



Nepal Health Sector Support Programme (NHSSP 3) – No Cost Extension

HEALTH INFRASTRUCTURE PROGRESS REPORT 1

February 2023



Contents

Abbreviations.....	3
1 PURPOSE.....	4
2 BACKGROUND AND UPDATE	4
3 PROGRESS.....	4
4 PROJECTION	11
5 OTHER DOCUMENTS / REPORTS IN THIS PERIOD.....	11
6 INSTITUTIONAL ARRANGEMENTS.....	12
7 KEY ACTIONS / ISSUES OVER THE NEXT PERIOD	12
8 NEW PROJECT DOCUMENTS	13

ABBREVIATIONS

ART	Anti-Retroviral Therapy
BEK	British Embassy Kathmandu
CSSD	Central Sterile Supplies Department
CT	Computerised Tomography
DUDBC	Department of Urban Development and Building Construction
ENT	Ear Nose Throat
FMR	Financial Monitoring Report
FPIU	Federal Project Implementation Unit
FRP	Fibre-Reinforced Polymer
HVAC	Heating, Ventilation, and Air Conditioning
NHSSP	Nepal Health Sector Support Programme
NICU	Neonatal Intensive Care Unit
OCMC	One Stop Crisis Management Centre
OPD	Out-Patients Department
PUDBC	Provincial Department of Urban Development & Building Construction
RPIT	Retrofitting Project Implementation Team
WRH	Western Regional Hospital / Pokhara Academy of Health Sciences

1 PURPOSE

This report sets out progress on the Priority Public Hospital Retrofitting Programme. It is produced by the Nepal Health Sector Support Programme (NHSSP) for the British Embassy Kathmandu (BEK) and covers the period from 22 November 2022 to 28 February 2023.

2 BACKGROUND AND UPDATE

The Priority Public Hospital Retrofitting Programme covers Bhaktapur Hospital and Western Regional Hospital / Pokhara Academy of Health Sciences (WRH). Details of the programme's approach to retrofitting, rehabilitation, and integrated interventions were set out in the first Retrofitting Monthly Progress Report January 2022.

The COVID-19 pandemic and the use of the Retrofitting Decant Facilities as COVID-19 Treatment Centres has caused major slippage in a project progress. However, since April 2022, the hospital management has made some alternative space available in both facilities for decanting. The decanting structures are still being used by the hospital and the retrofitting works are being carried out with alternative decanting strategies. Consequently, the Department of Urban Development and Building Construction (DUDBC) has extended the construction contracts for both hospitals to November 2023.

3 PROGRESS

This section summarises progress at the main buildings and activities at each site.

At WRH, the total **physical progress of main retrofitting capital works at WRH is 60%** and **financial progress (based on the information from Federal Project Implementation Unit (FPIU) / DUDBC) is 55%**. Physical progress of decanting services is 55% while financial progress stands at 18%.

At Bhaktapur Hospital, the **total physical progress of all capital works is 55%**, and financial progress (based on the information from the Provincial Department of Urban Development & Building Construction (PUDBC) / DUDBC, plus the running bill recently submitted by the contractor as part of the payment process) is 45%.

The budget and expenditure of retrofitting works in Pokhara and Bhaktapur in Fiscal Year 2079/80 (FY 2022/23) as per the First Financial Monitoring Report (FMR T1) and information collected from DUDBC is presented in Annex -2

3.1 Western Regional Hospital / Pokhara Academy of Health Science

	Building	Progress	Signal
1	Hospital Kitchen Block Construction	Complete and handed over	Complete
2	Central Sterile Supplies Department / One Stop Crisis Management Centre (CSSD / OCMC) Block Retrofit	Complete and handed over for the use of decanting purposes.	Complete
3	Medical Block Retrofit	Retrofitting works are progressing. Structural work is 98% complete with both internal and external plastering work finished. After variation approval by	

		DUDBC, skilled workers have been mobilised to carry out the outstanding roof treatment works. This work had been delayed because the previous workforce was not skilled enough to perform high-quality work. Other finishing works are underway. The block is expected to be complete by end of March and in hospital service by mid-April.	
4	Existing Maternity Block Retrofit	Despite an approved variation order, the contractor didn't start work citing the unavailability of the required sizes of wood for the joist replacements. However, market surveys by both DUDBC and NHSSP, showed that wood of the required sizes was available. This interruption caused a substantial delay in the work progress for this block. The contractor has recently placed a procurement order to wood matching the joist sizes. Testing and verification of the wood have been completed. The structural retrofitting work is 95% complete. Finishing works on the ground floor of Block II is in progress. The block is expected to be complete by the end of April and in use by mid-May.	
5	Out-Patients Department (OPD) Block	Retrofitting of OPD Block is continuing. Structural retrofitting work for the block is complete. The finishing works on the ground floor and the erection of the pre-fab walls are underway. The block is expected to be completed by the end of March and in use by mid-April.	
6	Pharmacy Block Retrofit	Alternative decanting plans proposed to the Hospital Management. Retrofitting initiation in April. Completion by June.	
7	Paediatric Block Retrofit	Decanting to Medical Block is planned to be completed by mid-April. Retrofitting initiation in May. Completion by November.	
8	Ear Nose Throat (ENT) and Computerised Tomography (CT) Scan Block Retrofit	Scheduled to start after completion of Maternity Block (anticipated end of April). Because of a substantial delay in the progress of the Maternity block, decanting is now to be complete by end of May, and retrofitting initiated by June with an overall completion date of November.	
9	Lab Block Repair and Maintenance	Complete and handed over	Complete
10	Toilet Block	Toilet Block (for Lab Block) is complete and in use.	Complete

11	Ramp Block Retrofit	Scheduled to start along with the retrofitting of ENT and CT Scan Block, and to be complete in June.	
12	Oxygen Plant Shed Construction with Oxygen plan	Complete and handed over.	Complete
13	Fire Fighting Water Tank Construction	Complete and handed over.	Complete
14	Emergency Block Retrofitting	Retrofitting initiation by July. Anticipated completion by October.	
15	Dental Block Retrofitting	Retrofitting initiation by June. Anticipated completion by November.	
16	Nutrition Block Repair and Maintenance	This is minor work, maintenance, and painting. Retrofitting initiation by August, with completion by November.	
17	Laundry Block Reconstruction of the upper storey	Retrofitting initiation by June. Completion by November.	
18	Anti-Retroviral Therapy (ART) Block repair and maintenance	All repairs and maintenance completed with painting. The ART block will be used for storage until the retrofitting of the OPD block is complete. The OPD retrofitting materials movement path comes in between the ART and OPD - it cannot be reoccupied until March.	
19	Decant Facility	40% of the Decant Facility space has been released and has been refurbished for its original purpose.	Complete.
20	Reconstruction of Old Kitchen Block. (Analysis showed the block was not feasible for retrofitting)	The foundation up to the plinth level has been completed. The block is expected to be complete by end of September.	
20	Fourth package	The fourth package tender notice was published on 12 February. Construction is expected to start by mid-April.	

Signal	Explanation
	Work is completed or on track for completion before November 2023.
	Work is underway, or has a projected start date, with possible completion before November 2023
	Work is delayed, and at this stage is not expected to be completed before November 2023

Note: Under the RHITA+ Extension, the completion date has been changed to the end of November 2023 with the handover, verification, payments, and final documentation in December 2023.

Technical issues:

- **Approval of Slate:** The slate samples previously submitted by the contractor do not meet the requirements. Further samples have been requested to ensure compliance with standards.
- **Skilled Human resources:** Skilled workers are required for outstanding retrofitting works – particularly, roof treatment works with high-strength mortar and fibre-reinforced polymer (FRP), wood works, and slate roofing. The contractor has been reluctant to mobilise such skilled staff. This has delayed progress because work quality has been poor, and has to be repeated. The contractor has been instructed to mobilise the necessary skilled human resources to ensure the quality of work on time.
- **Environment, Health, and Safety at the site:** The contractor and construction workers are not following proper health, safety, and environmental measures at the site. Hospital management and NHSSP have reported these issues many times. The contractor has been instructed several times through DUDBC to follow environment, health, and safety standards with proper cordoning of the construction site with noise barriers as per specifications and follow the agreed construction route.

Contractor performance: The construction contract of WRH has been extended until 13 November 2023 by DUDBC. However, the contractor's performance is not adequate and human resources are insufficient. The contractor is reluctant to procure materials on time, ignoring communications from DUDBC. The contractor has yet to submit the detailed construction management plan to complete the project within the extension period, despite instructions to do so from the Coordination Committee and FPIU/DUDBC. The contractor's representative also misbehaved with NHSSP team members many times during field monitoring visits. NHSSP has written to DUDBC - copied to the Ministry of Health & Population (MoHP) and the Hospital management - calling for appropriate action to be taken. No response has yet been received. NHSSP is continuously following up with DUDBC to ensure safeguarding measures at the site to protect the staff and to run the construction works smoothly without compromising the quality standards.

Project management: A joint team of MoHP, DUDBC, BEK, and NHSSP representatives visited the site on 23-24 January 2023 to monitor work progress and to discuss issues and challenges. Reflections from the visit were reported to the Steering Committee meeting held on 10 February 2023. The meeting stressed planning to achieve project completion within the extended contract period. Given the gravity of the project situation, the Steering Committee has decided to review progress reports monthly, carry out regular on-site monitoring visits, and provide necessary advice and instructions. The Steering Committee has formed a Task Group led by the Chief of the Health Coordination Division, MoHP. DUDBC and NHSSP are jointly organising a workshop for each site to develop a realistic project schedule with coping strategies to ensure the timely completion of work without compromising quality. At the project site level, coordination committee meetings (chaired by the Director of WRH) are being held regularly for coordination and resolution of on-site issues collectively with hospital management. The Retrofitting Project Implementation Team (RPIT), chaired by the FPIU Chief, and the technical sub-committee at the site level have been regularly meeting to resolve technical issues at the site.

Relationship with DUDBC and hospital management: Relationship with DUDBC and hospital management is satisfactory.

Progress with Fourth Package: The Fourth Package tender notice was published on 12 February 2023 (see tender notice). The tender evaluation and contract award are expected to be complete by the end of March.

Specific items identified in the previous Progress Report:

- **Maternity Block Wood Joists:** Although the variation order had been approved, the contractor didn't start work, citing a lack of suitable wood for the joist replacements. However, both DUDBC and NHSSP found the wood of the required size in the market. The contractor has recently placed a procurement order to wood matching the joist sizes. Testing and verification of the wood have been completed. This issue caused a substantial delay to progress but has now been resolved.
- **Reconstruction of Old Kitchen Block** - Following discussions in October 2022, DUDBC agreed to reconstruct the Old Kitchen Block through a variation in the main retrofitting contract. Construction is now underway.
- **Approval of Variation items:** All the variation items required to date have been approved by DUDBC.

3.2 Bhaktapur Hospital

	Building	Progress	Signal
1	Construction of New OT Block	<p>Overall work on the New OT Block is 94% complete. The main areas of progress are:</p> <ul style="list-style-type: none"> • Structural and partition walls work with outside painting are complete. • 80% of finishing work is complete. • 90% of electrical and sanitary works are complete. Oxygen pipeline work is 60% complete. • Lift equipment has been delivered to the site and is being prepared for installation. • After a long delay, the contractor has ordered the heating, ventilation, and air conditioning (HVAC) system and other special finishing items (such as anti-bacterial paints, pendants) for OT completion. <p>Due to this slow procurement, the OT Block construction completion is now anticipated by end of March, excluding some HVAC items.</p>	
2	Retrofitting Emergency Block	Emergency Block handed over and used for decanting of the Maternity Block	Complete.
3	Retrofitting of Existing Maternity Block	Now underway. Two shear walls at the north and south side up to the plinth level and foundation concrete work at the east side are complete. The excavation at the	

		<p>west side has been progressing after the diversion of the existing sewer lines.</p> <p>Serious construction defects in the existing structure system (both foundations and columns) have been found during excavation. Guided by the technical analysis, the necessary corrective measures to rectify the existing defects have been implemented.</p> <p>Unforeseen conditions (such as the foundation problems), along with a lack of proper management of the existing site condition with inadequate skilled human resource mobilisation by the contractor have delayed progress. The Maternity Block is now expected to be complete by end of May.</p>	
4	Construction of New Link Corridor	The foundation work is complete. Completion of the corridor is planned to finish simultaneously with the completion of the Maternity Block.	
5	Construction of Mortuary Block	The Mortuary Block is complete, apart from minor finishing works and defect corrections. Despite the previous agreement, the Red Cross Society has still not removed its temporary shed next to the Mortuary Block. As requested by the hospital, DUDBC is planning to hand over the block in the 1 st week of March.	
6	Retrofitting Main Block	Scheduled to start after completion of OT and Maternity block. At this stage, scheduled to start by May, with anticipated completion by November. Need a proper construction management plan with coping mechanism to complete the construction within 6 months(the extended period).	
7	Construction of New Hospital Kitchen Block	Now scheduled to start by April, with completion anticipated by August.	
8	Decanting Facility	Currently, it is occupied by the neonatal intensive care unit (NICU), ICU, PCR test lab, and storage space.	Complete.
9	Fourth Package	The Fourth Package tender was published on 10 February 2023. The tender evaluation and contract award are expected to be complete by the end of March.	

Signal	Explanation
	Work is completed or on track for completion before November 2023.
	Work is underway, or has a projected start date, with possible completion before November 2023
	Work is delayed, and at this stage is not expected to be completed before November 2023
Note: Under the RHITA+ Extension, the completion date has been changed to the end of November 2023 with the handover, verification, payments, and final documentation in December 2023.	

Technical issues:

- Construction defects in the existing substructures in Maternity Block:** During the excavation of the foundation for retrofitting works, serious construction defects were found, including honeycombs, voids, rusting of rebars, and lack of ductile details in the columns, as well inadequate foundation depth and column size. After detailed analysis, revised retrofitting design drawings with defect correction measures have been provided to DUDBC and the contractor. However, the contractor carried out these measures without following recommended procedures in the period when the engineers from DUDBC and NHSSP were absent. This has been reported as a serious quality issue. In addition, other retrofitting works have been below specification due to lack of skilled human resources. The contractor has been instructed through DUDBC to redo and rectify the defect corrections as per recommended procedure, mobilising skilled workers under the direct supervision of DUDBC and NHSSP engineers. This has caused a substantial delay in the progress of work.
- Use of construction materials not as per specifications:** It has been found that the materials for finishing and sanitary works were not as per specifications. The contractor claimed that the materials specified were not available in the market. However, DUDBC and NHSSP market surveys found that this was not the case. The contractor has been instructed to carry out work using approved materials.
- Environment, Health and Safety at the site:** The contractor and construction workers are not following the agreed construction route and proper health and safety measures at the site. Hospital management has raised their concerns on the environmental problems and its effects on the hospital services and patients. The contractor has been instructed several time through DUDBC to follow environment, health, and safety standards with proper cordoning of the construction site with noise barriers as per specifications and follow the agreed construction route.

Contractor's performance: Despite the warning to the contractor and the contractor's commitment to improve work performance, mobilise adequate and skilled human resources, and procure the materials and equipment on time, delays in work progress continue. NHSSP has requested DUDBC to reassess the qualifications of the contractor's technical human

resources – particularly, to see if they are employing the engineers and experts as agreed in the contract. The completion of the laboratory setup at the site as per specifications is still pending despite of rounds of follow-up.

Project Management: A joint team from DUDBC, BEK, and NHSSP visited the construction site on 8 February 2023 to monitor work progress and to discuss issues and challenges with the hospital management and the contractor. The field observations were discussed in the Steering Committee meeting held on 10 February 2023, and the committee has instructed DUDBC to complete the retrofitting works in the extended period without compromising construction quality standards and with proper health, safety, and environmental measures at the site. The issues and challenges are regularly discussed and resolved through the Coordination Committee and RPIT meetings.

Relationship with DUDBC and hospital management: Relationship with hospital management and DUDBC is satisfactory. The slow progress of construction and its impact on hospital service delivery (reduced beds, services, and revenues as well as environmental issues) due to poor contractor performance has been discussed several times with DUDBC and the hospital management. The contractor has been instructed to improve their construction management with proper health, safety, and environmental measures.

4 PROJECTION

At this stage, retrofitting works at specific buildings in each hospital remain seriously delayed. Total capital works at Bhaktapur Hospital and WRH Pokhara are 55% and 60% complete respectively.

Due to different reasons (COVID-19 pandemic, the lack of decanting facilities, local elections, quality of construction, shortage of construction materials due to Government decisions, and contractual and construction management causes), the contract period has been extended to November 2023. The contract for retrofitting works in Bhaktapur Hospital has been extended with liquidated damage of 30 days of the total 11 months. Alternative decanting spaces have been devised, so the reduced areas available in the Decanting Facilities should no longer hamper progress. The NHSSP team has produced a delay analysis with updated completion projections at each project.

To complete the construction within the extended period, an environment for working in multiple shifts should be created. The construction work should be carried out by increasing working hours with multiple shifts and mobilising adequate human resources. The contractor should plan the construction activities by providing personnel, materials, and equipment at the right time, in the right quantities, and in accordance with the quality requirements. The decanting strategy and plan especially for WRH should also be revised and prepared by consulting with Hospital Management according to construction schedules to cause minimum disturbance to hospital services.

5 OTHER DOCUMENTS / REPORTS IN THIS PERIOD

The NHSSP team has documented and produced designs, drawings, reports, meeting minutes, and communications related to retrofitting works at both hospitals which can be accessed through the link provided below in One Drive (access can be provided to the person on request). The list of newly posted documents is included at the end of this report.

6 INSTITUTIONAL ARRANGEMENTS

The role of the HI team has changed substantially due to severe budget cuts. The HI team now comprises:

- HI Team Leader
- Senior Architect
- Structural Engineer
- Civil Engineer
- Site Engineer WRH
- Site Engineer Bhaktapur

NHSSP completed the recruitment through competitive processes, and Structural Engineer joined mid-Feb, and the Site Engineers are expected to be in place by 2nd week of March 2023.

HI team activities are limited to the following:

- Monitor progress of retrofitting works, supply designs and details as requested by DUDBC, and provide TA at the sites only as requested by them.
- The on-site presence of Site Engineers, with regular site visits by senior HI team members. This will include quality checks – analysing the test reports and reporting issues promptly to DUDBC for action.

The HI team is not involved in construction management or procurement management.

BEK has required this restructuring and change of roles under the RHITA+ Extension, The possible risks and its mitigation measures are presented in Annex 3.

7 KEY ACTIONS / ISSUES OVER THE NEXT PERIOD

Key actions and issues to be addressed in March 2023 are as follows:

- As decided by the Retrofitting and Health Infrastructure Steering Committee meeting held on 10 February 2023, DUDBC and NHSSP are jointly organising workshops for each site in March to plan and formulate the strategies for the completion of the project within the contract period with all necessary actions and responsibilities identified.
- The Monitoring Task Group led by the Chief of the Health Coordination Division MoHP will monitor the progress of the work regularly.
- NHSSP will track the progress daily and weekly which will be summarised each month and presented to the Steering Committee.

Western Regional Hospital Pokhara

- A revised Decanting Plan and activity schedule have been prepared and agreed with the Hospital management and DUDBC. The contractor was asked in December 2022 to submit their plans for completion of the work within the extended time. The detailed construction work-plan and activity schedule still have not been submitted by the contractor, despite several communications with the contractor through DUDBC.
- Expedite the retrofitting and finishing works at OPD, Maternity, and Medical Blocks by increasing human resources and working hours and timely procurement of the materials

and equipment for decanting and initiating retrofitting of Paediatric, CT Scan, ENT, and Dental Blocks

Bhaktapur Hospital

- Expedite the finishing works at OT Block, retrofitting work at Maternity Block, and construction of the Link Corridor.
- Plan and start the retrofitting work of the Main Block, Kitchen Block, and Toilet Block in line with the approved schedule.

8 NEW PROJECT DOCUMENTS

Project documents posted to **One Drive** during the reporting period are as follows: The link is provided below. Please copy and paste the link in the web browser

https://nhssp-my.sharepoint.com/:f:/g/personal/ujjwal_nhssp_org_np/EISm9RpRHwxMm1pM4LXgCKoB_ELLp1kYcwc5lwxV0CA4HA?e=cujoDU

