Evaluation of the Advancements in Implementing the Primary Healthcare System Strengthening Project (PSSP) at RDHS Nuwara Eliya, Sri Lanka

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Abstract

**Introduction:** PSSP was designed by Sri Lankan health experts, professionals, and citizens with a new vision to strengthen the primary healthcare system in the country and to prepare the nation to meet future health challenges.

**Objective of this study:** Evaluation of the Advancements in Implementing the Primary Healthcare System Strengthening Project (PSSP) at RDHS Nuwara Eliya, Sri Lanka

**Methodology:** Key informant interviews with RDHS Nuwaraeliya, MO (Planning), MO NCD and PMCI MOs and a review of secondary data were used to gather information for this study. According to this prioritizing methodology and using nominal group technique with the support of the technical staff of the RDHS office, the Lack of participation of the public in the PMCI / HLC for NCD screening was identified and taken as the main problem.

**Conclusion:** When evaluating the advancement of PSSP at PMCIs in the RDHS area in Nuwara Eliya it was identified that the baseline target of 2.48% of 35 years and more population screened in 2021, 7.4% was achieved in 2022.

**Recommendations:** Improve the underutilization of PMCI / HLCs were improving the health literacy of people who are eligible for empanelment in PMCI in RDHS – Nuwaraeliya, improving the awareness of people about the services rendered by the PMCIs and conducting capacity building programs to health care workers to enhance communications skills.

**Keywords** - Primary Healthcare System Strengthening Project (PSSP), PMCI - Primary Medical Care Institution- GN - Grama Nila Dhari, PMCU -Primary Medical Care Unit, HLC -Health Lifestyle Centre, NCD -Non-Communicable Diseases.

**Introduction**

Ministry of Health initiated the ‘Primary Healthcare-System-Strengthening Project (PSSP)’ in 2018, with technical and financial support from the World Bank. The project focuses on three thematic areas (World Health Organization, 2018):
1. Reorganization of the PHC by defining the catchment area and population for each PMCI (empanelment);
2. Strengthening the PMCIs with trained manpower, optimizing drug supply chain management systems and expanding laboratory service capacity;
3. Establishing a technology-based HMIS to provide electronic personal health records (PHRs). By 2023, the PSSP plans to strengthen 550 of the 990 PMCIs in the country.

PSSP was designed by Sri Lankan health experts, professionals, and citizens with a new vision to strengthen the primary healthcare system in the country and to prepare the nation to meet future health challenges. Ideally, 70-80% of all care should be delivered at the primary care level. In Sri Lanka, patients bypass lower levels of care and go directly to specialists at secondary and tertiary care hospitals (Ministry of Health, 2018). Bypassing leads to the underutilization of small institutions and overcrowding in the bigger institutions.

Nuwara Eliya RDHS consists of 48 hospitals including two base hospitals, 24 Divisional hospitals, 22 PMCUs, and 13 MOH divisions. The Nuwara Eliya district has 51 PHIs in position at present mainly involved in the prevention of communicable diseases at the grass root level. The population of Nuwara Eliya district was 786,973 according to the Midyear population estimates 2022.

**Objective of the Case Study**

To evaluate the Advancements in Implementing the Primary Healthcare System Strengthening Project (PSSP) at RDHS Nuwara Eliya, Sri Lanka.

**Methodology**

- Key informant interviews with RDHS Nuwara Eliya, MO (Planning), MO NCD and PMCI MOs’
- Review of secondary data.
- In-depth interviews with Health Care workers and patients.
- Field visits.
- Attended district-level review meetings.
PSSP- Verifiable Hospitals

<table>
<thead>
<tr>
<th>2019</th>
<th>2020</th>
<th>2021</th>
<th>2022</th>
<th>2023 (Not verifiable)</th>
</tr>
</thead>
<tbody>
<tr>
<td>DH Hanguranketha</td>
<td>DH Ginigathena</td>
<td>DH Kotagala</td>
<td>DH Mathurata</td>
<td>PMCU Kandapola</td>
</tr>
<tr>
<td>DH Wattala</td>
<td>DH Agarapathana</td>
<td>DH Mandaramnuwara</td>
<td>DH Udupussellawa</td>
<td>PMCU Manakola</td>
</tr>
<tr>
<td></td>
<td>DH Nildandahinna</td>
<td>DH Kothmale</td>
<td>DH Maskeliya</td>
<td>PMCU Murwatta</td>
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<td></td>
<td>DH Bogawanthalawa</td>
<td>DH Gonaganthenna</td>
<td>DH Maldeniya</td>
<td>PMCU Ragala</td>
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<td></td>
<td>DH Dayagama</td>
<td>DH Walapane</td>
<td>DH Theripaha</td>
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<td></td>
<td>DH Madulla</td>
<td>DH Laxapana</td>
<td>PMCU Kurupanawela</td>
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<td></td>
<td>DH Mooloya</td>
<td>DH Highforest</td>
<td>DH Northmedakubura</td>
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<td></td>
<td>DH Gonapitiya</td>
<td>DH Lindula</td>
<td>PMCU Ketaboola</td>
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Situational analysis

The population of the Regional Director of Health Services (RDHS) division, Nuwara Eliya is 786,973 and 42% of them fall in the age of above 35 yrs. The Nuwara Eliya RDHS area consists of the following preventive and curative healthcare facilities.
Table 1.

<table>
<thead>
<tr>
<th>Available healthcare institutions</th>
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<tbody>
<tr>
<td>No. of MOH areas</td>
</tr>
<tr>
<td>No of District General Hospitals</td>
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<tr>
<td>No. of Base Hospitals</td>
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<tr>
<td>No. of Divisional Hospitals</td>
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<tr>
<td>No. of Primary Medical Care Units</td>
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</table>

One MO/NCD is attached to the Nuwaraeliya RDHS office and 49 HLCs are functioning in these 13 MOH areas. These HLCs are physically located in those District General, Base Hospitals and other healthcare institutes mentioned in the table and they are run by medical officers at each institution.

According to the requirement by the World Bank’s DLI, there should be 2 HLCs in each MOH area and this state should be achieved gradually. These HLCs are run once a week as a routine clinic and in addition to that, they also perform Community screening and Workplace screening. Technical guidance required materials and necessary training were done by the NCD unit of the Ministry of Health and coordinated by the MO (NCD).

Problem analysis

Problems or issues identified

Based on the above methodology we could identify the following issues that exist in the successful running and effective utilization of the HLCs.
Table 2 - Nominal group prioritizing table

<table>
<thead>
<tr>
<th>Problem identification</th>
<th>Technical feasibility</th>
<th>Time factor</th>
<th>Financial feasibility</th>
<th>Impact</th>
<th>Acceptability</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lack of participation of the public in the PMCI / HLC for NCD screening.</td>
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<tr>
<td>Inadequate space and infrastructure.</td>
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<tr>
<td>Challenges in HR management and training (Lack of human recourses)</td>
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<tr>
<td>Challenges in ensuring laboratory investigations through PMCIs</td>
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<td></td>
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<tr>
<td>The system for follow-up of patients for the second visit is not well developed.</td>
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<tr>
<td>Challenges in drug stock management in PMCIs</td>
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<tr>
<td>Challenges in using HMIS at PMCIs</td>
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</table>

Table 3.

<table>
<thead>
<tr>
<th>Problem</th>
<th>Rates</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Lack of participation of the public to the PMCI / HLC for NCD screening.</td>
<td>8</td>
</tr>
<tr>
<td>2. Inadequate space and infrastructures.</td>
<td>2</td>
</tr>
<tr>
<td>3. Challenges in HR management and training (Lack of human recourses)</td>
<td>2</td>
</tr>
<tr>
<td>4. Challenges in ensuring laboratory investigations through PMCIs</td>
<td>2</td>
</tr>
<tr>
<td>5. System to follow-up of patients for the second visit is not well developed.</td>
<td>1</td>
</tr>
<tr>
<td>6. Challenges in drug stock management in PMCIs</td>
<td>1</td>
</tr>
<tr>
<td>7. Challenges in using HMIS at PMCIs</td>
<td>1</td>
</tr>
</tbody>
</table>
According to this prioritizing methodology and using nominal group technique with the support of the technical staff of the RDHS office, the **Lack of participation of the public in the PMCI / HLC for NCD screening** was identified and taken as the main problem.

Major NCDs caused 34% and 50.7% of the deaths in the year 2018 and 2019 respectively. The increase in mortality is due to cardiovascular diseases followed by cancers (14%), diabetes (9%), hypertensive diseases and chronic reparative diseases (8%).

**Underutilization of the PMCI/HCL services by the target population**

The HLC services not being well marketed to the public, and the common attitude of being “healthy and not needing screening” among those who knew the availability of the service, are leading reasons for the underutilization of the services of HLCs. Men are less attracted to the service being mostly employed and at work during the HLC clinic sessions, which are confined to weekdays between 08:00 and 12:00.

**Weaknesses in the service orientation of PMCI /HLC**

The practical sessions on lifestyle-changing interventions are currently inadequate and limited to health education sessions in most HLCs except a few of those conduct regular physical exercise sessions for clients.

It is observed that adherence to the HLC protocols by the staff of HLC is variable. The use of the total-risk approach for CVD in managing the screened individuals is not always consistent with the protocols. Services for the screening of cervical cancer which is still delivered through “well-woman clinics” is not linked to HLC services yet. Though the original design of HLCs includes screening for chronic respiratory diseases using peak-flow meters, it is not being carried out routinely at present due to various reasons such as technical difficulties in getting the personnel to perform the test and non-availability of disposable mouthpieces etc.

**Insufficient human resources**

Most primary health care institutions where the HLCs are established function with a limited staff of all categories. No additional staffs were provided to such institutions to conduct the HLC clinics. The system of the health service of the country has no grass-root-level field health workers solely dedicated to NCD-related work either. Therefore, the current capacity of the health system to encourage the targeted population to utilize the HLCs, to follow up those who have already registered and to continue lifestyle-promotional activities is limited considerably.
Fish Bone Analysis

- Difficulties in reaching the system
  - GPs are identified as an alternative
  - Mal distribution of HLCs

- Cultural barriers

- Poor publicity to the target the population
  - Calculation errors
  - Communication gaps

- Not having flexible consulting hour

- Method

- Under Utilization of PMCI/HLCs

- Men
  - Demotivated staff
  - Conflicts among staff
  - High turnover of the Staff
  - Lack of resource Persons

- Materials
  - Lack of lab facilities
  - Lack of IEC Materials
  - Lack of Information Technology
  - Lack of equipment and Drugs
Discussion

This fishbone diagram analyses various categories of causes and contributory factors for the main problem. The lifestyle of the Nuwara Eliya district population is very divergent. The HLC should fit their lifestyle so as not to compromise their work and attend the HLC. In our current system, HLCs are conducted in a schedule as normal working hours. This may not be facilitating the utilization of HLC by all the population. HLCs are frequently situated along with a hospital and are supposed to screen the apparently ‘normal’ people. Usually, our population is not willing to come to hospitals unless they feel sick. But there are some elements of the health systems which reach the normal population such as the well-women clinic, mobile blood donation camps and many public health camps. The HLCs shall be pleasantly integrated with these.

### Percentage Distribution of Male and Female Participants Screened in Districts of PDHS, Central Province - 2022

<table>
<thead>
<tr>
<th>District</th>
<th>Male</th>
<th>Female</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nuwara Eliya</td>
<td>61.38%</td>
<td>38.61%</td>
</tr>
<tr>
<td>Kandy</td>
<td>64.60%</td>
<td>35.53%</td>
</tr>
<tr>
<td>Matale</td>
<td>67.59%</td>
<td>32.40%</td>
</tr>
</tbody>
</table>

Percentage of distribution of eligible male and female participants screened by districts in Central province, 2022

Source: National HLC database 2022
KPIs related to Broad Activity “Implementing and monitoring NCD control program”

<table>
<thead>
<tr>
<th>Key Performance indicator (KPIs)</th>
<th>KPI value for each district</th>
<th>2022</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percentage of persons 35 years and above screened for selected NCDs</td>
<td>Nuwaraliya</td>
<td>Kandy</td>
</tr>
<tr>
<td></td>
<td>7.40%</td>
<td>4.20%</td>
</tr>
<tr>
<td>Percentage of PMCIs having healthy lifestyle clinics (HLCs) (output)</td>
<td>100%</td>
<td>82%</td>
</tr>
</tbody>
</table>

**Conclusion**

When evaluating the Advancements in Implementing PSSP at PMCIs in the RDHS area in Nuwara Eliya it was identified that the baseline target of 2.48% of 35 years and more population screened in 2021, 7.4% was achieved in 2022.

**Recommendations**

Designed to encourage people to attend PMCIs in the RDHS area in Nuwara Eliya

1. **Improving the health literacy of people who are eligible for empanelment in the PMCI RDHS area in Nuwara Eliya**
   - Conduction of health education programs about NCDs for the people in the catchment areas of the PMCIs
   - Coordinate with DSs, GNs, schools, religious leaders, private institutions and estates to educate people

2. **Improving the awareness of people about the services rendered by the PMCIs**
   - Conduction of awareness programs to people about the services rendered by the PMCIs
   - Coordinate with DSs, GNs, schools, religious leaders, private institutions, and estates to educate people

3. **Improving the communication skills of the staff at PMCIs**
   - Conducting training programs on communication skills for the staff in PMCIs.

4. **Changing the attitudes of people about PMCIs, health staff and the services provided**
   - Conducting regular mobile NCD clinics for the people especially during public holidays
   - Commencing patient engagement groups at PMCIs
5. Designing and implementing policies to make it mandatory to seek healthcare from the nearest hospital except in an emergency
   - Identifying the gaps in the existing policy
   - Reformulate the policy so that the gaps are addressed
   - Advocacy and lobbying relevant stakeholders
   - Implement the policy and evaluate for success

6. **The operating hours of the HLCs are not convenient for the working population.** Therefore, clinics should be conducted on weekends or outreach programmes must be conducted to catch the working population.

7. **Supervision of the PMCIs / HLCs by MO – NCD and team** must be strengthened, and regular reviews must be done to monitor the functions of the PMCIs.

8. **Mechanism to be introduced to get customer's feedback.**

**References**


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