

Bangladesh AMR Newsletter



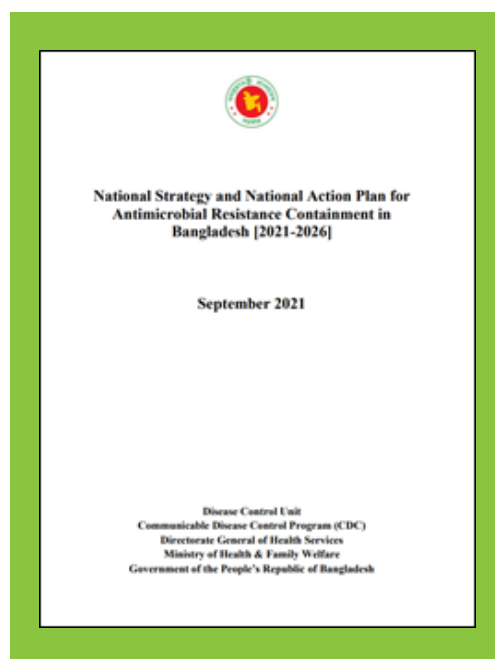
Approval of 'National Strategy and National Action Plan for AMR containment 2021-2026'

The national technical committee (NTC) meeting was held on January 20th 2022, and in that meeting the 'National Strategy and National Action Plan for AMR containment 2021-2026' was approved.

MTaPS Bangladesh provided the technical assistance and other stakeholders, including Fleming Fund Country Grant to Bangladesh also supported the activity. This is a big step forward in the field of AMR containment. Currently the team is working to develop a costed action plan.



Meeting of National Technical Committee for AMR



Editorial



One of the important activities for AMR containment is to engage clinicians with the microbiologists. Therefore, CDC - DGHS with the support from the Fleming Fund Country Grant, Bangladesh took an initiative to engage the clinicians, pharmacists, nurses, medical technologists, support staff and the hospital management with the microbiology laboratories for better utilization of the services of pathogen detection, identification, susceptibility testing, to support rational antimicrobial therapy. This will provide economic benefits by reducing the cost of patient care, reducing the length of hospital stay and overall, reducing the morbidity and mortality. The generated data in the laboratories on susceptibility patterns of the microorganisms to different antibiotics will be useful for monitoring AMR trend, developing national and local guidelines for antimicrobial use and ultimately, will help AMR containment in the country.

Prof. Dr. Md. Nazmul Islam
Chief Editor

Director, Disease Control and Line Director, CDC

Clinical Engagement for AMR Containment

AMR containment needs several initiatives including optimizing the use of antimicrobials. One of the activities includes greater engagement of clinicians and other health workforce. Therefore, CDC - DGHS, IEDCR, and Fleming Fund country grant to Bangladesh are jointly organizing clinical engagement workshops at national level as well as in the medical colleges. Two of the planned workshops have been organized at Chittagong Medical College, Chattogram and at Dhaka Medical College Hospital on May 22, 2022, and May 25, 2022, respectively, with participation of the clinicians, microbiologists, nurses, post-graduate students and technicians.

The objective was to promote better utilization of the services of the microbiology laboratories for pathogen identification, and susceptibility testing, to encourage clinicians on the use of AMR data driven antibiogram for rational use of antibiotics.



Workshop in progress at Dhaka Medical College

In his welcome address, Prof S M Shamsuzzaman, Head of the Department of Microbiology, Dhaka Medical College expressed his commitment to organize such events in future. Dr Aninda Rahman, DPM, CDC, shared findings of the previous point prevalence survey which indicated elevated usage of antibiotics in hospitals. Amethyst Gillis from DAI (Development Alternatives Incorporated) Home Office presented 'Clinical Engagement for AMR Containment- Global Strategy and Strategy Process'. Prof Nitish Debnath, Team Lead Fleming Fund Country Grant to Bangladesh, and Prof Tahmina Shirin, Director IEDCR, welcomed the activity and expressed their commitment to support the activity. The Director of Dhaka Medical College Hospital Brigadier General Mohammad Nazmul Haque committed to provide all support. Prof Dr Mohammad Titu Miah, Principal Dhaka Medical College, thanked the participants and urged to make full use of the lab facilities. Similar activities have been planned to be held in other medical colleges soon.

Strengthening Public-Private Partnership in AMR: Meeting with Laboratory Management of Popular Hospital Pvt Ltd. on Participation of the Laboratory as an AMR passive surveillance site

It is estimated that approximately 70% or more microbiological tests are performed in the private laboratories and a recent assessment done by CAPTURA a Fleming Fund Regional Grant found that at least 40 leading laboratories possess an adequate system of AMR data generation through good quality laboratory practices.

Considering the importance of inclusion of AMR data generated in the private sector laboratories and following a series of workshops and meetings held between CDC DGHS, IEDCR (the Human Health Sectoral NRL), FFCGB, and leading microbiologists and epidemiologists from both public and private sectors, it was decided to include some of the leading private sector laboratories as AMR passive surveillance sites. For inclusion of the private hospitals in AMR surveillance, CDC DGHS is considering the findings of the lab assessment conducted jointly by CDC-DGHS and CAPTURA.



**Meeting of IEDCR and Fleming Fund Country Grant Bangladesh with
Laboratory Management of Popular Hospital Pvt Ltd.**

In the first phase, laboratories from Dhaka and Chattogram, which were found to have adequate laboratory capacity with assured quality as per the results of the joint assessment, will be considered for inclusion in the national AMR Surveillance Laboratory Network. Microbiology laboratories of the Popular Hospital Limited, Dhaka, were found to meet the set criteria. Also, Popular Hospital authorities expressed their keen interest to share the data from their 9 laboratories through a single data sharing mechanism using the data management system of Popular Hospital Limited. The data will be uploaded into the AMR national data dashboard ensuring maintenance of data confidentiality for both Hospital and its' clients.

Site visit and discussion with the management of the Popular Hospital Ltd, CDC, IEDCR and FFCG was organized at the microbiology lab of Popular Diagnostic Centre at Dhanmondi, Dhaka on June 02, 2022. Decision was taken that Popular Hospital Ltd. henceforth share the microbiological data on AMR with IEDCR every month. Since the meeting, the hospital has already shared data for the month of June 2022, which included information from more than three thousand samples.

Inclusion of AMR data generated by the private sector laboratories will enrich the national AMR data system through increase in data quantity. On the other hand, quality of services in the participating labs will also improve through participation in National External Quality Assurance System (NEQAS).

Antimicrobial resistance containment in Bangladesh: Government and development partners working together

The Communicable Disease Control department of the Directorate General of Health Services (CDC-DGHS) is the designated National AMR coordination centre of Bangladesh and is implementing the AMR Containment programme along with other departments including the Directorate of Livestock Services (DLS), Department of Fisheries (DoF), Directorate General of Drug Administration (DGDA), and the Department of Environment with a One-Health concept. Several developmental partner organizations like the Fleming Fund, USAID, WHO, World Bank, FAO and others are supporting the programme.



Meeting of director CDC DGHS and the team



'Meeting of DG DGDA and the team'

One of the major partners in AMR containment is the Fleming Fund. Mott MacDonald is the management agent of Fleming Fund and its' regional team based in New Delhi, India, recently visited Bangladesh to oversee the progress till date in the areas of AMR surveillance and containment in the country. During their 10-day visit, the Mott team had extensive interactions with the relevant government stakeholders including CDC DGHS, DLS, and DGDA, the development partners including WHO, USAID, US CDC and FCDO Dhaka office. The team visited three national reference laboratories (IEDCR, CDIL and BLRI), and five sentinel sites (Chittagong Medical College, Dhaka Medical College, Mymensingh Medical College, Poultry Research & Training Centre (PRTC and Chattogram), and Quality Control Laboratory for Fisheries at Savar), and had effective interactions with different group of professionals like laboratory staff, the physicians and scientists, and the management staff. The team met the Fleming Fund Country Grant team, DAI, and its' consortium partners.

The visit by Mott team was the first after launching of the Fleming Fund Grant activities in January 2020, and as mentioned by Dr Vikas Aggarwal, the Regional Advisor of Mott, to be important for understanding the progress in strengthening AMR surveillance and overall, in AMR containment, attained by the government of Bangladesh through Fleming Fund support during the extremely difficult period of covid-19 pandemic. It will help determine future pathways for continuing the Fleming Fund support for the country.

The Mott MacDonald Regional team based in New Delhi, and Fleming Fund Country Grant to Bangladesh team had several meetings with different stakeholders. Some of the pictures are shared here.



Meeting of DG DLS and the team

AMR containment: some of the activities performed from December 2021 to June 2022

National Task Force on AMC and AMU meeting was held at the office of the Directorate General of Drug administration (DGDA) on 12th June 2022, during which the following information were provided by DGDA to the members.

- DGDA has imposed new regulation on antibiotic packaging with health warning on the package to be implemented by drug manufacturers/ marketeers.
- New law to ban over the counter sale of antibiotics without prescription by registered practitioners has been drafted and reviewed-and has been placed to the parliament for enactment of the law.

Sectoral Coordination meetings of both Animal and Human Health Sectors are being held regularly every three months to discuss the progress of AMR containment activity progress and challenges within the sector and to draw out short term activity plans. Last such meetings were held on 29th June and 4th July 2022 for animal and human health sectors respectively.

For conducting the AMR active surveillance in Animal Health (AH) Sector, training was organized on Sample collection and Transportation

Study on antimicrobial use (AMU) in Animal Health sector at selected poultry and dairy farms has been started in Gazipur and Chattogram. This will quantify the per capita AMU in chicken and dairy cattle. To support the activity

- * Guideline has been developed on monitoring AMU at farm level and
- * Training has been conducted on AMU data Collection from Dairy and Poultry

Installation of equipment- BACTEC, VITEK-2, Biosafety cabinets, laminar airflow completed, several others are in pipeline to be finished by Sep 2022.

Eight out of 12 laboratories refurbishment has been completed including moderate to major redesigning and reconstruction, installation of biosafety level 2 (BSL2), and installation of heating, ventilation, and air conditioning (HVAC) system in 6 labs.

Point prevalence survey (PPS) of antimicrobial use in tertiary hospitals, a follow-up study has been being undertaken in 3 medical colleges Dhaka, Chattogram and Mymensingh.

CAPTURA a Fleming Fund regional grantee, shared the findings of the retrospective AMR data collected from Bangladesh in its 3-day long workshop at hotel Sheraton Dhaka on May 16 -18, 2022. Among the countries from where AMR data was collected, Bangladesh had the highest number of more than one million data collected for analysis.

Data management

- Updating of software at the national server for human health AMR data collection is going on with finalization of data management protocol.
- Incorporation of AMR Data module into Bangladesh animal health intelligence system (BAHIS) and hands-on training on AMR data management in AH going on.

'Preventing antimicrobial resistance together' Quadripartite announces WAAW 2022 theme

The Quadripartite organizations FAO, UNEP, WHO, and OIE announced the theme of World Antimicrobial Awareness Week (WAAW) 2022: 'Preventing antimicrobial resistance together'. The slogan of World Antimicrobial Awareness Week remains 'Antimicrobials: Handle with Care'. WAAW is celebrated from 18 to 24 November every year.



Food and Agriculture
Organization of the
United Nations



World Health
Organization



World Organisation
for Animal Health
Founded as OIE

Editorial Board

Chief Editor

Prof. Dr. Md. Nazmul Islam, Director, Disease Control and Line Director, CDC, DGHS

Advisors (Not according to seniority)

Prof. Tahmina Shirin, Director, IEDCR
Dr. Md. Belal Hossain, Director, Hospitals and Clinics, DGHS
Mr. Md. Salahuddin Director DGDA
Dr Md. Abu Sufian, Director, DLS
Prof. Shamsuzzaman, Department of Microbiology, DMC
Prof. Ahmed Abu Saleh, Department of Microbiology, BSMMU
Prof. Sayedur Rahman, Department of Pharmacology, BSMMU
Prof. Zakir Hossain Habib, Chief Scientific Officer, IEDCR
Prof. Nitish Debnath, Fleming Fund Country Grant Bangladesh

Managing Editor

Dr Aninda Rahman, Deputy Program Manager (AMR), CDC, DGHS

Contributors (Not according to seniority)

Dr. Mozaffor Gani Osmani Head Epi Unit DLS
Dr Mohammed Abdus Samad, Principal Scientific Officer, BLRI
Dr Koly Mustafa, Upazila Livestock Officer, DLS HQ
S.M. Shahriar Rizvi, Evaluator, CDC, DGHS
S. M. Sabrina Yesmin, Assistant Director, DGDA
Dr. Hurul Jannat, MO, CDC, DGHS
Dr. Piash Kumer Deb, MO, DGHS
Dr S.M. Abu Zahid, MTaPS
Dr Zobaidul Haque Khan, Fleming Fund Country Grant Bangladesh
Dr Kazi Mohammad Hassan Ameen, Fleming Fund Country Grant Bangladesh
Dr Kazi Kamaruddin, Fleming Fund Country Grant Bangladesh
Farzana Rahman, Fleming Fund Country Grant Bangladesh
Dr Arif Hussain, icddr,b. Fleming Fund Country Grant Bangladesh

Communication Advisor

Dr Khaleida Islam, Fleming Fund Country Grant Bangladesh

Design and Composition

Majid Khan Mohin, Fleming Fund Country Grant Bangladesh

Contact Details

Dr Aninda Rahman, DPM, CDC, DGHS
Mobile: +880-1817541797 Email: dr.turjossmc@gmail.com

Supported by



This material has been funded by UK Aid from the UK government; however, the views expressed do not necessarily reflect the UK government's official policies.