobial resistance. The WHO provided technical support with the organisation and facilitated the training sessions.

World Antimicrobial Awareness Week Celebrations
The WHO continues to support with the annual celebration of awareness on antimicrobial resistance. WHO supported with the planning of activities and coordinated meetings in one health. Activities for the period included the official launch of activities, engagement of market women at Kasoa in the Central Region and training of media and livestock farmers in the coming year.

In collaboration with FAO, the AMR platform and Health Keepers Network, over 250 market women were reached with the message on responsible use of antimicrobials at an open-air event.
The ministry of health hosted a hybrid official launch of the 2020 WAAW celebrations with key persons attending physically and others virtually due to the COVID interventions. Statements were received from the Deputy Minister for Health, the Deputy Representative for the Africa Regional Office for FAO and the representative of the WHO. The theme for the year was “United to preserve antimicrobials”; which sought to drive the message of AMR in the spirit of One Health.
Strengthening Infection Prevention and Control (IPC) Practices and AMR among Frontline healthcare providers as part of Covid-19 response

The strategic objective three of the Ghana National Action Plan (NAP) on antimicrobial use and resistance recommends the implementation of the MoH Infection Prevention and Control (IPC) policy as part of interventions in all health facilities to curtail antimicrobial resistance. Antimicrobials are used among treatment options with little or no evidence for efficacy, further risking the development of resistance to antimicrobial. The COVID 19 pandemic brought to bear the need to strengthen IPC practices to reduce patients to patient and patient to caregiver transmission, thereby improving recovery of infected persons as well as reducing hospital acquired infections. Effective and appropriate IPC practice is key to reduction of infection transmission, responsible use of antimicrobials and the prevention of antimicrobial resistance. Frontline health workers with limited skills in IPC may be less confident and less equipped to render care to infected persons. The WHO supported the Ghana Health Service to build capacity for 103 clinical and 49 non-clinical frontline staff from 22 districts in the Western Region on effective IPC practices, responsible use of antimicrobials, the national action plan on AMR and IPC linkages to antimicrobial resistance. The is 3-day workshop form part of activities in response to interventions to curtail COVID 19.

Structured Operational Research Initiative (SORT IT)

The Special Programme for Research and Training in Tropical Diseases (TDR) approach to AMR is aligned with the five strategic objectives of the Global Action Plan on AMR. TDR initiated the Structured Operational Research Initiative (SORT IT) program to conduct and publish operational research especially among frontline workers whose regular activity generate data. SORT IT aims at making countries “data rich, information rich and action rich”. This is in direct response to the second strategic objective of the global action plan on AMR, which seeks to strengthen knowledge through surveillance and research,

WHO/TDR is supporting four candidates in the first Africa Regional SORT IT workshop to build capacity for operational research to support evidence generation for policy decision on antimicrobials and antimicrobial resistance in one health.

The Environmental Protection Agency (EPA) in Accra, Ghana, launched a program to monitor
ambient air quality at selected industrial, residential, commercial and urban roadside in Accra. In the light of the emergence of AMR, the EPA included the monitoring of antibiotic resistant bacteria in ambient air to the program.

The WHO Country office in Ghana supported the EPA candidate with laboratory consumables and field support to complete the research protocol on “Assessing the presence and antibiotics resistance profile of bacterial isolates in ambient air in urban Accra”.

![Image](image-url)

*Dr George Hedidor on behalf of the WHO presenting the items to Mr Ludwick Henaku (middle) and Mr Hopeson Agyepong (right) of the EPA*

**Extended Spectrum Beta Lactamase *E.coli* Tricycle project**

As part of activities to respond to strategic objective two of the global and national action plans on
AMR to generate evidence through surveillance, the WHO in one health initiated the Extended Spectrum Beta Lactamase Escherichia coli (ESBL- E coli) tricycle project in 2018. The project aims at providing a common and simplified multi sectoral surveillance system to detect and measure the prevalence of ESBL producing *Escherichia coli* in human, animal and environmental health.

The WHO country office supported the Veterinary Services Directorate, the Council for Scientific and Industrial Research – Water Division and the National Public Health Reference Laboratory to implement this project in animal, environment and human health respectively. This is aimed at supporting the country to establish a surveillance system using E.coli as proxy. 177 and 56 positive *ESBL E. coli* isolates from the environment and animal health respectively have been isolated for whole genome sequencing and full antimicrobial susceptibility test in 2021. The results of this test will be included in the WHO GLASS surveillance database.

**World Patient Safety Day 2020**

The 72nd World Health Assembly (WHA) in May 2019 adopted WHA resolution WHA72.6 ‘Global Action on Patient Safety’, which recognized Patient Safety as a Global Health Priority, and also endorsed the establishment of World Patient Safety Day to be observed annually on 17th September. The origin of the Day is firmly grounded in the fundamental principle of medicine – First, do no harm.

The World Patient Safety Day (WPSD) 2020 was commemorated in Ghana at a National Patient Safety and Healthcare Quality Conference held on 17 and 18 September 2020 in Accra hosted by the Ghana Health Service. The theme for the conference was ‘Health worker safety, A Priority for Patient Safety’. WHO supported the conference by giving the keynote address, making a presentation on the theme and participating in a panel discussion on the topic “Designing Health Systems for Quality and Safety”.

The key note address emphasized the need to engage multiple stakeholders and adopt multimodal strategies to improve safety of health worker and patients and highlighted the fact that collaboration, open communication between multi-disciplinary health-care teams, patient organisations, and professional associations were essential components in strengthening health
systems to achieve Universal Health Care. The thematic presentation introduced the WHO Health Worker Safety Charter, calling on countries to endorse the charter.

The Ghana Health Service Guidelines for the implementation of the National Healthcare Quality Strategy was launched. The conclusions from the workshop among others were that Ghana would adopt the Health Worker Safety Charter as part of the health sector’s Occupational Health Safety Policy Guidelines.
Panelists for the parallel session on the topic Designing Health Systems for Quality and Safety

**Traditional Medicine Day Celebration 2020**

The WHO Regional Committee for Africa Adopted Resolution AF/RC50/R3 in connection to the 2002-2023 Traditional Medicine strategy. The Resolution strategically focused on advocacy, government recognition of traditional medicine, institutionalization and building of partnerships for traditional medicine. WHO supported and participated in Ghana 18th African Traditional Medicine Day Commemoration and 21st Traditional Medicine Week celebration held at a one-day event in Accra. The usual week-long celebration could not take place as a result of the COVID-19. In attendance were representatives from MOH, WHO, WAHO, Traditional medicine practitioners and associations and the media. The theme for the day was “Two decades of African Traditional Medicine. 2001 -2020. What progress in Countries”. Statements were received from WHO, MOH, WAHO and Traditional Medicine Practitioners Associations. The progress of traditional medicine practice in Ghana and the Africa Region was highlighted in the speeches by WHO, MOH and WAHO. Some of the achievements in Ghana include successfully integrated traditional medicine in forty (40) selected hospitals, BSc Herbal medicine program established to train Medical Herbalists, Review of Recommended Herbal Medicines List, Update of Monographs and Pharmacopeia.
4.3 Service Delivery: Ensuring continuity of service

Introduction

Due to fear of contracting of COVID-19 and challenges faced by facilities to deliver services, health service uptake has shown significant decrement. Following this, WCO started to work with GHS on improving the scenario and as well mobilized USD 160,000 from UN Multi-Partner Trust Fund (MPT fund).

Key Activities, Outcomes and Achievements

4.3.1 Orientation of Health Workers on Guidelines

A Guidance document to ensure continuity of service delivery during disease outbreaks in general and COVID-19 in particular was developed in partnership with the Ghana Health Service.

Soft copies of the Guidance Document to guide health workers and managers in ensuring continuity of essential health during disease outbreaks were shared with all Regional Health Directorates. Hard copies are being printed for distribution to all service delivery points nationwide.

A total number of 645 health workers made up of 155 males and 490 females, from 140 health facilities in the five project districts from the Greater Accra and Ashanti regions benefitted from capacity building on introduction to the guidance document, Infection Prevention and Control (IPC), appropriate use of Personal Protective Equipment (PPE) and promotion of service utilization in the context of COVID-19. Follow-up supportive supervisory visits were made to the participating health facilities. The 140 Health facilities included Government, Quasi-
Government, private, faith-based and other health facilities. The private sector constituted 53% of the facilities.

4.3.2 Demand Creation Activities for Continuity of Essential Services

Communication materials (posters, jingles and radio/Television scripts) on promotion of service utilization were developed and shared with beneficiary districts.

Support to improvement in capacity of health staff with follow-up supervision, public education, and community empowerment through advocacy and stakeholder meetings with key community leaders on promotion of essential health service utilization were key to service utilization uptake demonstrated by a significant increase in OPD attendance in 4 of the 5 districts during the programme implementation period.

Communication materials and messages developed covered service utilization promotion and COVID-19 protocols compliance and targeted both health workers and the public in the project regions and beyond.

Advocacy/stakeholder meetings on promotion of continuous service utilization during COVID-19 was organized for 252 participants (106 males and 146 females) including community leaders (Assemblymen/women), traditional leaders, NGOs, the media, Teachers, transport unions officers, religious leaders and care givers to empower them and gain their support in the service demand drive. Meanwhile, OPD attendance in 4 of the 5 implementing districts showed a significant increase during the project implementation period.

5.0 Public Health Emergencies, Preparedness, Surveillance and Response

Introduction

The WHO has remained instrumental in providing technical support for capacity building of International Health Regulations (IHR) (2005) core capacities in the country to effectively prevent, detect and promptly respond to health emergencies to mitigate devastating consequences on the population. The year 2020 presented with unique challenges and opportunities with the COVID-19 pandemic that threatened the social and economic wellbeing of countries including Ghana.
Through the support of the World Bank and other international partners, the WHO was able to mobilize resources and technical expertise to support COVID-19 preparedness and response at all levels of the country’s health system. Coordination, surveillance, case management / infection prevention and control (IPC), laboratory and risk communication capacity was strengthened, logistics were provided and expertise deployed to support response in the country.

Capacity was also built in Integrated Diseases Surveillance and Response (IDSR), chemical emergency preparedness, One Health and outbreak response to guarantee a sustained capacity for country emergency preparedness and response.

**Key Activities, Outcomes and Achievements**

**5.1 COVID-19 preparedness and response**

Prior to the onset of the pandemic in Ghana, the WHO supported the Ministry of Health/Ghana Health Service to develop a draft COVID-19 preparedness plan and prioritized budget for resource mobilization towards preparedness for COVID-19 outbreak. Ghana recorded its first two cases COVID-19 on 12 March 2020. The WCO provided technical, logistical and financial assistance to the Ministry of Health/Ghana Health Service through the development/adaptation of various reference documents, tools, guidelines and protocols for the coordination, surveillance, points of entry, laboratory, case management, risk communication and operational logistics pillars.

**5.1.1 Coordination**

WHO supported the coordination of the response activities including the coordination structures at the level of the Presidency, the National Technical Coordination Committee (NTCC) meetings and the National Public Health Emergency Operations Centre (PHEOC). The Offices of the National COVID-19 Coordinator and the Director General of the Ghana Health Service were supported with 3 technical experts to support in areas of epidemiology, surveillance and coordination. Their expert advice helped to shape strategic decisions and policy directions for the COVID-19 response.
By the close of the year, WHO had Procured and donated equipment and IPC materials worth over $761,200.00 to the Ministry of Health/ Ghana Health Service to support COVID-19 pandemic response.

The Acting Country Representative to Ghana, Dr. Neema Kimambo presents Oxygen concentrators and other items to the Director General of the Ghana Health Service to support the COVID-19 response

5.1.2 Surveillance and Contact Tracing

About 395 Rapid Response Teams (RRT) and 680 contact tracers were trained and deployed across the country through WHO support. The Country Office also catalyzed the rapid scale-up of the Surveillance Outbreak Response Management and Analysis System (SORMAS) for surveillance to provide real-time data for decision making. Support was provided to surveillance officers and laboratory personnel on the use bar code system of SORMAS for sample submission and results transmission to ensure real-time availability of test results for response. Technical officers from the country office supported the MoH/GHS in supportive supervision and monitoring of COVID-19 response activities at all levels.
Following the training on the SORMAS software, a district health staff at Shai Osudoku is supported to track surveillance data online.

5.1.3 Laboratory

From an initial of two testing laboratories sited in the two major cities of the country, the WHO supported the expansion of the testing facilities to over 20 by the close of the year. The National Laboratory Network for COVID-19 testing were supplied with 324,000 test kits and 12 packages of Nucleic Acid extractors. Technical support was given for the development of national guidelines for laboratory testing of respiratory infectious diseases. The document guided and streamlined laboratory testing and reporting for COVID-19 by both public and private laboratories within the country. WHO made available 4 each of STEP QRT PCR 500 (500RXN), 40 each of STEP QRT PCR 100 (100RXN) 60 kits of ModularDx kit (SarbecovV E-gene) by TIB MOLBIOL containing 96 reactions/kit for distribution to the designated laboratories to support COVID-19 testing. Logistical support was also provided for the operationalization of GeneXpert testing sites in six regions to augment the national capacity for COVID-19 testing. To this end the WHO supplied over 5,000 GeneXpert cartridges to support testing in the regions.
5.1.4 Case Management

Effective case management positively impacts on case recovery and reduces mortalities especially those in containment centres. WHO sponsored and provided technical assistance for the assessment and supportive supervision of 49 COVID-19 case management treatment/isolation centres across the 16 regions of the country to ensure case management procedures align with WHO standards (SOPs) and best practices. The assessment identified gaps in human resource and logistics of all 49 treatment/isolation centres and also made available information for decision making on improvement and standardization of services/operations at the treatment/isolation centres. The findings from the assessment enabled resource mobilization to address the training and equipment gaps to improve case management. Case management teams were therefore supported with training in case management and IPC. They were also supported with the printing of 2,000 copies of case management manuals and guidelines and the supply of 55 oxygen concentrators.
5.1.5 Points of Entry (PoEs)

Seventy (70) RRT members and point of entry (POE) staff from 14 high risk districts & 6 PoEs were equipped with skills to conduct investigations, risk assessment and rapidly respond to suspected COVID-19 cases as part of WHO support to strengthen capacities at PoEs. Support was also given for development of guidelines for managing various categories of travelers arriving through the country’s borders.

5.1.6 Risk Communication

Financial and technical support for development of risk communication messages and message dissemination was provided to the Risk Communication and Social Mobilization thematic group of the response taskforce. Behavioural insights studies were conducted to inform and structure messages accordingly to achieve maximum impact and positive behaviours among specific targeted populations and the general public.

The Country Office in collaboration with HQ and AFRO communication teams developed and disseminated widely 9 impact stories such local production of PPEs, contact tracing efforts, case management interventions among others on Ghana’s response efforts. A documentary on the
provision of essential services amidst COVID was shot from the Greater Accra Regional Hospital and disseminated on UN websites.

Profiling stories on health workers especially women who have played significant roles in Ghana’s COVID response were developed and disseminated on the WCO websites.

Articles on Donor support from China and Norway Government for Ghana’s COVID Response were also developed and disseminated.

5.2 Integrated Disease Surveillance and Response (IDSR)

5.2.1 IDSR 3 Virtual Community of Practice (vCoP) and virtual training.

The WHO continues to support the implementation of strategies and policies to ensure rapid detection, containment and appropriate response to epidemic prone diseases, events and conditions of public health importance to safeguard global health security by strengthening capacity in IDSR.

Constrained by restrictions for large physical gatherings but leveraging technology occasioned largely by COVID-19, the WHO supported the mobilization of country level technical staff for the AFRO IDSR 3 vCoP and online training. The over 1,000 people from animal, environment and human health sectors in Ghana participated in the online training. The sessions lasted for 11 weeks and involved didactic as well as hands-on practice where participants did assignments from the modules taught. Country level coordination mechanisms were supported by the WHO Country Office to monitor and support training activities at country level.

5.3 One Health

5.3.1 Implementation of Ghana Rabies Control and Prevention Workplan

Through the efforts of the One Health Technical Working Group (TWG), partners have collaborated in different spheres to realise its goal. In 2020, the WHO supported the development, printing and launch of the Ghana Rabies Control and Prevention Action Plan (2018 – 2030). The Action Plan which was out-doored at the 2020 World Rabies Day launch seeks to end dog-mediated human rabies deaths in Ghana by 2030. The launch also saw the outdooring of the signed commitments by the Ministry of Health and the Ministry of Food and Agriculture to end dog-mediated human rabies deaths in Ghana by 2030 and the outdooring of a rabies
ambassador. These strides are expected to help stakeholders and partners mobilize the momentum and renewed commitment to achieve the zero dog-mediated human rabies deaths by 2030 termed the “zero by 30”.

WHO sustained stakeholder engagements through the One Health TWG to realise further consultations and validation of the draft One Health Policy for Ghana. The document which is expected to provide a framework for implementation of One Health in Ghana was validated by a broad spectrum of stakeholders across the animal, environment and human health divide. Further advocacy activities have been planned for its endorsement and finalisation by Ministries of Health; Food and Agriculture; and Environment, Science, Technology and Innovation.

Through funding from the NIPH, WHO supported the marking of International One Health Day with stakeholders across animal, environment and human health sectors. Awareness creation activities were organised through press conferences and community level durbars which brought together students, academia/researchers and community members around the Kwame Nkrumah University of Science and Technology. Over 250 people participated in the durbar.

**5.3.2 Chemical events**

**Integration of chemical events into IDSR technical guidelines**

The WHO supported the Disease Surveillance Department (DSD) and the OEHU of the Ghana Health Service (GHS) to draft a surveillance plan for defining, investigating and responding to chemical events/incidents through a series of working sessions. The plan included mechanisms (processes, tools and indicators) for identification, reporting, investigation, responding and monitoring. The Rapid Risk Assessment for Chemical Events developed in 2019 was also
incorporated into the plan. Using the approach ensures that chemical events surveillance is incorporated into the national surveillance system and does not require parallel structures to implement. The plan has undergone reviews and has been integrated into Ghana’s 3rd edition of the IDSR technical guidelines.

5.4 Meningitis
5.4.1 Meningitis surveillance in UWR
The Upper West Region of Ghana experienced a meningitis outbreak with Neisseria meningitidis X as the predominant organism. The WHO supported the region with 20 boxes of Pastorex Rapid Diagnostic Test kits for early diagnosis. A total of 53 Disease Surveillance and Laboratory Officers were equipped with skills for accurate, complete and timely reporting of meningitis data. Additionally, 61 health care providers were trained in case management and meningitis awareness creation campaigns for early symptom recognition and reporting for care. With support from ICG, some 7,700 vials of Ceftriaxone were also shipped to the Upper West Region to augment case management.

Boxes of the ceftriaxone vials being airlifted to Wa, Upper West Region

5.5 Influenza Preparedness
WHO supported the Ministry of Health/Ghana Health Service to convene a multi-sectoral meeting to develop a pandemic influenza plan with linkages to the National Public Health Emergency Preparedness plan. The Public Health Emergency Preparedness plan was subsequently updated to reflect changes proposed in the pandemic influenza plan. The plan provided a framework for
critical actions to be taken in a pandemic influenza outbreak and identified responsible stakeholders for the actions.

5.6 Partner Support

WHO’s public health emergency preparedness and response program was immensely supported by the governments of China, UK through the Foreign Commonwealth Development Office, Germany, Denmark, Norway and the World Bank Pandemic Emergency Fund and other partners. Activities were implemented in collaboration with the Ministry of Health/Ghana Health Service, Veterinary Service Department, NADMO, UN agencies and other development partners.

Table 6: Summary of WCO COVID Preparedness and Response Support

<table>
<thead>
<tr>
<th>Pillar</th>
<th>Output</th>
<th>Achievement</th>
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<tbody>
<tr>
<td>Coordination</td>
<td>Coordination planning and monitoring of preparedness and response activities effectively supported</td>
<td>COVID-19 Strategic Plan Development supported</td>
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<td></td>
<td>Supported key coordination functions of the national Public Health Emergency Operation Centre and the National Technical Coordinating Committee (NTCC)</td>
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<td>National Coordination platform and the Ghana Health Service Director General were supported with 3 technical experts in epidemiology, surveillance and coordination from the WHO.</td>
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<td>Technical officers from the country office supported the MoH/GHS in supportive supervision and monitoring of COVID-19 response activities at all levels</td>
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<td></td>
<td>Contributed to other outbreak response mechanisms within the UN such as the Inter-Agency Working Group on Emergencies, UN COVID-19 Programme response sub-group, World Bank Pandemic Emergency Fund technical working group, UN Crisis Management Team</td>
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<td>Support for the development and printing of 1,000 copies of a national strategic plan for COVID-19 response</td>
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<tr>
<td>Surveillance and Point of Entry</td>
<td>Capacity in surveillance, case investigation, contact tracing, data management strengthened</td>
<td>Provided technical assistance for the development of COVID-19 surveillance, contact tracing, quarantine and other guidelines</td>
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<td></td>
<td>Directly supported the training and deployment of 395 Rapid Response Teams and 680 contact tracers in Greater Accra, Eastern, Central, Upper East and Ashanti Regions.</td>
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<td>This led to the rapid scale up of the Surveillance Outbreak Response Management and Analysis System (SORMAS)</td>
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<td>Supported the training of 33 Health Information officers and 10 Regional COVID-19 Data Managers from the Greater Accra Region (GAR) on bar coding system and the SORMAS. This improved data entry into SORMAS from 88.5% to 95%.</td>
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<td>Supported refresher training for 225 contact tracers in all districts within Greater Accra region</td>
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<td>Supportive monitoring visits have been conducted to almost all the districts within Greater Accra region to provide technical assistance for implementation processes.</td>
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<td>Supported the training of 70 RRT members and points of entry (PoE) staff from 14 high risk districts and 6 PoEs</td>
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<td><strong>Laboratory</strong></td>
<td>Equipped with skills to conduct investigations, risk assessment and rapidly respond to suspected COVID-19 within their respective districts and PoEs. Provided technical support for the development of guidelines for managing various categories of travelers arriving through the country’s borders, particularly the Kotoka International Airport.</td>
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<tr>
<td><strong>Laboratory</strong></td>
<td>Provided technical support for the development of national guidelines for laboratory testing of respiratory infectious diseases. Guided and streamlined laboratory testing and reporting for COVID-19 by both public and private laboratories within the country. Supported the expansion of the testing facilities from 2 to over 20 by the close of 2020. Procured and distributed QRT PCR and extraction kits to the National Laboratory Network to support COVID-19 testing. Provided logistical support to operationalize GeneXpert sites through the provision of over 5,000 cartridges for COVID-19 testing.</td>
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<tr>
<td><strong>Case Management and Infection Prevention &amp; Control (IPC)</strong></td>
<td>Capacity for case management, IPC, safe burials and psychosocial support augmented. Supported the development and printing of 3,000 case management manuals. Also provided technical assistance to develop job aids for clinicians. Supported the training of 746 health workers in Ashanti, Oti, Central, Eastern and Upper East regions on IPC. Provided technical/financial assistance for assessment and supportive supervision of all 49 treatment/isolation centres across the country. Supported further orientation/training of 360 multidisciplinary staff working in isolation/treatment centres in Volta, Eastern, Western North, Ashanti, Central and Greater Accra Regions. Logistics support provided (PPEs: gloves, coveralls, goggles etc).</td>
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<tr>
<td><strong>Risk Communication and Social Mobilization</strong></td>
<td>Advocacy, risk communication, public information and education supported. Supported the development of COVID-19 preparedness and Response Plans for RCCE. Supported the development of RCCE SOPS and Guidelines and Risk Communication Coordination Framework. Supported the development of social distancing guidelines for different scenarios: (Faith based Organizations, Basic schools, Workplaces, Hair Salons and Barbering shops/spa, market, Gyms and keep fit clubs, supermarket and malls, food vendors and restaurants lorry stations/Parks). Supported the development of messages on preventive measures to the general public and specific interventions for hotspots. Collaborated with UHAS and GHS to conduct a behavioural insight study on COVID. Development of Communication and Crisis Communication strategies for vaccine deployment.</td>
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</table>
6.0 Staff Movement

During the year under review, the Country Office lost one of the Technical Officers; Mr Edward Gyepi-Garbrah after a short illness. Edward Gyepi-Garbrah joined WHO on 01 September 2004 and from the word go he brought his conviction to bear on the programme for which he was recruited – Guinea Worm Eradication Programme.

He supported immensely in setting up the WHO/Tamale Office. He contributed to the eradication of Guinea Worm in Ghana and was very proud about that achievement. He loved to talk about the processes they went through to achieve the Guinea Worm eradication status. With this experience, he supported some African countries to go through the Guinea Worm eradication and certification process.

He was instrumental in the implementation of UN Joint Programme for Water, Sanitation and Hygiene (WASH) in disaster-prone communities in northern Ghana. He also served on the Technical Working Groups and Steering Committees on WASH and contributed to the UN Emergencies Inter-agency Working Group.

May his gentle soul continue to rest in perfect peace.