Short Review

Referral Norms for the New Normal

H A M Nazmul Ahasan¹, Musavvir Samin², Ruslan Ahasan³

Introduction

More than half a year into the global pandemic and we still find ourselves in endless uncertainty. Though we have endured the initial wave of this pandemic, we are still uncertain of what is waiting for us in the unforeseeable future. As the hope for permanent cure and escape from this virus is dim, everyone is adopting a new lifestyle a ‘new normal.’ This means ‘things will never be the same again.’ This applies to the Health system as well.

Bangladesh, a country of almost 170 million people, is the most densely populated country in the world.¹ The patient to doctor ratio is one of the highest in the world as well.² Being a developing country, we cannot afford unnecessary utilization of our resources. In order to address this issue, there is an urgent need to have a proper referral policy and a sound and dependable health care delivery system at all levels of care that is transparent, responsive and accountable; and adopted to the ‘new normal.’

Here, we propose a Referral system for Bangladesh Health Care System with the aim to make health care delivery system prepared for the new normal. The objective is to minimize the overcrowding of tertiary care centers so that they operate as referral centers and provide high quality care to patients who need to be treated at these institutions with highly skilled staff and state of the art facilities.

Situation analysis³

Bangladesh health care facility is provided at six levels with Ward level at the bottom and National level at the apex.⁴

<table>
<thead>
<tr>
<th>Levels</th>
<th>Health Care Facilities</th>
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<tbody>
<tr>
<td>National level</td>
<td>• Public Health Institute</td>
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<tr>
<td></td>
<td>• Postgraduate Medical Institute &amp; Hospital</td>
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<td>• Specialized Health Centre</td>
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<tr>
<td>Divisional level</td>
<td>• Medical College and Hospital</td>
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<td>• General Hospital with Nursing Institute</td>
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<td>• Infectious Disease Hospital</td>
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<td>• Institute of Health Technology</td>
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<td>District level</td>
<td>• District Hospital</td>
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<td>• General Hospital</td>
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<td>• Medical College &amp; Hospital</td>
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<td>• Chest Disease Clinic</td>
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<td>• Tuberculosis Clinic</td>
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<td>• Leprosy Hospital</td>
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<td>• Medical Assistant Training School</td>
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<td>Upzilla level</td>
<td>• Upazila Health Complex</td>
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<td>Union level</td>
<td>• Rural Health Center</td>
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<td>• Union Subcenter</td>
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<td>• Union Health &amp; Family Welfare Center</td>
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<td>Ward level</td>
<td>• Community Clinic</td>
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1. H A M Nazmul Ahasan, Professor of Medicine, Popular Medical College Hospital, Dhaka, Bangladesh
2. Musavvir Samin, Assistant Registrar, Popular Medical College Hospital, Dhaka, Bangladesh
3. Ruslan Ahasan, Student of Master’s in public health, University of Central Oklahoma, Oklahoma, USA
4. DOI: https://doi.org/10.3329/jom.v22i1.51392

Received: 10 September, 2020; Accepted: 13 October, 2020

J MEDICINE 2021; 22: 51-56
Transport
- Inconsistent availability of ambulance services across health care centers.
- Ambulances are not yet equipped with the necessary life support medical equipments.
- Inadequate to no provision for airlifting of patients who require urgent intervention.

Communication
- Inadequate communication tools at some health facilities.
- Poor feedback system on referred patients from one level to another.
- Patients referred without prior appointments leading to unnecessary crowding at tertiary care hospitals.

Resources
- Number of health care workers is inadequate at all levels.
- Grossly insufficient medical equipment.
- Lack of knowledge of how to conduct available equipments.
- Lack of maintenance of those equipments.

Referral criteria and system
- No referral criteria to guide the health care workers when referring patients leading to unnecessary and delayed referrals.
- No clear guidelines on who takes the responsibility for patients who die on their way to referral centers.
- Patients being referred without initial work up being done resulting in increased length of patients’ stay in hospitals and unnecessarily high bed occupancy rates.
- Inadequate specialist support at district level leading to unnecessary referrals.
- Poor coordination of referrals between different levels of health service delivery.

Self-Referral
- Some patients refer themselves from one level to another as they assume that they get better service at other levels.
- It results in
  - Increase waiting time
  - Lack of continuity and follow up
  - Wastage of resources at all levels

Appropriate Referral System\textsuperscript{5}
Referral system is defined as a system of transferring cases which are beyond the technical competence of one infrastructure to a higher-level infrastructure/institution having technical competency and all other resources to provide desired health services.\textsuperscript{6}

Referral does not mean transferring responsibility. Rather it is sharing responsibility in patient care.

The aims of referral system are:
- To provide comprehensive care within the technical competencies & resources at each level of primary health care infrastructure efficiently and effectively.
- To streamline the appropriate use of PHC infrastructure and specialized services in order to prevent overloading of specialized institution by direct uses.

The referral should be done:
- When the patient requires certain treatment modalities which are not available in that setting.
- When the physician seeks for expert opinion
- When the physician needs specific investigation.
- When the physician is dissatisfied with the patient’s progress or unsure of the diagnosis.
- Medico-legal concerns by the physician or the patient or both.
Basic principles of the referral process are:
- Merit in the referral process (need-objective)
- Practical (not waste resources)
- Individualized to client

Benefits of an appropriate referral system include:
- For the patient
  - Prompt diagnosis and management
  - Save time, money and effort.
  - Better outcome
- For the general physician
  - Learning and training
  - Gaining self-confidence.
  - Increase communication between the health care staff
- For the Consultant
  - Improve the quality of the patient’s management.
  - Increase communication between the health care staff

A proper referral letter should include:
- Patient details (name, location, age, and sex).
- Details of general physician (Name of physician making request and Name of physician being consulted)/ health care worker
- Reasons for referral.
- Degree of urgency for appointment.
- Clinical problem.
- Important Past history.
- Findings on physical examination.
- Findings on investigation (photocopies of results should be included).
- Medication and drug sensitivities.
- Expected outcome and desirable follow up.

**Types of Referral**

*According to Urgency*
- Routine
  - Seeking expert opinion for diagnosis
  - Seeking further investigations
  - Seeking Hospital admission and management
- Emergency
  - Seeking emergency assessment
  - Seeking emergency investigations
  - Seeking emergency management

- Opportunistic
  - For Expert opinion
  - Admission
  - Investigations
  - Management

*Modern classification*
- Interval
  - Patient with MI admitted in hospital for a period of then return for continuity of time
- Collateral
  - As in diabetic patient with glaucoma referral to ophthalmologist
- Split referral
  - Multi-speciality in the same center
- Cross-referral
  - Self – referral

**If the patient declines a referral**
If a patient declines a referral, consultation or transfer of clinical responsibility, the Primary care giver should:
- advise the patient of the recommended care, including the evidence for that care
- explain to the patient the need to consider discussing case with at least one of the following:
  - another GP
  - an appropriate specialist
  - an experienced colleague/mentor
- share the outcomes of the discussion and any resulting advice with the patient
- document in the care plan the process, the discussions, recommendations given, and decisions made, and the patient’s response.

**Referral Principles for the new normal**
- Minimize face-to-face contact by:
  - avoiding non-essential face-to-face referrals.
  - using electronic prescriptions rather than paper.
  - using different methods to deliver prescriptions and medicines e.g. postal services.
  - contacting patients via text message, telephone, or email.
  - optimizing the use of telemedicine such as telephone and video consultations.
  - making use of departmental pages on government websites which should include FAQs on COVID-19 if possible.
  - extending intervals between drug monitoring and using local services for blood tests if possible.
2. If patients need to attend face-to-face referrals, ask them to help reduce the risk of contracting or spreading infection with COVID-19 by:
   • coming to the appointment alone.
   • having only 1 parent or carer accompany a child or adult who cannot come alone.
   • avoiding public transport if possible.

3. Advise patients, their families or carers to seek proper consultation if they think they have COVID-19 and inform their primary health care provider.

4. Advise patients, their parents or carers to write down a list of the medicines they take and the conditions they have to give the healthcare staff if they need to seek treatment for COVID-19.

5. Advise patients who still need to attend services to follow relevant parts of government advice on social distancing.

6. Approach to patient not known to have COVID-19
   If patients need to attend hospital referrals, minimize their potential exposure to the virus by:
   • encouraging them not to arrive early.
   • texting them when staff are ready to see them so that they can wait outside the clinic.
   • providing a ‘clean route’ through the hospital to the department.
   • reducing and ideally eliminating the time they spend in waiting areas through careful scheduling.
   • delivering investigations, procedures and treatment promptly and in 1 stop when feasible
   • ensuring prescriptions are dispensed rapidly and ideally without visiting hospital pharmacies (e.g. by use of home delivery) where available.

7. For patients known or suspected to have COVID-19
   • If patients with known or suspected COVID-19 need to attend a hospital referral, follow local government guidelines on patient transfers and options for outpatient settings.
   • If COVID-19 is later diagnosed in a patient not isolated from admission or presentation, follow local government guidelines and recommendations.
   • Provide acute and emergency advice to GPs and PHCW to avoid unnecessary emergency department attendances and admissions, using advice and guidance services and tele triage where possible.

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**Referral system for the new normal: National Referral App**

- Everyone will download the App in their smart device.
- On opening the app for the first-time user, they will need to register using their national identity number.
- After opening an account their details will be stored in the national database. (It will also be a technically feasible method to document patient information throughout the country digitally.)
- Next time they open the app they will need to sign in with their national id number.
- Those who do not have a smart device, will be able to open this account from local health care facility.
- First time when they open their account their history will be documented by local health care giver (SACMO or Nurse or Medical Officer)
- Following that their medical history will be updated each time they visit health care centre.
After login he/she can:
- Check Previous treatment Records.
- Check Profile
- Call/ Get help from a doctor.
- Get Health Updates
- Contact authorities in case of emergencies.

This section is only for Doctors:
- Can search for a patient who contacted him earlier
- Can refer someone
- Write or send prescriptions to patients
- Get latest health updates and treatment protocols
Benefits

• The referred physician will get all the notes of the current and previous consultations and follow-up when he logs into the App with the patient’s registration no.
• Tremendous benefit for health surveillance and research
• Extreme comfort for the patient as he does not need to look for appointment and follow up schedule. All will be done automatically, and he will be notified.
• Unprescribed use of prescription drugs will be curtailed as pharmacies now will give those medications only after checking the prescription in the App.
• Even if the patient doesn’t have smart device, pharmacist will be able check only the prescription with patients NID no.
• Paperless consultation, referral and prescription.

Pitfalls

• Lacks human touch (although if felt necessary, physician will ask the patient to come for physical consultation)
• Lack of internet facilities especially in the developing countries
• Not everyone possesses smart devices
• Lack of knowledge of how to use the app especially for the elderly

Conclusion

COVID-19 has called for reassessment of health care provision especially in the resource poor settings. As in financial sector Digital mobile wallets are becoming more and more popular, digitalization of health care delivery system especially referral system will hopefully be welcomed by the mass people and bring in immense benefit in terms of provision of care and resource and time saving. We must keep in mind that referral is just a beginning process which needs to be continued in appropriate facility by the clinicians and later following up as required. Bangladesh being a resilient country is not unfamiliar to natural disasters or humanitarian crises. Hopefully, we will continue to fight this new foe in upcoming days with new innovations and systems tailored to our resource constrained settings.

References

2. Bangladesh has one doctor for every 1847 people [Internet]. [cited 2020 Sep 17]. Available from: https://thefinancialexpress.com.bd/health/bangladesh-has-one-doctor-for-every-1847-people-1519053209
6. WHO | Management of health facilities: Referral systems. WHO. 2010;
7. Referral system [Internet]. [cited 2020 Sep 17]. Available from: https://www.slideshare.net/HatemAlSheemy/referral-system-69752157