

Case Study on Low Bidding in Public Procurement: A Case of Dharhara Reconstruction Project

Submitted To

Centre for Research and Development
Research and Consulting Service Department
Nepal Administrative Staff College

Submitted by

Research Team
Raghu Bista, Lila Nath Sapkota

2023

Introduction to Study

Dharhara has been one of the iconic heritages of Kathmandu Valley built around 1834 and represents the historic asset of that time. Dharhara itself means man-made high building, Minar, tower, Ghantaghar, and so on. From its structure, it may have got its name. It is also called the Bhimsen Tower, as it was built by the prime minister of that time, Bhimsen Thapa, which was a nine-storied (50.2 meter) tall tower at the center of Kathmandu Valley. It was rebuilt after being severely damaged in a 1934 earthquake.

The earthquake of 2015 damaged 1320 Gumbas and 920 heritage monuments besides the life losses and loss of many other government and private properties. One of the important monuments destroyed by the earthquake had been Dharhara. The government did Post Disaster Needs Assessment (PDNA) and Post Disaster Recovery Framework (PDRA). Nepal government decided to construct historical monuments and cultural Heritage identified by PDNA (Post Disaster Needs Assessment) and PDRF (Post Disaster Recovery Framework) Dharhara reconstruction has got important priority from the then government. Nepal government expressed its commitment to rebuilding the Dharhara and preserving its historical significance. Dharhara reconstruction project aimed to restore the tower to its original design while incorporating modern construction techniques to enhance its safety and resilience against future earthquakes.

The scope of the project was expanded. The scope includes constructing 83 meters' tall tower (Dharhara), preserving Dharhara damaged by the 2015 earthquake in its damaged shape, three floors of parking areas, conserving historic Sundhara in its plan, some commercial complexes, underground parking spanning around 22 ropani land, Ment Museum, small temples, two lifts, rest place with beautiful garden and musical fountain, etc. The land covered by the Dharhara was 5 ropani only which will be increased to 42 ropani now.

National Reconstruction Authority (NRA) was established in December 2015 and it took responsibility to manage the Dharhara project in 2017. It was planned to complete by the end of 2020. Department of Archeology (DOA) was made responsible for developing detailed project report (DPR) and preparing project bidding documents. NRA was made responsible to process procurement by inviting bids, evaluating bids, selecting contractors, awarding contracts, and managing contract administration. Centre Level Project Implementation Unit, under the Ministry of Urban Development, was made responsible for providing expert project team members.

The scope of the project includes Dharahara tower with two basements, restoration of Sundhara, landscaping, protection of Bhimsen Tower ruins, lifts, utility blocks, ticket counter, administrative blocks, Mint Museum Block, cub buildings, electrical, sanitary, furnishing, etc.

After bid evaluation, the best bidder was found to be GIETC and Raman J/V. The contract was awarded and signed on 14 Ashoj 2075 with the contract amount was Rs 3, 48, 16,91,238 (including vat). The date for initial completion was 05 Bhadra 2077. After extensions of time, the revised completion date was 30 Paush 2079. However, as per the progress report of Jestha 2080, only 81% of physical progress and 68% of financial progress have been reported.

The extended time to complete the project is the end of 24 Ashoj 2080. The project manager explained many reasons behind the delay.

The contractor is demanding further extension of time to complete the scope of the Dharhara Reconstruction Project, the employer, Central Level Project Implementation Unit (CLPIU), and Department of Urban Development of Building Construction have not decided yet, and time extension is still in process. As a result, the future of completing the work of the Dharhara Reconstruction Project has still been uncertain.

Focus and Objective of Case Study Research

The main focus of the study is to identify the motivating factors for low bidding in Dharhara Reconstruction Project and its effects on project performance.

Objective of Case Study Research

- To review the performance of the Dharhara Reconstruction Project
- To find out the enabling environment of low bidding from the contractor's perspectives
- To identify effects and impacts on project performance with low bidding
- To generate learning points

Public Procurement and Issues of Low Bids

Procurement is the act of acquiring goods, works, and services by projects or organizations at the best possible cost in the right quantity and quality at the required time. It is one of the four major economic activities of the government (Thai, 2001). The process starts with the identification of needs, planning procurement, preparing bid documents, receiving bids, bid evaluation and selection, awarding contracts, and managing contract and post-contract activities. It is a major function of public organization. It is a vital activity of development projects. Procurement occupies a considerable portion of the project budget. Some 25% to 50% of government spending is spent on sourcing goods and services and mainly through Public Procurement (Csaba, 2006). The size of expenditure can make a big change in the economy.

Given the importance of procurement and contract management, the Government of Nepal has introduced a procurement act and regulation to regulate and facilitate procurement-related activities in public entities. The public procurement act 2007 and the regulation of Nepal have given importance to efficiency, transparency, value for money, etc. as core principles. As a result, a competitive bidding process is followed. Based on these principles, contractors or suppliers who offer lower bids for works or goods will be awarded contracts. Article 25 of the Act states that projects must be awarded to the party that bids the lowest (Public Procurement Act 2063). However, such contractors /suppliers have been blamed for not completing assignments, delaying activities, poor quality, and poor delivery.

Regarding the definition of low bid, there is a lack of uniformity. Wagle and Mishra, (2022) provide many examples of the definition of low bids to show the lack of uniformity. As per the National legislation of the United Kingdom low tender abnormally is the one which deviates by 10%-15% from the average price tendered; as per Luxembourg law, a low bid is defined in terms of a price that leaves no margin for a normal level of profit, while the law adopted in Lithuania in 2009 mentioned that a tender is abnormally low either if it is 15% or lower than the average of the other tendered prices, or if it is 30% or lower than the authority's original estimate. The Public Procurement Act of Nepal has made provision to keep additional performance security if the bid is lower than 15% of the original estimate.

The study conducted in Tanzania reported that supplier selection and supplier monitoring significantly play a role in cost reduction as a measure of public procurement efficiency in Tanzania (Changalima, I. A. et al., 2023). Supplier or contractor selection through the lowest evaluated bid offer has been blamed to be ultimately inefficiencies and costly in Nepal due to loss

of opportunity value from the project. Public organisations have been complaining about low bidding as a serious problem in public procurement management. Even contractors in Nepal are also demanding the government of Nepal to change the present practice and suggesting alternative selection methods based on average bid price not on the lowest cost (Shrestha, 2014).

Both quality and scheduled performance of the lowest evaluated bidders have remained the issues of concern. In the case of Pakistan, Khan and Khan (2015) found that the quality of completed works by the lowest bidders was found to be just and not optimum and it is discovered in the research that the schedule performance of most projects awarded on the responsive least bidder bid award procedure was not satisfactory. As per the study's conclusion, 70% of the respondents consider the multi-parameter bidding method to be more effective than the lowest bidding method. Deep et, al (2017) found that providing contracts to the lowest bidder leads to inferior quality and arbitration which will further lead to delays in the schedule and thereby cause an increase in costs due to price escalation.

ADB (2018) describes many good reasons a bidder may offer a low bid price. As one example, the bidders may intend to quote only at a cost to establish their business in a country or sector to gain experience to compete for future bidding. Low bid particularly abnormally low bid is not in and of itself negative, but it requires additional investigation, as it could bring many additional risks like lack of technical and commercial competence, an intent to not follow design standards or specifications, and/or an intent to not comply with environmental or labor laws (2018). The Indian agencies like Central Vigilance Commission (CVC), Comptroller and Auditor General (CAG), and NITI Aayog felt that the awarding lowest cost bid system could result in compromising the quality of work, delays, and cost overruns since the bidder is selected based on the lowest cost quoted (the Print, 2021). Under revised guidelines, the Indian government has now allowed the selection of bidders through other procurement methods like Quality-cum-Cost Based Selection (QCBS).

Wagle and Mishra (2022) studied trends of low bidding practice at Division Road Office Bharatpur and reported that 52.94% of road construction works, 46.15% of bridge and structure construction works and 25% percentage of maintenance works were suffering from low bids. Nepal government has also considered low bids as problematic situations and made some provisions to discourage bidders by keeping additional performance security for selected bidders with the lowest bid. If the

bid price of the bidder selected is up to 15% below the approved cost estimate, the performance security shall be 5 % of the bid price. If the selected bidder's price is more than 15% below of the cost estimate, the performance security shall be determined as follows: performance security = $[(0.85 \times \text{Cost Estimate} - \text{Bid Price}) \times 0.5] + 5\% \text{ of Bid Price}$ (Public Procurement Act 2007, First Amendment).

Though public procurement has got growing significance in the case of Nepal, there is a gap in knowledge about whether low bidding practice has helped deliver project results or hindered progress. It is very important to study to what extent low bidding has been a problem. Why are contractors offering low bidding price to get contracts for works? What are the implications faced by the project? These all issues are crucial in procurement management. There is a lack of study on why are there increasing low bidding practices in Nepal. Dharhara Reconstruction project has been used as a case to understand the motivation, effects, and impacts of low bidding in public spending.

Methodology

Mixed methods were used to study the effects and impacts of the low bidding situation of the Dharhara Reconstruction Project. Secondary as well as primary data collection methods were used. Particularly, an in-depth interview study was used as the primary method to understand in depth the motivation for low bids, challenges faced by contractors to complete work within contract price, difficulties and risks faced, and time and quality problems faced by the project.

Data Collection

To collect primary information an open-ended nature of question was developed (appendix A). The main questions searched in the interview were about the effects and impacts of selecting contractors/suppliers offering low bids and will be on whether alternatives are required. The opinions of the respondents will be accurately noted. Likewise, interviews with private parties were used to understand deeply the motives behind low bidding and its effects on project execution, performance, and profitability.

A total of 7 persons were interviewed. The interviews were stopped after receiving similar nature of responses. Respondents were the project managers, engineers, procurement specialists, employees of contractors, and consultants of the Dharhara Reconstruction Project as well as the members of the contractors' association. The maximum time for the interview remained to be half

an hour. Secondary data was collected from project documents and progress reports. Data generated were analysed and interpreted to draw meaning related to study objectives.

Data Analysis

As the in-depth interview is a qualitative method, the process of data analysis involves making sense of text and image data (Creswell, 2009). Data obtained from secondary sources were accumulated, filtered, and analysed and conclusions were developed. The responses obtained from in-depth interviews were read and re-read and analysed, interpreted, and meaning was drawn. The information generated from the study was interpreted to derive meanings or in our case whether the low bidding practices have been affecting particularly project schedule performances.

Analysis and Findings

1. Problems faced by Project during implementation

Project site clearance

The project scope site was expanded from 5 ropani area to 42 ropani area. The land issues of the Employee Provident Fund (EPF) are still problems. The project wants 18 anna land that belongs to Employee Provident Fund (EPF) however, EPF has not agreed to provide its land yet and it has some conditions also regarding its Kathmandu Mall at Sundhara. It took significant time for the project to resettle the Department of Postal Service and the Department of Printing into a new location.

Social Issues

Locals are asking for a Road on the north side of the Dharhara area that needs a higher level of government. According to the demand of the locals, the project took more time to build the temples and other cultural aspects as per the stakeholders' interest, which was not in the original contract. Many other stakeholders are having different interests and demands. Kathmandu Metropolitan has its demand, some local communities have their demand. The local conservationists demand that the flow of water from the Sundhara tab should be natural as it was before the earthquake of 2015.

The local demand seems can not be fulfilled technically. As per the project manager, efforts have been made to convince local conservationists.

Scope Variations

The administrative building and ticket counter of Dharahara were added during the construction phase. The design of the Mint Museum was provided to the contractor only on 08 Baishakh 2078. The addition of temple and traditional Pati were also added during the construction phase which also took additional time.

Covid -19 and its Impacts

During Covid -19, physical works were halted and the progress was slower than the scheduled works at Dharahara site. It was a national phenomenon. The impacts were felt in almost all of the construction industries. As per Timilsina, et al., (2021), the operational level impact was related to delays in project completion, supply chain problems, difficulty in workforce management, and maintaining the health and safety of the workforce. The employer extended six months duration as force measure situation in the case of Dharahara due to covid- 19 in case of Dharahara.

Performances of Contractor

Initially, the contractor has worked hard to complete the Dharahara tower which the then Prime Minister KP Sharma Oli inaugurated the 83.85-meter-tall cylindrical monument, Dharhara on April 24, 202. After completing tower, the performances were found to be slower. The contractor, GIETC and Raman J/V has not mobilized sufficient manpower and materials and has not been doing work as per commitment. This indicates it technical capacity to complete works within the committed date. Rising prices of construction materials, labor, and fuel have significantly affected contractors' financial situations during the project and contract implementation.

Dedication of Project Team

Dharhara project was initially 24 months project however it had already taken additional 29 months but has not been completed yet. Now, the NRA has already been closed and responsibilities for managing the project have been given to the Department of Urban Development and Building

Construction. The project team is of a matrix nature where the project manager has to fulfill multiple responsibilities besides Dharahara project.

2. Motivation and Practice of Low Bidding

The estimated cost of the Dharahara project was Rs. 4, 40, 68, 43,5,87.20, including VAT. The lowest evaluated bid amount was Rs 3, 48, 16, 91, 238.36, including VAT, which was approximately 21% below the estimated cost. Despite the bid being significantly lower than the estimated cost, the engineers and contractors believe they can still earn profits. Provisions for 15% profits for contractors and potential savings in inputs cost are among the factors contributing to this belief.

In general, the respondents indicate that contractors have various motivations to offer low bids, including idle labor, materials, and machines that can be efficiently utilized. They may also explore new methods and technologies to complete the project efficiently. They can purchase in bulk, in large quantities, or at factory price, and exploit labor by using them for additional hours than standard. Some contractors may even misuse project advance amounts for speculative investments or to fund other pending contracts. In some cases, the bidders have the intention to offer a low bid to occupy the contract and to maintain turnover. In many cases, the main contractors only take a percentage, the real works are managed by small contractors. If contractors find opportunities to compromise quality, they may also offer low bid prices. In some cases, the estimated cost is higher due to not following scientific norms or lack of scientific norms of cost estimation. In such a case, the bidders go even lower than the estimated cost. However, in the case of Dharahara, the respondents including the employees of contractors agreed that the possibility to earn despite getting contracts at below price is the motivation.

3. Effects of Low Bids on Schedule Performances

Almost all the respondents argued that low bids can lead to low-profit margins, which may affect the timely completion of projects. Contractors may resort to claims and compromise on quality to manage financial difficulties and remain profitable. Due to the rising price of construction materials, labor, and particularly fuel, the contractor's financial situation was sharply affected.

However, in the case of Dharahara, analysis from respondents' views indicates that the main reasons for delays go to contract management, not because of low-price bidding by contractors.

4. Project Delays and Lost Opportunities

Opportunity loss refers to the potential benefits or advantages that are missed or not realized due to project delays. These opportunities could be related to various aspects. As Dharahara is one of the iconic attractions of Nepal, delayed completion has affected many aspects. If Dharahara had opened for tourists two years earlier, it would have earned a significant amount of foreign currencies and added brand value to Destination Nepal. Dharahara often has revenue projections associated with its successful completion. Delays can result in delayed revenue generation. If it had been completed in the scheduled time, it would have earned a significant amount of revenue.

Conclusions, Lesson Learning, and Suggestions for Implementation

The main motivating factor for offering a low bid price was the profit potential of Dharahara contract works despite being low. Though the low bid price seems less related to project schedule performance, the contractor's capacity to mobilise resources as committed indicated its technical capacity and reduced chances to earn good profits. The project is in the fifth time extension phase; the new extended time to complete is 24 Ashoj 2080. However, the project team is not confident that they will deliver results by that time.

The slow progress of the project can also be linked to the bid capacity of the contractor. The issues of bid capacity could be addressed by verifying bid capacity and avoiding fake turnover during tender evaluation which is not in practice in Nepal. The calculation of effective working days would have helped to develop a workable schedule by considering factors such as festivals and rainfall seasons, that was lacking.

To ensure completion of work by that time, construction, the revised schedule has to be prepared taking into account that effective working days can be impacted by factors such as festivals and rainfall seasons, which may disrupt the progress of the Dharahara project. The commitment of

contractors to mobilize required resources, speed up work, and daily progress measuring and control are equally important. On the employer's part, social and environmental issues need to be resolved to favorable environment for the contractor. The remaining issues on land acquisitions and clearances of social issues are to be resolved as early as possible.

In summary, project delays can have far-reaching consequences, impacting not only the project itself but also the overall success and competitiveness of the organization. Timely and effective project management, risk assessment, mitigation strategies, and well-designed monitoring control functions are essential to minimize the risk of delays and opportunity loss.

References

Asian Development Bank (2018). Abnormally low bids: Guidance Note on Procurement, ADB Manila July 2018.

Changalima, I .A et al. (2023). Effects of supplier selection and supplier monitoring on public procurement efficiency in Tanzania: a cost-reduction perspective, Vilakshan – XIMB Journal of Management, Emerald Publishing Limited, online published on 02 January 2023

Creswell, J. W. (2009). Research Design: Qualitative, Quantitative, and Mixed Approaches. 3rd ed., Sage Publications.

Csaba, C (2006). Investigating the decision-making practice of public procurement procedure, International Public Procurement Conference Proceedings, 21-23 September

Deep, S. et, al. (2017). A Review of Contract Awards to Lowest Bidder in Indian Construction Projects via Case Based Approach, Open Journal of Business and Management, Vol.5 No.1, January 2017

Gupta, M D. (2021). Lowest cost or ‘L1’ no longer the only way to select bidders — why Modi govt revised policy, The Print, 09 November, 2021, Assessed on 16 July 2023, from <https://theprint.in/theprint-essential/lowest-cost-or-l1-no-longer-the-only-way-to-select-bidders-why-modi-govt-revised-policy/762738/>.

Khan, H. K. and Khan, A. Q. (2015) Effects of Lowest Bidding Bid Awarding System in Public Sector Construction Projects in Pakistan, Global Journal of Management and Business Research: G Interdisciplinary, Volume 15 Issue 1 Version 1.0 Year 2015

Public Procurement Act (2063), First Amendment, Government of Nepal

Shrestha, S. K. (2014). Average Bid Method – An Alternative to Low Bid Method in Public Sector Construction Procurement in Nepal, Journal of the Institute of Engineering, Vol. 10, No. 1, pp. 125–129 © TUTA/IOE/PCU

Thai, K. V. (2001). Public Procurement Re-examined, Journal of Public Procurement, Volume 1, Issue 1, pp: 9-50

Timilsina, S. P., et, al. (2021). Impact of Covid-19 on Construction Industry of Nepal. Modern Economy, 12, 1232-1244

Wagle, B and Mishra, A. K. (2022). Contracts Trends in Different Categories of Projects Under Bharatpur Road Division, International SOCIAL MENTALITY AND RESEARCHER THINKERS Journal, Vol: 8, Issue:55, Year 2022, pp: 17-29

Appendix



NEPAL ADMINISTRATIVE STAFF COLLEGE Governance and Development Management Learning Group Center for Project Management

Low Bidding in Public Procurement: A Case of Dharhara Reconstruction Project

Low bidding practice has been frequently blamed for not completing project on time, on quality, and on scope etc. The public procurement process of Nepal (article 25 of PPA 2063) states that project must award to substantially responsive party that bids the lowest (Public Procurement Act 2063). Based on these principles, contractors or suppliers who offer lowest bid for works or goods will be awarded contract. Our case study is related to study whether this practice is one of the reasons for delay and other malpractice. We will highly appreciate your contribution. The study's finding will be a base for further study and application/improvement in public procurement management.

Dr. Raghu Bista, Director of Studies and Lila Nath Sapkota, Training and Research Officer are the team member of this study. Your opinion regarding the issues will be important to address the issues. We are grateful for your valuable time and consideration.

Questionnaire:

1. Why is Dharahara project not completed on scheduled time?
2. Why do bidders are offering low bid amount for works?
3. Is there technically possible for bidders to earn profit from the contracts they will get from offering low bidding of amount that is below 15% of estimated cost of works?
4. Does low bidding lead to delay delivery? Do you have any observation regarding Dharahara project?

Thank you for your cooperation