This consultancy is requested by:

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<tr>
<th>Unit</th>
<th>DC-HE Team</th>
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<tr>
<td>Division</td>
<td>WR Viet Nam</td>
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1. **Purpose of the Consultancy**

The APW holder will be tasked to consolidate the Online NCD Reporting system for new indicators requested by WHO and the Resolve To Save Live.

2. **Background**

To have a good system for reporting on NCD management, MOH got support from the WHO to develop the Online NCD Reporting (ONR) system based on DHIS2 in 2021. This system went to operation since middle of July 2021. As of May 2023, there are nearly 3,500 commune health stations (CHSs) in 55 provinces using the software to generate real-time report on NCD management. Data on NCD management have been automatically transferred from the ONR into the national health statistics software to reduce the workload for health workers.

In 2022, the WHO signed contract with the Health Information System Program Viet Nam (HISP) to developed indicators requested by WHO and the Resolve To Save Live (RTSL)- the donor for hypertension management in Viet Nam. Most of these indicators need cumulative data so that Structured Query Language (SQL) hook had to use for the purpose. As a result, the data download very fast compared to traditional one and this is very convenient for users. However, one of the disadvantages is that the dashboards to monitor the progress of these indicators are unable to create by users but the professionals.

Furthermore, this year WHO has been supporting for quality improvement of hypertension management at commune health stations (CHSs). The support will focus on all CHSs of a district in 8 provinces. Monitoring progress in these CHSs using ONR is critical. Therefore, disaggregated report in ONR into focused CHSs and remaining CHSs so that health authorities at provincial, regional and national level can follow is needed.

In order to making the ONR more convenient for users, we would like to seek consultant(s) to (1) add key indicators requested by MOH to the report using SQL hook, (2) create dashboards for indicators requested by the WHO and the RTSL and, (3) develop disaggregated report in ONR into focused CHSs and remaining CHSs so that health authorities at provincial, regional and national level can follow as well as (4) provide technical support for users nationwide to reach more and more commune health stations.

3. **Planned timelines** (subject to confirmation)

Start date: 15 July 2023
End date: 31 December 2023.

4. **Work to be performed**

The contractor in close collaboration with the WHO technical team to perform the following key actions:

*Activity 1: Create additional key indicators requested by MOH to the report using SQL hook.*
The key indicators include:
- Total number of CHSs (for each district, province and nationwide)
- Percentage of CHSs reported.
- Total patients detected (cumulative)
- Percentage of cumulative detected patients compared to estimated number of patients.
- Newly detected patients
- Patients visited this month
- Number of patients visited this month with blood pressure control (new standard)
- Number of patients visited this month with blood pressure control (new standard).
- Number of patients visited last 3 months with blood pressure control (new standard).

Activity 2: Edit custom reports.
Edit the custom reports disaggregated by Focused CHSs and Remaining CHSs (G1 and G2) to evaluate the effectiveness of the program of quality improvement of hypertension/diabetes management at CHS, includes:
- Edit custom report disaggregated by G1 and G2 until provincial level

Activity 3: Develop dashboards for indicator requested by WHO and the RTSL.
Develop dashboard to provide a visual representation of key indicators requested by WHO and the RTSL in a concise and easily understandable format, which support for monitoring performance and decision-making. Main activities include:
- Requirements Analysis
- Dashboard interface design
- Develop charts and tables
- Decentralize and deploy the dashboard

Activity 4: Provide technical support for users nationwide.

**Support for users:** To provide online support for users nationwide in applying the NCD software:
- Support for reporting and statistics of NCD.
- Create or update information, lock user accounts, decentralize user rights according to regulations.
- Receive, check and support for the requests for instructions on using functions on the software or checking data.
- Perform data control and reconciliation according to available/existing tools and solutions.
- Verify problems and fix errors arising in the course of using software.

**System administration assistance:** Technical support/assistance for maintain the system
- Support connection, data transfer/integration.
- Check the software’s activity log.
- Check the service status on the server of operating system.
- Backup database, periodical source code, check the integrity of databases after backup.
- Check the performance and load capacity of the software.
- Check and update patches, patches for information security vulnerabilities for operating systems, database management systems, web servers (webservers), ... and the components of the software system.
Deliverables
- Report using SQL hood with new indicators and disaggregated into focused CHSs and remaining CHSs.
- Dashboard for indicators requested by the WHO and the RTSL.

5. Technical Supervision
The selected Consultant/APW holder will work on the supervision of:

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<thead>
<tr>
<th>Responsible Officer</th>
<th>Email</th>
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<tbody>
<tr>
<td>Dr Lai Duc Truong, Technical Officer, DC-HE Team</td>
<td><a href="mailto:Laid@who.int">Laid@who.int</a></td>
</tr>
<tr>
<td>Dr Ngon Mya Sapal, DC Team Coordinator</td>
<td><a href="mailto:Ngonm@who.int">Ngonm@who.int</a></td>
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6. Specific requirements: The selected service provider must:
- At least 5 years’ experience in design and maintenance of database using DHIS2 platform.
- Experience in supporting users of health facilities nationwide for using a software.
- Directly involved in development of the Online NCD Reporting system is an advantage

7. Place of assignment
In Hanoi.

8. Cost.
All bids will be evaluated based on submitted proposal with detailed budget breakdown.

9. Travel
The APW holder will work in Hanoi.

10. Reviewed and cleared by:

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<tr>
<th>Responsible Technical Officer</th>
<th>Team Coordinator</th>
<th>WR</th>
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<th>Date</th>
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<tr>
<td>30 May 2023</td>
<td></td>
<td>7/6/23 WPVNM2219601; 18.2;74972;513; WP_VNM</td>
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11. Other requests to be approved:

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<tr>
<th>Team Coordinator</th>
<th>WR</th>
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<tbody>
<tr>
<td>WHO e-mail account</td>
<td>Yes [ ] No [x]</td>
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<tr>
<td>WHO laptop</td>
<td>Yes [ ] No [x]</td>
</tr>
<tr>
<td>Workstation at GOUNH</td>
<td>Yes [ ] No [x]</td>
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