



Government of Nepal

Ministry of Federal Affairs and General Administration

Department of Local Infrastructure Development
and Agricultural Roads (DoLIDAR)



Schweizerische Eidgenossenschaft
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Federal Department of Foreign Affairs FDFA
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स्वीस सरकार विकास सहयोग एमडब्ल्यू



Yearly Plan of Operation (YPO) for Fiscal Year 2075/2076 BS

(17 July 2018 to 16 July 2019 AD)

(Phase-III, Year II)



LOCAL ROADS BRIDGE PROGRAMME (LRBP)

Government of Nepal (DoLIDAR) in collaboration with Swiss
Agency for Development and Cooperation (SDC)

July 2017

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Acronyms

BCG	Bridge Construction Group
BIMP	Bridge Improvement and Maintenance Project
BIMS	Bridge Information Management System
BS	Bikram Sambat (Nepali Calendar)
BSPC	Bridge Selection and Prioritization Criteria
CHF	Swiss Franc
CMS	Contract Management System
SSO	Social Safeguard Officer
DAG	Disadvantaged Group
DDC	District Development Committee
DCC	District Coordination Committee
DLI	Disbursement Linked Indicator
DoLIDAR	Department of Local Infrastructure Development & Agricultural Roads
DoR	Department of Road
DPR	Detail Project Report
DRCN	District Roads Core Networks
DTICC	District Transport Infrastructure Coordination Committee
DTMP	District Transport Master Plan
DTO	District Technical Office/Officer
EMP	Environmental Management Plan
FFA	Fund Flow Analysis
FY	Fiscal Year
GoN	Government of Nepal
IEE	Initial Environmental Examination
IoE	Institute of Engineering
LBS	Local Bridge Section
LRBP	Local Roads Bridge Programme
LRBSU	Local Roads Bridge Support Unit
LRN	Local Roads Network
MoFALD	Ministry of Federal Affairs and Local Development
MoFAGA	Ministry of Federal Affairs and General Administration
NPR	Nepali rupee
OJT	On-the Job training
OMS	Outcome Monitoring Survey
PIU	Programme Implementation Unit
QAP	Quality Assurance Plan
RCC	Reinforced Concrete Cement
RTISWAP	Rural Transport Infrastructure Sector-Wise Approach
SDC	Swiss Agency for Development and Cooperation
SNRTP	Strengthening the National Rural Transport Program
TA	Technical Assistance
VAT	Value Added Tax
YPO	Yearly Plan of Operation
ZoI	Zone of Influence



1. Executive Summary

This Yearly Plan of Operation (YPO) consolidates the outcomes and output achieved by the LRBP in the fiscal year 2017/18 AD, provides a budget for the construction of motorable bridges of over NPR 2.05 billion (including contribution of SDC's technical assistance), and sets out the key priorities/targets of the 'Local Roads Bridges of Local Level and Community Access Improvement Programme' for the upcoming fiscal year 2018/19 AD.

During FY 2074/75, LRBP technically assisted 238 ongoing bridges in 73 districts constructed by the District Coordination Committees/Department of Local Infrastructure Development for Agricultural Roads (DCC/ DoLIDAR) and by other project bridges, of which 88 bridges were completed. Regarding DPR, no new bridges were selected in this year. As per the request, 12 bridges detail design, 42 bridges design verification and 16 designs for other projects within DoLIDAR were done.

With the construction of above bridges, a total of 299479 person days of jobs were generated - 81% were used by people from DAGs and 12% by women. Outcome monitoring survey (OMS) results show that the people living in the zone of influence (ZoI) of completed bridges have improved access to all weather roads and, thereby, have better access to opportunities and services such as health facilities, educational institutions and the main market. OMS results also indicate that people have saved travel time and transport fares as a result of bridge construction, and there has been a significant flow in traffic and freight volumes in the respective districts. LRBSU has organised bridge design, construction methodology, and construction supervision and management trainings to capacitate technical staff from DoLIDAR, DCCs/DTOs, private sector including educational institutions. DoLIDAR/DCCs/DTOs, Private sectors especially contractors working with LRBP are following bridge construction guidelines, norms and standards.

Public hearings and public audits have been held at the stipulated frequency in new and completed bridge sites which has helped to maintain transparency and accountability in the district concerning the programme. LRBP spent a total of NPR. 2158.6 million (66.2%) against the allocated budget of NPR. 3260.7 million in FY 2074/75.

For FY 2075/76 BS, the LRBSU will support the construction, supervision and quality control of bridges constructed by LBS/State/Local bodies as decided by Steering Committee. The programme targets to complete 85 bridges in and make 1445 kms additional km of local roads 'all weather' and benefit one million population from better accessibility and connectivity. LRBP will focus DAGs and women to get employment in bridge construction and targets to generate 425,000 person days employment, of which 66% expected to be utilised by people from DAGs and 15% by women living within the zone of influence of the bridges. It is expected that the traffic increased by 30%, freight volumes (import and export) increased by 30%, freight cost decreased by 25%, travel costs (time and fares) reduced by 25% within one year of bridge completion on the programme district.

Besides, the project estimates that 60 people from DAGs, including women, will be trained as skilled labour in construction-related skills. Simultaneously, LRBP will continue to capacitate government and private sectors in bridge sub sector. A number of trainings for technical persons from State/local governments, Contractors, Consultants on BIMS, Design of Bridges, Construction and Supervision of Bridge, Construction Methodology on Pile Foundation/Pre-stressed Bridge and Falsework, Formwork and Temporary Support will be organised. In order to steer the programme, motorable local roads bridge strategy will be formulated and finalized possibly within second trimester of the program. Along with this, Bridge Screening and Prioritization Criteria (BSPC) will be revised with consideration to the federalization and will be a part of the strategy.

As in the previous year, support will be provided for one new and four existing educational institutes on bridge building activities for research students. In addition, LRBSU will continue its Internship Programme, focusing new female engineering graduates.



2. Basic Information

2.1. Background of the project

LRBP is a joint programme funded by SDC to provide technical assistance to the GoN for the implementation of rural motorable bridges since 2011. The goal of the programme is that people in the programme districts have improved livelihoods from better access to services and opportunities and optimise the development potential. The first phase of LRBP focused on overall programme design and bridge planning, selection and prioritization, accompanied by capacity building in both the public and private sectors, and phase II since July 2016 functioned strategically as a transition phase so as the programme smoothly restructure into regional that complements the provincial system of the country. LRBP Phase III was then started from 1 March 2017 with an aim to promote people's wellbeing and resilience, especially of disadvantaged groups living in rural areas in a new regional structure focusing to work closely with state and local government. Phase III is being implemented by the GoN and is technically assisted by LRBSU/AF-Itenco AG Switzerland, with funding support from SDC. This phase is designed to help the GoN to scale up proven approaches and technologies widely across the country, further enhancing local expertise through increased leverage of resources from other development partners in a new federal structure.

In response to the request for support by the GoN, with its objective to enhance accessibility through all-weather roads into remote areas, Local Roads Bridge Support Unit (LRBSU) started to provide technical assistance (TA) to the District Coordination Committees (DCCs) and Department of Local Infrastructure Development and Agricultural Roads (DoLIDAR) in the planning, budgeting, survey, design and quality control of bridges. Likewise, LRBSU is supporting DoLIDAR in building the capacity of central and local government staff and the private sector (especially consultants and contractors) on various aspects of bridge engineering, construction and management and growing expertise in this sub-sector. More than seven years of this successful collaboration has increased the confidence of the GoN in local roads bridge construction with continuous support from SDC and LRBSU, and therefore the GoN has requested SDC to continue its support to scale-up the knowledge developed and has committed to increase the budget multi-fold in the coming years. The programme is being implemented across all 77 districts of Nepal. Technical assistance under the programme is coordinated through five regional and two satellite offices with consideration to federal restructuring of the state as foreseen by the Constitution of Nepal. In future, it is planned to shift the main input of the technical assistance (TA) to technical offices located in the States/Provinces.

This Yearly Plan of Operation of FY 2075/76 BS (2018/19 AD) provides the brief overview of the programme, followed with progress, achievements and learning of previous FY of Phase III and set targets for the running FY from 17 July 2018 to 16 July 2019 to guide and implement the programme effectively.

2.2. Socio-political context

Nepal is undergoing a period of socio – political transition towards the implementation of its newly promulgated constitution to establish equitable development trajectory. While challenge remained to emerge after two devastating earthquakes, trade disruption in the southern border of the country and political vacuum at local level for past 2 decades, Nepal is stepping towards its development with the devolution of executive and legislative powers to provincial and local governments. Nepal successfully held local district elections in three phases in mid 2017, and provincial and national parliamentary elections towards the end of the year. This has provided a unique opportunity for the country to establish economic and social transformation.

Over the past few years, Nepal has achieved remarkable development gains, particularly in the health and education sectors. Economy activity in the country rebounded strongly in FY 2073/74, growing 7.5 percent, particularly due to construction as earthquake reconstruction,



industrial growth and increased agricultural output. The progress was expected to be continued in FY 2074/75, however has been affected by the worst floods in decades affecting 1.7 million people.¹ This has further exacerbated the rural poverty which has been suffering from physical isolation and limited accessibility to services and opportunities. Realizing connectivity and easy accessibility to be one of the major factor for economic growth of the country through decentralized government as supported by the constitution, the federal government has kept infrastructure development under high priority in the FY 2075/76 allocating total Rs. 109.38 billion for transport infrastructure projects.

2.3. Working scenario and current context of local road bridges

Motorable local road bridge development has made significant progress on the LRN over the past seven years of the implementation of LRBP and the provision of technical assistance, which has been mainly driven by Swiss funding to the sub-sector. The LRBSU is responsible for providing technical assistance to the DCC and the centre through the Local Bridge Section (LBS) of DoLIDAR for motorable road bridge activities. Over 400 bridges in the LRN are at various stages of construction, of which the LRBP, completed the construction of 298 bridges till date, with significant progress in remaining bridges. By this, LRBP has improved the accessibility of millions of people to resources and opportunities in the programmed regions through all-weather road.

In recent years, the programme functioned strategically as a transition phase so as the programme smoothly restructure into regional that complements the provincial system of the country; due to which DCC/DTOs under LBS/DoLIDAR played an interim role in bridge management. Initially, the GoN decided to handover the responsibilities of bridge building from DTOs to the respective state government by the end of Chaitra 2074 (11 April 2018). During this process, the financial authority for DTOs for the payment of bridge implementation to the contractors was halted till third week of December 2017. Understanding the implementation difficulties in the mid FY, the GoN extended the interim role of DTOs till the end of FY 2074/75. Likewise, the tenure of DoLIDAR is highly volatile and uncertain. Despite ambiguity towards the role of LBS/DoLIDAR in the current structure of the country, LBS/DoLIDAR continued to manage bridge building activities across the country with support from LRBSU in FY 2074/75.

With consideration to the state restructuring which has empowered the local / state governments in execution of local infrastructures, the management of LRBP is expected to align accordingly. The MoFAGA will continue to execute and the respective state and local government will implement the programmes. LRBSU will work with each tier of government – federal, state and local for the implementation of bridge building activities and continue its technical assistance. The federal government is expected coordinate with both provincial as well as local government to prepare work plan and budget proposal along with LMBIS. The state government will be responsible for the planning and budget allocation for the provincial roads bridges. In the present context of “non-finalization / non-demarcation” of the state roads and local road, the respective states can decide whether to delegate the fund upto municipal level or not. LRBSU can assist the states to formulate the ‘Shortlist of Bridges’ and ‘Multi-year Bridge Plan’ based on ‘Identified and Prioritized Road Network’.

Also, to promote development partners in a systematic and effective way, in its Phase III LRBSU aims to provide a one-window technical assistance service for all development partners working in the motorable roads bridge sub-sector with the GoN.

3. Expected Outcomes & Progress for FY 2074/75

3.1. LRBP Phase II – Outcomes 1 and 2

The programme outcomes basically focus accessibility towards services and opportunities, and capacity enhancement of the national bodies attributable to the programme intervention.

¹ <http://www.worldbank.org/en/country/nepal/overview>



Analyzing qualitative and quantitative data from OMS and annual progress report, the outcome indicators are assessed herewith.

Outcome 1: People, especially people from DAGs use motorable access provided by all-weather roads to services and opportunities.

Outcome 1 focuses people in the programme region have improved access to services and opportunities due to all weather road provided by motorable bridge construction. It reflects that the safe and improved access to basic and social service centres provided by motorable bridges is life line to the rural people – people have been able to get timely treatment, able to go school throughout the year and local business are also rising. Through accessibility and connectivity, motorable bridges have contributed in strengthening social ties among the isolated communities at local areas.

Indicator 1.1: Average freight cost decreased by 25% as compared to the baseline data

After bridge construction, freight cost using tractor, truck or jeep decreased by 35% from on average in the Zol, adjusting the inflation and fuel price. The reduction in freight costs is attributable to easy availability of transportation facilities since bridge construction. In many remote settlements, tractor and jeep were introduced for freight transport only after the bridge construction. Such freight modes cost them relatively cheaper comparing to the freight transport by mule or porter.

None of the sample bridges has cartelling system in transporting freight. As most bridges are located in the rural areas and does not have proper road and cartelling system of freight are focused to districts and cities, it has limited or no direct effect in freight cost. Also, it was clear from the survey that some business person tends to add the price of transport cost in the goods while providing door to door service, and many of the shopkeeper own the private vehicle from which they transport the goods.

Indicator 1.2: Traffic increased by 30% as compared to the baseline data

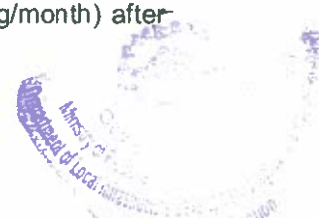
On average, the traffic volume in the programme region has increased drastically by 124% (from 140 to 314) after the bridge construction. Before, in most regions, only limited vehicles used to ply in a dry season, and/or were forced to take a longer route. The motorable accessibility due to bridge construction allowed vehicles to ply easily and safely in the region and encouraged public vehicles to ply in the road bridge corridor throughout the year.

Some locals have also bought tempo (three wheelers), seeing the business potential in providing transportation service due to increased road connectivity provided by the bridge. Also, some private schools started school bus, and health centres started ambulance after the bridge construction and increased connectivity brought by this.

Indicator 1.3: Freight volumes (import and export) increased by 30% as compared to the baseline

As traffic, freight volume is also dramatically increased by 112% after the bridge construction. Before bridge construction, locals in most regions, were forced to pay high amount of freight cost to transport goods and the route was life threatening. Usually, people with private vehicles were only able to transport goods frequently taking longer route. This made locals reluctant to import or export goods in large volume and became a rare phenomenon for locals to develop such business or development interest in the region due to which the export of goods were minimum and mostly sold locally.

The motorable accessibility due to bridge construction allowed vehicles to ply easily in the region and by this freights started to be transported timely and conveniently with significantly low fare. This has also developed an easy route to export local production and earn profit. The local peasants are encouraged to diversify their production and grow more and likewise, local businessmen to increase the goods transaction and expand the market in the area. The export rate increased by 40% (on average from 62015 kg/month to 87006 kg/month) after-



bridge construction. Local herbs, seasonal fruits and vegetables are mostly exported from the regions. Likewise, import rate is also increased drastically by 161%. Mostly, food grains, vegetable oils and construction materials are imported in these regions.

Indicator 1.4: 60 trained DAGs in construction skills are employed as skilled labour in bridge construction trade

LRBP organised skill related trainings and encouraged contractors to mobilise local DAGs including women to improve their livelihoods. Out of total 22 trained people in 15 days Occupational skill trainings on Bridge Painting, 6 are from DAGs including 3 women. Among the trained participants, one has received employment in painting the Badigad Khola Bridge, Baglung.

Indicator 1.5: Average travel costs (time and fares) are reduced by 25%

On average travel fare is decreased by 9% and time by 11% after bridge construction. The reduction in travel costs is mostly due to regular and easy availability of transportation facilities provided by motorable accessibility by the bridge. Even before the bridge construction, most people used to cross the river by using vehicles during the dry season/when water level was low. Whereas during rainy season, people used to wait for hours and even days for the water level to go down and cross the river, and take vehicles from the other side of river again.

Indicator 1.6: Increase in numbers of women seeking health cares in hospitals

The OMS data shows that the number of women seeking health cares in hospitals on average increased from 435 per month to 571 (by 31%) after the bridge construction. Unlike before – no bridge situation, when women were reluctant to cross the river due to much time and risk involved, women now are having safe route to cross the river using vehicles or on foot. The construction of bridges has contributed directly as well as indirectly to promote usage of health services; the locals especially women have convenient motorable access to get emergency health services using ambulances and private vehicles. Also, for other health issues, women visit health centres on foot.

Indicator 1.7: Increase in numbers of girls' enrolment in schools/colleges

Motorable bridges has provided easy and convenient access to yet another important destination - educational centres. The survey shows that the girls' enrolment in schools/colleges overall has increased from 405 to 449 (by 11%) after the motorable bridge construction. The safe accessibility has limited the trend of students getting absent during rainy seasons. The study also suggests that the girl students are more benefitted from easy access to schools as the parents feel safe to send their daughter to nearby school with no risk in travel which they used to have due to unsafe crossing. Additionally, in some of these regions, school vehicles have started after the bridge construction.

Before the bridge construction, many cases have been documented that students were forced to rent a house near the school only to avoid the river to go to school and the risk involved - not necessarily the distance, resulting financial burden for the students and their family. The families and pupils do not have to rent the rooms outside of their houses now, which saved family cost for education.

Outcome 2: National and local institutions apply and enforce appropriate local road bridge strategy.

Outcome 2 focuses enhancing of national competency in local bridge construction via capacity building, developing policies and guidelines in relation to this sub sector. The programme provides various training to the staff of DoLIDAR, the DCCs/DTOs and the private sector to strengthen their capacity for motorable bridge planning, construction and quality management.

Indicator 2.1. Increase in the percentage/number of bridges selected following the 'Bridge Selection and Prioritizing Criteria'



No new bridges were selected in FY 2017/18 due to the transitional shift of the programme into the federal structure of the country, therefore, there is no account of application of BSPC for this year.

Indicator 2.2. Bridge builders are following the endorsed Local Roads Bridge Strategy including the norms and standards

The consultants are using the basis of Type Designs and Hydrological / Geotechnical guidelines prepared by LRBSU for designs. Similarly, contractors are also following the standardized drawings, estimates and contract documents facilitated to LBS and DDCs (previously and DCC for this year) for the bridges construction. .

Indicator 2.3. Local Bridge Section/DoLIDAR are managing and coordinating bridge building activities across the country

Due to transition to federalization,, the GoN could not handover the responsibilities of bridge building from DTOs to the respective state or local governments this year, the district coordination committee supported through DTOs still led the programme with the budget spending authority given only in. the third week of December 2017. This resulted least physical progress in the bridge construction, the payments to contractors were very low.

Indicator 2.4. GoN/MoFALD allocates adequate budget regularly to districts to implement rural motorable road bridges.

GoN/MoFALD allocated 3.26 billion to implement rural motorable road for FY 2074/75, of which 2.16 billion was spent (66%). One of the major reasons being late authorization of fund to DCC.

The federal government allocated total 2.05 billion budget for 'Local Roads Bridges of Local Level and Community Access Improvement Programme' for FY 2075/76, whereas, the implementation modality of this is still pending at the steering level.

3.2. LRB Phase III – Outcomes 1 and 2 (Target for FY 2075/76 BS)

The LRB Phase III expected outcomes 1 and 2 with indicators for the FY 2075/76 BS are mentioned here. The indicators with respect to the authorized body is subjected to change as decided by the Steering Committee.

Outcome 1: People, especially people from DAGs, have improved access to services and opportunities

- Average freight cost decreased by 25% as compared to the baseline data
- Traffic increased by 30% as compared to the baseline data
- Freight volumes (import and export) increased by 30% as compared to the baseline
- 60 trained DAGs in construction skills are employed as skilled labour in bridge construction trade.
- Average travel costs (time and fares) are reduced by 25%
- Increase in numbers of women seeking health services in hospitals
- Increase in numbers of girls' enrolment in schools/colleges

Outcome 2: National and local institutions adopt an appropriate local roads bridge strategy

- Increase in the percentage/Number of bridges selected following the 'BSPC'
- Bridge builders² are following the endorsed Local Road Bridge Strategy³ including the norms and standards.
- Local Bridge Section/DoLIDAR are managing and coordinating bridge building activities across the country
- GoN/MoFAGA allocates adequate budget regularly to districts to implement rural motorable road bridges.

² DDCs and Private sector (Contractors, Consultants and Educational Institutes)

³ Especially the norms and standards approved by MFALD/DoLIDAR



3.3. Transversal themes

LRBP has remained sensitive towards gender and social inclusion issues and has maintained workforce diversity at all levels. Presently, LRBP has 122 permanent staff including 20 female and 102 male staffs. The LRBP has recruited 1 Social Safeguard Officer, 1 Procurement Officer, 1 Regional Bridge Coordinator, 1 GIS/ IT Assistant and 2 Support Engineers in 2017/2018. Overall, the staff composition based on Gender in 77 programme districts includes 16% female and 84% male workforce. On LRBP and TBSU joint collaboration, 14 Trainee Female Engineers and 19 Trainee Sub Engineers (i.e. 6 female Sub Engineers and 13 male Sub Engineers getting Training on Trial and Motorable bridges are recruited. Besides, 3 female on Intern in "on the job program" at LRBP.

Collecting disaggregated data and monitoring from GESI prospective is one of the key aspects of LRBP. The policy of better targeting and prioritizing DAGs and female workers during, the selection of training participants, selecting enumerators for various surveys and formation of BBG shows remarkable results. But it is not up to the expected level, generally, contractors are reluctant to employ women and people from disadvantaged groups. Serious and conscious efforts are to be made through Tripartite Agreement between LRBSU, DoLIDAR and DCC/Municipal authority, unless a separate work package has to be worked out for User's Committee to engage female in the construction work. This will definitely increase the female participation in the bridge construction trade.

Conducting Public Hearing and Public Audit is a mandatory provision of the program. In this FY, LRBSU has facilitated in conducting Public Audit in 7 completed bridge and Public Hearing of 17 on-going bridges. Likewise placing a notice board containing all the information including salient features of the bridge, contractor's name & address, contract amount and duration etc., in all the bridge sites is practiced to maintain the transparency, promote good governance practice and make the implementer accountable towards the community.

4. Expected Outputs

For FY 2075/76 BS, the LRBSU will support the construction, supervision and quality control of bridges constructed by LBS/state/local bodies and as decided by the steering committee. During this FY, LRBSU targets to complete 85 bridges and make 1445 additional km of local roads 'all weather' and benefit 1 million population through accessibility to services and opportunities to improve livelihood. Construction of these bridges targets to generate 425,000 person days of employment, of which 66% and 15% will be utilised by DAGs and women living within the zone of influence of the bridges. Additionally, support will be provided for the preliminary and detail design, including environmental assessment, for 20 bridges and for the design verification of 10 bridges. Walkover surveys, including the investigation phase I survey of 100 bridges and baseline survey of 20 bridges, are also planned for the coming year.

The project estimates that 60 people from DAGs, including women, will be trained in construction-related skills. To strengthen the capacity and promote the bridge sub-sector of state government, local bodies and private sectors (contractors, consultants and colleges), the capacity building programme will be continued. Training on BIMS, Design of Bridges, Supervision and Management of Bridge Construction Part I, Construction Methodology on Pile Foundation/Pre-stressed Bridge and Falsework, Formwork and Temporary Support will be carried out to capacitate technical persons from State and Local bodies and the private sector. Besides, number of trainings for labourers on false work and form work technology; for technical staff of contractors, consultants and engineers on hydrological and geotechnical investigation and analysis; and for technical persons from Government (State, Local bodies) on 'Supervision and Management of Bridge Construction (Parts I and II)' will be organized (Detail see annex 6).

LRBSU will continue to use the motorable bridge technical norms and standards and monitoring and reporting guidelines prepared in Phase I and II. New innovative methodologies and approaches will be scaled up in State bridges in different parts of the Country. Likewise, about 25 construction companies and 20 consulting firms' technical personnel will be trained in bridge design and construction management training from LRBP.

An orientation on programme and workshops shall be organized at State and Local bodies level to update on LRBP to the State and Local authority, maintain transparency and reporting requirements.



As in the previous year, support will be provided for two new and five existing educational institutes on bridge building activities for research students. In addition, LRBSU will continue its on the job training (OJT- Civil Sub – Overseer) and Internship Programme, which focuses mainly on promoting new female engineering graduates to increase the capacity for bridge design, construction supervision and management.

In comparison to previous years, the Government of Nepal has gradually increased its budget of NPR 2.05 billion to local roads bridges for FY 2075/76 BS.

5. Programme Management and Financial Resources

5.1. Programme Steering

PICC meeting was planned and arranged for 4 December 2017, however could not be conducted.

5.2. Monitoring and management

The major responsibility for construction supervision and quality control lies with the DDCs/DTOs, for which a team of engineers under the Local Bridge Section Chief has committed to work on LRBP. LRBSU, the regional/satellite district teams, in close coordination with the Local Bridge Section of DoLIDAR/DTOs, LRBSU conducts regular monitoring visits to ensure accountability, transparency and control quality and various aspects of bridge management. Besides, the monthly and quarterly monitoring of bridges is undertaken for the programme output/outcome indicators to see whether the progresses are on track and allow corrective actions to be taken where necessary. To maintain the quality of materials, goods and work, LRBP has developed a checklist/guideline for the quality control of construction works (quality assurance plan - QAP), which is implemented during bridge construction to ensure the quality of materials and civil work onsite.

The programme adapt its current federal structure and readjust accordingly into 5 regional (State 1: Itahari, State 2: Bardibas, State 4: Pokhara, State 5: Nepalganj and State 6: Surkhet) and 2 satellite (State 3: Lalitpur and State 7: Daddeldhura) offices assessing the state restructuring process and its current and potential involvement throughout the country. The main objective is to establish Regional and Satellite Office is to provide technical assistance through respective provinces/states on motorable bridge sub-sector. Each regional office has a Regional Bridge Coordinator, 2-3 Support Engineers and a Social Safeguard Officer, along with Technical Officers in each bridge site deputed for survey, design and supervision of bridge construction. Based on district request, regional office facilitate/coordinate the need and request of human resource to central office. Considering programme need and status regional office need, central office plan and depute the human resource. Presently, 72 Technical Officers are deputed to 233 bridge sites for the supervision and quality control of the bridges currently under construction in 72 districts across the country. Of these, 88 bridges completed in this fiscal year so far. Contractors, constructing bridges across the country are supported and feedback provided by the joint team of LRBSU and DoLIDAR on the various issues identified in the under construction bridge sites. Regular supervision and joint monitoring is carried out together with DoLIDAR and the DDCs/DTOs and will continue with State and local bodies also in the coming fiscal year. Besides, LRBSU monitors the outcome of services supported by the project and documents the emerging changes and immediate effects using a series of simple indicators following the project log-frame.

The LRBSU has initiated BIMS (a web-based contract monitoring system), where Construction Monitoring/Management and Supervision Progress Reports of completed and ongoing bridges are available as a part of BIMS.

5.3. Bridge Improvement and Maintenance Project (BIMP)

This is a Performance for Results (P4R) based project funded by the World Bank. Altogether 173 Bridge Dossiers were provided to the Independent Consultant for the Verification of 4th year Disbursement Linked Indicators (DLI). Out of these 173 Dossiers, 145 and 13 Dossiers were for the Verification of DLI 1 (Major Maintenance) bridges and DLI 2 (Minor Maintenance) bridges respectively. The remaining 15 Dossiers were for the Verification of DLI 3 (New Construction) bridges. In addition, supporting documents were also provided for the Verification of DLI 5 – Improved



Bridge Asset Management and DLI 6 – Increased Effectiveness of the Institutions responsible for Bridge Sector Management. No documents were provided for the Verification of DLI 4.

In FY 2018/19, the support to National Planning Commission (NPC) in BIMP will be continued as per the understanding with World Bank (WB) for the new phase on BIMP. Based on the findings;

DLI 1: Out of 9,997.43 m length of 5th year Major Maintenance (DLI 1) Bridges, only 8,704.50 m length is verified and validated. Remaining length can only be verified after proper rectification of the defects as noted above;

DLI 2: Out of 1,059.04 m length of 5th year Minor Maintenance (DLI 2) Bridges, only 747.43 m length is verified and validated;

DLI 3: Out of the 1,678.35 m length of 5th year New Construction (DLI 3) Bridges, only 1,594.27 m length is verified and validated. Remaining length can only be verified and validated after the rectification of the defects and non-compliances as noted in this report;

DLI 4: is not verified as no documents were provided;

DLI 5: Completion of Condition Survey of 60% bridges in BMS including updating of BMS is verified and validated; and

DLI 6: Public Disclosure of reports on GRM (Year 5) is verified and validated.

5.4. Financial resources

The GoN has planned a budget of NPR 2051.3 million to achieve the targets set by DoLIDAR for the construction of local motorable roads bridges (see Annex 4) for FY 2018/19 AD. The 'Local Roads Bridges of Local Level and Community Access Improvement Programme' spent a total of NPR. 2158.6 million (66.2%) against the allocated budget of NPR. 3260.7 million in FY 2017/18 AD.

SN	Item	Budget FY 2017/18 AD	Expenditure FY 2017/18 AD	Budget for FY 2018/19 AD
1	Construction of local road bridges	2880.7	1977	1671.3
2	TA at central & district levels including capacity building and research – development and consulting services	380.0	181.6	380
Total		3260.7	2158.6	2051.3

5.5. Fund flow analysis

The estimated Fund Flow Analysis for FY 2017/18 AD is provided in Annex 2.

6. Lessons learnt and way forward

LRBSU identified some issues during implementation of programme, this fiscal year. A summary of the issues and the way forward are provided in this section.

- The tenure of DTO/DoLIDAR has remained highly volatile since FY 2017/18 AD. No accountable government was present for the payment of bridge building activities for almost 6 months, resulting least progress in these months.

In the present situation of the transition, the structure and functions of the DoLIDAR need to be redefined. This redefinition depends on the administrative structure of the provincial and local entities. During the launching of LRN bridge projects, the role and responsibility of the DoLIDAR (or equivalent entity) will be made clear as well as the role and responsibility of the provincial / local bodies.



- With the funding support from SDC, total 25 bridges were successfully completed and their Defect Liability Period also ended. It requires to be handed over to respective government, however no accountable government was present during the federal restructuring process.

With the functional clarity of local government, the bridges need to be handed over to the respective municipality in close coordination with SDC.

- High number of bridge demand are coming out directly from all three tiers of government – LBS/DoLIDAR, state and local bodies for FY 2075/76. Due to lack of proper channel and formalization, it has been difficult for the programme to prioritize the bridge demand.

The programme needs to formalize a channel as soon as possible so that the programme can prepare a rational plan and continue to provide technical support in bridge building activities.

- Some of the norms and guidelines prepared in the previous phase were focused to central and district level government, which may not be completely applicable to the new federal structure of the country.

The management of LRBP is expected to be aligned with the new tier of government once the provincial government is formed and all the local level governments get fully functional. LRBP will revise the norms and guidelines accordingly, and continue to provide technical assistance through regional coordination offices to the respective local governments and their technical entities.

- Ambiguities regarding technical expertise of newly appointed local government and uncertainty/delay in formation of definite technical structure or division in the local level to address bridge related issues.

Capacity enhancement training for technical persons in the local level (municipality/rural municipality) is foreseen, together with the orientation on LRBP and bridge planning, screening and prioritization processes.

On the behalf of,

.....
Madhav Bhattarai
 Programme Coordinator
 LRBP/DoLIDAR



Programme Coordinator

7. Annexes

Annex 1: Detailed Financial Plan for Technical Assistance Fund from SDC

Budget and expenditure of FY 2017/18 AD and a head-wise proposed budget for FY 2075/76 BS (2018/19 AD) is described herein:

Table 3: Financial plan and progress summary by budget head FY 2074/75 BS (2017/18 AD) in '000 NPR			
SN	Budget head	Budget FY 2017/18 AD	Un audited Expenditure FY 2017/18 AD
1	Fees for national and international experts	4,528	2,105
2	Remuneration of national support staff	139,892	129,325
3	Reimbursable costs	3,852	6,460
4	Purchase of equipment for programme implementation unit (PIU)	1,766	2,124
5	Operating costs PIU	14,927	25,016
6	Consulting services for designing	48,685	6,015
7	Research and development	12,840	5,019
8	Capacity building	6,420	5,609
9	Apprenticeships for DoLIDAR Engineers	642	-
Grand Total		233,551	181,673



Annex 2: Fund Flow Analysis for Parts of SDC's Technical Assistance FY 2018/19 AD

Project: Motorable Local Roads Bridge Programme (MLRBP)
 Period of analysis: FY 2018/19 (16.07.2018 to 15.07.2019)
 Budget: 3,045,894
 Currency: CHF

			Fund Receivers					Fund Allocation			Fund Beneficiaries	
	Budget Headings	Budget Amount	Geographical Outreach			Discrimination Perspective (Cast, ethnicity / gender)		Cluster perspective (Swiss cluster districts and others)			Beneficiary Perspective Directly attributable or not	
			District/ Province	National	International	Discriminated	Non - Discriminated	Province 1	Province 2	Others and National	Attribu- ble funds	General and common costs
1	2	3	4	5	6	7	8	9	10	11	12	13
1	Services Headquarters	44,474										
	1.1 Fees HQ staff of Contractor	35,824			100%	12%	88%			100%		100%
	1.2 Reimbursable costs HQ staff	8,650		0%	100%		100%			100%		100%
2	Local Office of Contractor											
3	Project Implementation	1,928,420										
	Long Term Experts	303,700										
	3.1 Fees Professional	285,600			100%		100%			100%		100%
	3.2 Travel exps of resident expatriates and dependents	2,500		100%			100%			100%		100%
	3.3 Expenses of foreign residence	15,600			100%		100%			100%		100%
	Short Term Experts	42,320										
	3.4 Fees national & International experts	35,500		25%	75%	12%	88%	0%	0%	100%		100%
	3.5 Reimbursable costs	6,820		26%	74%		100%	0%	0%	100%		100%
	Local Support	1,582,400										
	3.6 Remuneration of National Support Staffs	1,400,400	74%	26%		49%	51%	15%	9%	76%		100%
	3.7 Reimbursable costs	36,000	60%	40%		49%	51%	15%	9%	76%		100%
	3.8 Purchase of equipments for PIU	6,500	15%	85%			100%	2%	2%	96%		100%
	3.9 Operating costs PIU	139,500	60%	40%		10%	90%	8%	5%	87%		100%
4	Administrated Project Funds	1,073,000										
	4.1 Consulting services for designing	875,000	20%	80%		20%	80%	20%	11%	69%	0%	100%
	4.2 Research and Development	120,000		100%		5%	95%			100%	80%	20%
	4.3 Capacity Building	60,000		100%		40%	60%	5%	5%	90%	60%	40%
	4.4 Pilot Bridges in Kho, Okhal, Ram, Sind											
	4.5 Apprenticeships for DoLIDAR engineers	18,000		100%			100%			100%		100%
	Total amount	3,045,894										
			1,317,571	1,350,977	377,346	931,345	2,114,549	404,750	235,631	2,405,513	132,000	2,913,894
			3,045,894			3,045,894		3,045,894			3,045,894	



Annex 3: Expected Targets and Status of Outputs of FY 2018/19 – Summary

3.1. A summary of achievement/status of LRBP Phase III outputs/target for FY 2074/75 BS (as per YPO of FY 2017/18 AD) and expected outputs/target for FY 2075/76 BS (2018/19 AD) is shown here.

Outputs targets (March 2017–July 2020)	Annual Target for FY 2074/75 BS (2017/18 AD)	Status/Achievements 15 July 2017 – 16 July 2018	Annual Target for FY 2075/76 BS (2018/19 AD)
Output 1: People in the project areas have more all-weather roads.			
<ul style="list-style-type: none"> Construction of 300 additional number of Motorable (local road) bridges are started out of which 200 bridges completed. 	80 Motorable bridges are built	<ul style="list-style-type: none"> 88 bridges were completed In total, 42 bridges design verified In total, 12 bridges detail design and 08 environmental assessments completed Altogether 22 Bridges walkover surveys including investigation phase I completed in 9 districts 	<ul style="list-style-type: none"> 85 Motorable bridges are built
<ul style="list-style-type: none"> Additional 50 numbers of bridges are designed for other projects within DoLIDAR. 	15 Bridges are designed for other project within DoLIDAR	<ul style="list-style-type: none"> Provided additional design and technical support, as required, for 16 bridges of RTI SWAP and SNRTP 	<ul style="list-style-type: none"> 20 Bridges are designed for other project within State/Local bodies OR DoLIDAR
<ul style="list-style-type: none"> Additional 3400⁴ kms of roads are operating all year round because of the completed bridges 	1360 kms of roads are operating all weather after completion of above targeted bridges	<ul style="list-style-type: none"> After construction of 88 bridges, 1925 kms roads operating all weather across the country 	<ul style="list-style-type: none"> 1445 kms of roads are operating all weather after completion of above targeted bridges
<ul style="list-style-type: none"> Additional 2 million people in the project districts have access to an all-weather road within 2, 4 and 6 hrs⁵ of walk 	0.8 million of ZOI people have access to all weather roads	<ul style="list-style-type: none"> 0.9 Million peoples of ZOI have access to all weather roads. 	<ul style="list-style-type: none"> 1 million of ZOI people have access to all weather roads
Output 2: DAG's within the zone of influence of the motorable bridge get employment in bridge construction works.			
<ul style="list-style-type: none"> 1'000'000⁷ p-days of jobs created during construction of local road bridges 	400,000 person days of employment generated in bridge construction sites	<ul style="list-style-type: none"> With the completion of 88 bridges, 299479 person days of employment generated. 	<ul style="list-style-type: none"> 425,000 person days of employment generated in bridge construction sites

⁴ This number is calculated on the basis that each bridge will make at least 17 kms of road all weather on average and considering 200 (totaling 3400 kms) out of under construction 500 bridges will be completed by end of this phase.

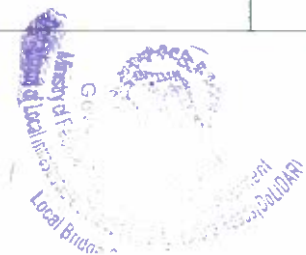
⁵ 2 hrs of walk in Terai and 4 hrs of walk in hills and 6 hrs walk in mountains.

⁶ Discriminated and poor as defined by SDC

⁷ The number of employment considering approximately 15% of the budget going to labour components during construction of local bridges (NRs. 1 billion will be available for labour works with average daily wage rate of Rs. 1000)



Outputs targets (March 2017–July 2020)	Annual Target for FY 2074/75 BS (2017/18 AD)	Status/Achievements 15 July 2017 – 16 July 2018	Annual Target for FY 2075/76 BS (2018/19 AD)
<ul style="list-style-type: none"> Out of the total employment, 66% of jobs are utilized by DAGs and 25% by women 200 DAGs including women trained in specific construction related skills 	<p>Out of above employment 66% and 25% jobs are utilised by people from DAGs and Women in bridge construction sites</p> <p>60 people from DAGs including 30 Women trained in construction related skill trainings</p>	<ul style="list-style-type: none"> 243830 (81%) and 35684 (12%) person days used by people from DAGs and women in bridge construction sites In all 22 persons were trained in bridge painting training, of which 06 from DAGs including 03 women 	<ul style="list-style-type: none"> Out of above employment 66% and 15% jobs are utilised by people from DAGs and Women in bridge construction sites 60 people from DAGs including 30 (50%) Women trained in construction related skill trainings
Output 3: DAGs are represented in Users Committees, construction and maintenance groups and hold at-least one key decision making position in the committee.			
<ul style="list-style-type: none"> 40% of members of MBUCs are from disadvantaged groups 	40% MBUCs from disadvantaged groups	<ul style="list-style-type: none"> N/A 	<ul style="list-style-type: none"> N/A
<ul style="list-style-type: none"> 30% representation of Discriminated groups in key decision making positions of MBUCs 	30% representation of Discriminated groups in key decision making positions in MBUCs	<ul style="list-style-type: none"> N/A 	<ul style="list-style-type: none"> N/A
<ul style="list-style-type: none"> 30% representation of Women in key decision making positions of MBUCs 	30% Women in key decision making positions in MBUCs	<ul style="list-style-type: none"> N/A 	<ul style="list-style-type: none"> N/A
Output 4: The Local Bridge Section/ DoLIDAR strengthens its capacity to produce Norms, Standards, standard type designs and piloted new type of bridges/river crossings and approaches			
<ul style="list-style-type: none"> Motorable Bridge Technical norms and standards are available and in use. 	Bridge Technical norms and standards are available and in use	<ul style="list-style-type: none"> Motorable bridge technical norms and standard developed in Phase I are in use Design Guidelines for Hydrological and Geotechnical Investigation and Analysis are available and in use Contract monitoring system established and in use. 	<ul style="list-style-type: none"> Motorable Bridge technical norms and standards are available and in use
<ul style="list-style-type: none"> Standard monitoring and reporting guidelines are available and in use 	Standard monitoring and reporting guidelines are available and in use	<ul style="list-style-type: none"> From LRBSU Monitoring and reporting guidelines, DoLIDAR/DTOs are monitoring and supervising under construction bridges across the country with support from LRBSU 	<ul style="list-style-type: none"> Standard monitoring and reporting guidelines are available and in use



Outputs targets (March 2017–July 2020)	Annual Target for FY 2074/75 BS (2017/18 AD)	Status/Achievements 15 July 2017 – 16 July 2018	Annual Target for FY 2075/76 BS (2018/19 AD)
<ul style="list-style-type: none"> Bridge Information and Management System (web-based information portal) is hosted by DoLIDAR and Districts are updating bridge information on it 	Orientation on BIMS will be organised to the DoLIDAR and Districts for updating bridge information	<ul style="list-style-type: none"> BIMS developed and used 	<ul style="list-style-type: none"> Orientation on BIMS will be organised to the States / Local bodies OR DoLIDAR for updating bridge information
<ul style="list-style-type: none"> 10 bridges are piloted/replicated with new design concepts, technologies appropriate for local roads in Nepal (e.g. truss, suspension, arch, compact, modular, cable based and pre-stressed RCC bridges) 	Truss, Suspension, Arch, Compact, Modular, Cable based and pre-stressed bridges will be piloted/replicated in different parts of the Country, as required	<ul style="list-style-type: none"> New Bridge Designs such as Pre stressed Concrete Box Girder, Pre Stressed Void slab, Inclined Leg, Continuous RCC, Field Arch bridge, Box culvert of various sizes were done and are already on construction phase and substantially completed in some cases. Cable Stayed Bridge and Steel Arch Bridge Designs are prepared and are available 	<ul style="list-style-type: none"> Truss, Suspension, Arch, Compact, Modular, cable based and pre-stressed bridges will be piloted/replicated in different parts of the States / Country, as required
<ul style="list-style-type: none"> New and innovative methodologies and approaches⁸ are scaled up in GoN funded bridges 	New innovative methodologies and approaches will be scaled up in GoN bridges in different parts of the Country	<ul style="list-style-type: none"> Type designs of RCC and composite plate girders prepared in Phase I are standardized, available and used for design of bridges in phase II Concept for "Procurement Management for Local Participation" in DDC/DoLIDAR bridges was developed and finalized, after its successful implementation in SDC funded bridges. 	<ul style="list-style-type: none"> New innovative methodologies and approaches will be scaled up in GoN bridges in different parts of the Country, as required
<ul style="list-style-type: none"> DoLIDAR efficiently manages outsourcing designs of the bridges to private sector 	Design service continue with the support from LRBSU	<ul style="list-style-type: none"> LRBSU provided verification and bridge design services for Local Bridge Section 	<ul style="list-style-type: none"> Bridge design service continue to State OR DoLIDAR with the support from LRBSU
<ul style="list-style-type: none"> DoLIDAR/LBS staff verifies the motorable bridge designs/standards 	DoLIDAR technical person trained to increase capacity for bridge design and verification/management	<ul style="list-style-type: none"> With the support from LRBSU, LBS/DoLIDAR provided verification and bridge design services 	<ul style="list-style-type: none"> DoLIDAR, State/Local bodies staff trained to increase capacity for bridge design and management

⁸ Innovative approaches will be piloted: for example: working through motorable bridge users committees, enhancing labour component in the construction, inclusive participation of the work-force, adequate social welfare for the workers



Outputs targets (March 2017–July 2020)	Annual Target for FY 2074/75 BS (2017/18 AD)	Status/Achievements 15 July 2017 – 16 July 2018	Annual Target for FY 2075/76 BS (2018/19 AD)
Output5: The Local Bridge Section in DDCs/DTOs (including local bodies) strengthens its capacity to build local road bridges with appropriate technology			
<ul style="list-style-type: none"> At least 25 LBS/DTO staff are trained in monitoring and supervising of the bridge construction works. 	10 LBS/DTO including local bodies' staff trained in monitoring and supervising of the bridge construction works.	<ul style="list-style-type: none"> 72 technical persons (DoLIDAR and DTOs) are trained in Construction Methodology on Pre-stressed Concrete Bridge at Kathmandu, Biratnagar and Nepalgunj 	<ul style="list-style-type: none"> 80 LBS/DTO including State/local bodies' staff trained in monitoring and supervising of the bridge construction works.
<ul style="list-style-type: none"> At least 25 LBS/DTO staff are trained to verify type designs. 	10 LBS/DTO including local bodies' staff trained in type designs.	<ul style="list-style-type: none"> LBS/DTO engineers were invited for OJT (trained in Design of Bridges) for the period of one month– November 14 & 29, 2017 to make them capable in design verification. Response not received 	<ul style="list-style-type: none"> 15 LBS/DTO including State/local bodies' staff trained in bridge designs.
<ul style="list-style-type: none"> At least 25 LBS/DTO staff are trained in contracts management 	10 LBS/DTO including local bodies staff trained in contracts management	<ul style="list-style-type: none"> These trainings could not organized due to elections and restructuring of federal systems. 	<ul style="list-style-type: none"> 55 LBS/DTO including State/local bodies staff trained in contracts management / Construction Methodology on Pile Foundation/Pre-stressed Bridge/Form-False works
<ul style="list-style-type: none"> At least 40 LBS/DTO staff are trained in the Bridge Information Management Systems (BIMS) 	15 LBS/DTO including local bodies staff trained in the Bridge Information Management Systems (BIMS)	<ul style="list-style-type: none"> These trainings could not organized due to elections and restructuring of federal systems. 	<ul style="list-style-type: none"> 60 LBS/DTO including State/local bodies staff trained in the Bridge Information Management Systems
Output 6: The Private sector strengthens its capacity to construct local road bridges			
<ul style="list-style-type: none"> 50 trained construction companies are available for bridge construction works. 	15 construction companies trained	<ul style="list-style-type: none"> Technical persons from 13 construction companies staff are trained in Construction Methodology on Pre-stressed Concrete Bridge at Kathmandu, Biratnagar and Nepalgunj 	<ul style="list-style-type: none"> 30 construction companies staff trained
<ul style="list-style-type: none"> 20 trained and specialized consulting firms are available for bridge construction works. 	10 consulting firms trained	<ul style="list-style-type: none"> Opportunity will be given when Design of Bridges training is planned 	<ul style="list-style-type: none"> 20 consulting firms staff trained
<ul style="list-style-type: none"> 10 Educational institutes adopt bridge building course in their Engineering Syllabus for Bachelor's and Master's levels 	05 Educational institutes adopt bridge building course	<ul style="list-style-type: none"> Support for Project works were continued for seven engineering colleges Provided Five months OJT opportunity for (11 female students (TSLC in Civil Engineering) from Jiri Technical School Provided 3 months Internship opportunity for 2 female (BE Civil – final year) from Central Campus of Engineering, Surkhet to learn design of bridges 	<ul style="list-style-type: none"> 07 Educational institutes adopt bridge building course

Annex 4: DoLIDAR: Province/District-wise Budget Details for FY 2075/76 BS

SN	District Name	Description of Programme	Unit	Qty.	Budget (In thousand '00000)			
					FY 2075/76			Grand Total
					Budget Source/s			
					Government of Nepal	International Grant	International Loan	
DoLIDAR								
	All	Bridge Maintenance in different districts	No	0	500			500
		Maintenance Sub Total	No	0	500			500
1	Solu	Likhu Khola Bridge Banti-Bhandar-Chaulakharka (LBS)	No	1	70			70
1	Khotang	Sapsu Khola Bridge, Regmitar (LBS)	No	1	200			200
1	Sankhuwasabha	Sabha Khola, Barabishe (LBS)	No	1	50			50
1	Sankhuwasabha	Sabha Khola, Bardeni (LBS)	No	1	40			40
1	Sankhuwasabha	Arun Nadi Bridge, Chabbise, Sitalpati-6, Heluwabeshi, In between Sankhuwasabha and Kulung 3 Bumling tar Bhojpur (LBS)	No	1	700			700
1	Sunsari	Sardu Khola Bridge, Dharan - Mangalbare (LBS)	No	1	400			400
1	Jhapa	Kishne Khola, Gauriganj Bagaha Bazar (LBS)	No	1	150			150
1	Udayapur	Kamala Nadi Bridge (LBS)	No	1	900			900
		Sub Total	No	8	2510	0	0	2510
3	Lalitpur	Bagmati Nadi Bridge, Khokana-Sokhel Sadak (LBS)	No	1	100			100
3	Kavre	Chauri Khola, Gunsa – Kartikedeurali (LBS)	No	1	100			100
3	Kavre	Sunkoshi Bridge, Sabsukharka (LBS)	No	1	300			300
		Sub Total	No	3	500	0	0	500
4	Gorkha	Marsyangdi Nadi Bridge, Agingarephat Deurali (LBS)	No	1	300			300
4	Mustang	Kali Gandaki, Kagbeni jhaite sadak (LBS)	No	1	400			400
		Sub Total	No	2	700	0	0	700
5	Salyan	Luham Khola Bridge, Luham Kavra Rampur Sadak (LBS)	No	1	300			300
		Sub Total	No	1	300	0	0	300
7	Bahang	Jhanana Nadi Bridge, Pikhet, Chainpur-Dipayal Sadak (LBS)	No	1	800			800
7	Kanchapur	Mohana Nadi Bridge (LBS)	No	1	80			80
		Central Sub Total	No	2	880	0	0	880
		Center Total	No	16	4890	0	0	4890



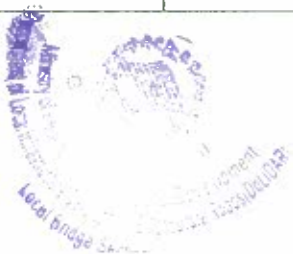
State-Province / District					Budget (In thousand '00000)			Grand Total
State-Province	District Name	Capital grant in district level for the construction of ongoing-regular	Unit	Qty.	Government of Nepal	International Grant	International Loan	
1	Jhapa	Aduwa Khola Bridge, Ninda Khola, Geuaniya Khola Bridge (Ni.Ma. Bi. west), Ramchandra Khola, Gauriya Khola Bridge, Sano Kamal Khola Bridge, Gauriya Khola Bridge (Gauradaha municipality 11), Bhirchuli Khola Bridge and Surunga Bridge (Surunga Tulsibari and Ghailadubba 4)			400			400
1	Illam	Puwa Bridge, Deumai Khola Bridge (New Deumai-fakfok dobhan), Mai Bridge (Sulubung 7-Jamuna 4-Barbote-Sumbek-Sulubung-Mai khola-Pyang Naya bazar)			114			114
1	Panchthar	Muwa Khola (Prangbung 1-Luthintar), Suwan Khola, Hewa Bridge (Prangbung 5-Memeng 2)			70			70
1	Taplejung	Sobuwa Khola Bridge	No	1	70			70
1	Morang	Chisang Bridge, Singhiya Khola Bridge, Judi Khola Bridge, Lohandra Nadi Bridge, Morange Khola Bridge (Jaante-Letang-Chatara-Sisbani 6-7), Sindhure Khola Bridge (Kerabari 8), Khadam Khola Bridge (Dangraha-Tetariya),	No	7	248			248
1	Sunsari	Sera Khola Bridge (Tarahara-Itahari-Taltalaiya park), Seuti Khola Bridge (Dharan 15-Mahadev Chowk-Panbari), Seuti Bridge (Dharan 15-Khoriya-upper Panbari Kerabari)	No	3	114			114
1	Bhojpur	Mahabir Khola Bridge (Maisipakha - Deurali)	No	1	100			100
1	Dhankuta	Charuwa Khola Bridge	No	1	100			100
1	Tehrathum	Lumba Khola Bridge	No	1	76			76
1	Sankhuwasabha	Malta Pangma Khola Bridge, Arun River Bridge Chabbise-Sitalpati-6	No	2	70			70
1	Udayapur	Tawa Khola (Risku), Dhamile Khola Bridge (Mohanpur-Kakani-Hadetar-Mainatar chainej 4 +975), Kali Khola Bridge (Tri. Municipality 12-Mohanpur Kakani-Andheri)	No	3	70			70
1	Khotang	Sapsu Khola Bridge, Tawa Khola Bridge (Diktal Bazar)	No	2	70			70
1	Okhaldhunga	Molung Khola (Mandre Dobhan), Molung Khola Bridge (Molung Dobhan Sisneri - Toxel), Mulghat Bridge (Dudhkoshi-Mulghat)	No	3	200			200
1	Solukhumbu	Solu Khola Bridge, Kahare Khola Bridge (Necha Betghani 4-Badareghat Salyan 1), Kahare Khola (Salyan 1-Deurali 6 - Necha-Batase) Churpghar Bridge (Solu)	No	4	200			200
State 1 Total				43	1902			1902
2	Saptari	Mauli Khola Bridge (Bhagawanpur-Base bazar Kobserni VDC 1)	No	1	100			100
2	Siraha	Gagan Nadi Bridge (Harkati- Daraiya)	No	1	70			70
2	Dhanusha	Bimala Nadi Bridge, Dudhmati Nadi (Sinujoda 5-Satanpur Mahottari road), Chidiya Tole Radhapur Ganeshman Charnat connecting Dhanusha Road Bridge	No	3	350			350
2	Mahottari	Kantawa Khola Bridge (Kanti Bazar-Khairbani), Bhutaha Khola Bridge, Dudhmati Nadi Bridge (Pipara-Majhaura-Fulgaam)	No	3	40			40
2	Sarlahi	Banke Khola Bridge (Dhankaul Hariapur 9-25 -Mahabir HS School, Chitae Ekadas Khola Bridge (Sundarpur VDC-Cadahawa 9)	No	2	300			300
2	Bara	Bhedyahi Singaha Khola (Itayahi 5 - Gadimai-Bhedyahi)	No	1	50			50
2	Parsa	Bagai Khola Bridge, Sikta Khola (Aatmaram path) Gadi Khola, Kachasot Khola (Chorni VDC Parswatole - Tribhuvan Rajpath), Oriya Khola (inbetween Harihpur Nau. Ta. Ja. and Mirapur VDC)	No	5	175			175
2	Rautahat	Bhakuwa Nadi Bridge, Kaamdei Khola Bridge (In between Karudiya-Khesrahiya), Dora Khola Bridge (Raghuapur VDC-Gaditole-Samanpur way)	No	3	57			57
State 2 Total				19	1142			1142



3	Sindhuli	Kulo Khola Bridge (Way to Kamalimai municipality 10 to 18), Baxu Khola Bridge (Dakaha-Chakmake-Bahun Tilpung-Nawalpur)	No	2	133		133
3	Ramechhap	Gumdel Khola, Bhatauli Khola, Ranjor Khola	No	3	110		110
3	Dolkha	Andheri Khola Bridge, Sorung Khola Bridge, Yarsha Khola Mul Gauda Bridge	No	3	50		50
3	Bhaktapur	Gosa Khola Bridge, Hanumante Khola Bridge	No	2	100		100
3	Dhading	Thopal Khola (Sunalobazar), Ankhi Khola, Thopal Khola (Chape Chautara), Kolphu Khola, Dundure Khola Bridge (Sokosh-Tipling-Darkha-Jharlyang)	No	5	200		200
3	Kathmandu	Bishnumati Sapantirtha Bhatkeko Bridge (way to Sankh-nagarkot), Salinadi	No	2	244		244
3	Kavreplanchowk	Cha (Kuntabesi), Punyamati Bridge (Nala Ugrachandi-Tukuchanala), Roshi Suspension Bridge (Mamti), Roshi Suspension Bridge (Katunje), Roshi Bridge (Roshi Khola-Punyamati Dobhan Tribenighat muni), Roshi Khola joins Kavre bansathali -Balthali	No	6	600		600
3	Lalitpur	Thosne Khola (Chapeli), Tilpu Khola (Lubhu-Lamatar), Kodaku Khola (Laplat Ghumti-Thaiba Jharuwa), Nakhhu Khola Bridge (Karyabinayak 13-Chunikhel), Godawai Khola Bridge, Nakhu Khola Bridge (Sanoghata Thecho Bungmati), Tungan Khola Bridge (Lele-Chandanpur), Khani Khola Bridge (Kalwan-Bhattedanda-Ekudole), Gangate Bridge (Mahalaxmi Municipality 16 nayabasti), Kamnasha (Dhobighat)	No	10	300		300
3	Nuwakot	Kolpu Bridge, Tadi Kastutar Chaukhuda, Kuthum Bridge, Dhikure culvert, Khare	No	5	100		100
3	Rasuwa	Sano Khola Bridge	No	1	50		50
3	Sindhupalchowk	Pakhar Khola, Kahare Bridge (Barahbishe), Hadi Steel Trust Bridge(Thampaldhap), Mahadeve Steel Trust Bridge (Thampaldhap), Dhade Bridge (Baramchi)	No	5	400		400
3	Chitwan	Shakti Khola (New), Badarmude Khola Bridge, Rani Khola bridge, Kerunga Khola Bridge (Lamsal Chowk), Kahare Bridge (Bhandara), Karunaga Khola Bridge (Bharatpur-Kalika, Jharana Bridge (Rapti Municipality-Bhandara)	No	7	156		156
3	Makawanpur	Bagmati Bridge (Sikredobhan), Kukreni Khola (Hetauda 3), Simalitar Bridge (Aambhanjyang 3-Gadi 7), Hiley Khola (Hattisude), Karra Khola (Hetauda 20-22)	No	5	200		200
State 3 Total				56	2843		2843
4	Gorkha	Musandi Khola (Ghatte Chisapani), Daraudi Nadi Bridge (Muchowk chanaute-Lakuribot), Daraudi Nadi Bridge (Gorkha 11 to Mirkot), Marsyangdi (Piulighat), Badahare Khola Bridge (Bayerghari-Simalbhanjyang), Lakam Khola Bridge (Gaikhur-Jaisithok-Thatipokhari), Khar khola Bridge (Khoplang-Sera-Palungtar)	No	7	263		263
4	Kaski	Katre Harpan Bridge, Suraudi Bridge, Edi Bridge, Seti nadi bridge (Kharpani-Machapuchare-Sardi), Madi Nadi Bridge (Jyamdu Kauli), Khaste Tal Khola (Budibazar Lekhnath 4 Kharanephant)	No	6	330		330
4	Lamjung	Borang Khola Bridge	No	1	38		38
4	Syangja	Ratne Dobhan, Ras Khola (Bhuwanghat), Dhangling Bridge (Malunga-Beltari-Banstari), Lubdi Bridge (Dhapukpheti), Suraudi Bridge (Pauwagaude 7, 8), Nayabazar Pakki Bridge (Pauwagaude 1-Thuladihi 1), Thadokhet Mainikham Bridge (Arjun Chaupari 1-pu. ba. municipality 10)	No	7	160		160
4	Tanahu	Labdi Khola Bridge, Buldi Khola Bridge (Chudinadi), Kalesti Gajadey, Tuhurey Pasal, Archaley Bhanjyang, Buldi khola (Byas 1, 3) Gunadi Khola (Tallo gunadi) Suraudi Khola (Dulegauda), Buldi Khola (Byas 1-11), Badahare Bridge (saligam-Gajarkot)	No	8	275		275
4	Manag	Dudha Khola (thonche), Marsyangdi Nadi Bridge (Humde-Dawal)	No	2	194		194
4	Baglung	Theule Khola Bridge (Kushmishera), Huggisir Bridge, Huggi Khola (Batakachaur-Nayabazar), Badighat (Daraling-Bhimgatte), Jamaraghat Bridge	No	5	137		137
4	Myagdi	Dukhu Khola Bridge, Swata Khola Bridge	No	2	80		80
4	Parbat	Chirdi Khola Bridge, Madi Kuwa Jhalak Kurgu Lukhu huwas Sadak Pul	No	2	72		72
4	Mustang	Kaligandaki Bridge (Jomsom-Tamling), Kaligandaki Nadi (Lete-Kunje)	No	2	229		229
State 4 Total				42	1778		1778



5	Nawalparasi	Bainaha Khola Bridge, Chuchadi Khola Bridge, Jharahi Khola Bridge (Ramgaram 1-4), Damrahi Khola (British Camp-Belipidpur Dhurkot)	No	4	228			228
5	Dang	Hapur Bridge, Sikrahawa Bridge (Atipur-Topla), Gurje Bridge, Chiragar Khola Bridge (Hakeri-Shreegaon), Babai nadi (Sadiyar-Mainawar), Bhaludondre Khola (Ganga Paraspur-Deukhari), Bagale Khola (Ghorahi Municipality 6,7), Katuwa Khola	No	8	267			267
5	Puythan	Chukaha Khola Bridge, (Cheneta), Jhimruk Nadi Bridge (Macchidhad), Gartung Khola Bridge (Macchi Bange Marot)	No	3	152			152
5	Rolpa	Madi Khola (Kolgaon), Chapi Khola Bridge (Nigalpani)	No	2	57			57
5	Arghakhanchi	Bagmati Bridge, Pokhreni Kukreni Khola, Simalitar Bridge, Hiley Khola (Hattisude), Sikharpur phafarbari Bridge, Karra Khola (Hetauda 20-22)	No	6	38			38
5	Banke	Bhajagaudinala (Bankatta 9-Nauwasta1)	No	1	100			100
5	Bardiya	Sarju Nadi (Kailash Nagar), Budi Kulo, Bardewa Khola	No	3	100			100
5	Rupandehi	Charange Khola Bridge, Charange Khola, Ghamaha Khola Bridge, Sukauli Khola Bridge (Ringroad-Saraulikhand-sainamaina)	No	4	114			114
5	Paipa	Haiaap Khola Bridge, Ridi Khola Bridge (Siddesore-Manbhag)	No	2	180			180
5	Kapilvastu	Beth Khola Bridge (Uchidehawa-Anarath-chapiya)	No	1	70			70
5	Gulmi	Kharjyan Khola, Jhardi Baileghat Bridge (Badagaon-Bami), Nisti Khola (Amarai-Dohali 2), Dumai Khola (Amar-arbathok-Hardineta)	No	4	270			270
5	Rukum	Sani Bheri Bridge (Rukumkot 6-Pokhara 9)	No	1	100			100
State 5 Total				39	1676			1676
6	Salyan	Sarada Khola Bridge (Kharibot-Tatke-Bafu khola), Rare Chaur Khola (Kharibot-Tatke-Baafu khola),	No	2	70			70
6	Dolpa	Rupgad Bridge (Dunai-Tribeni)	No	1	70			70
6	Jumla	Daan Sanghu Khola Bridge, Tila Nadi (Kudari-Topla), Jawa Bridge (Urthu-Chautara)	No	3	152			152
6	Kalikot	Tila Nadi (Bahisegauda-Chikhaya)	No	1	114			114
6	Mugu	Bhatte Chaur RCC Bridge (Shreenagar-Ruga)	No	1	152			152
6	Surkhet	Chingad Khola Bridge (Dhadkhet), Aampdali Khola (Birendranagar 20)	No	2	70			70
6	Dailekh	Lohare Khola (Naumule-Papat-Kalikot)	No	1	110			110
6	Jajarkot	Holu Khola Bridge, Bherinadi (Damachaur-Aul-Jurta)	No	2	70			70
State 6 Total				13	808			808
7	Doti	Godare Khola Bridge, Deudunga Khola Bridge	No	2	168			168
7	Bajhang	Seti Nadi Bridge (Pankot NEW), Sukhagad Bridge	No	2	76			76
7	Kailali	Kanda Khola Bridge (Joshipur-Bhagatpur NEW), Kailalinala Dhangadhi 1, 2), Bhalu Khola Bridge (Balmenghat), Chori nadi Bridge (Pratappur 3, 6)	No	4	300			300
7	Kanchanpur	Totinala Bridge (Jhalari)	No	1	135			135
7	Baitadi	Palmodigad Bridge (DNP 6-12)	No	1	152			152
7	Darchula	Raichu Khola Bridge (Naugad 6), Dhaligad Khola Bridge (Naugad 6)	No	2	70			70
7	Achham	Budi Ganga Bridge, Kailash Bridge, Rittabira budiganga pul, Duni Rawa Khola Bridge	No	4	300			300
7	Bajura	Barjugad Bridge (Barahbishe)	No	1	100			100
7	Dadeldhura	Sun Khola Bridge	No	1	50			50
State 7 Total				18	1351			1351
State 1-7 Total				230	11300	0	0	11300
Foreign Assistance								
		Local Roads Bridge Support Unit, (SDC)	TA			3,800		3,800
		Monitoring and Evaluation			2			2
		Local Bridge Section - Other			21			21
Grand Total					16713	0	0	20,513



Annex 5: Capacity Building Plan - Summary FY 2075/76 BS

SN	Training date		Name of Training Program	Target Group	Remarks
	From	To			
Organizational Development Training					
1	August - September (3 days each)		Oreintation on Bridge Information Management System – 20 nos. x 3	Technical Personnel from Ministry of Physical Infrastrucutre Development of States	States 3 and 4 in Pokhara/Kathmandu
2	September - October				States 1 and 2 in Biratnagar/Janakpur
3	October - November				States 5, 6 and 7 in Nepalganj/Surkhet
4	August - September (16 days + 1 day field visit)		Design of Bridges – 20 nos.	DoLIDAR/ States engineers and Consulting firm engineers	16 days training, 1 day field visit (holiday)
5	September - October		Supervision and Management of Bridge Construction Part I – 80 nos.	States Sub-engineers	Training will be organized at Biratnagar/Chitwan/Surkhet/Dhangadhi
6	November - December (3 days each)		Construction Methodology on Pile Foundation/Pre-stressed Bridge - 5	Contractors technical persons	As per the request fro Contrator/government office if any
7	December - January		Training on Falsework, Formwork and Temporary Support	Contractors	As per the request fro Contrator/government office if any
Occupational Skill Training					
1	February - March		Low cost river protection and Bio-engineering Training	Community people (20 Nos.)	
2	September - October		Gabion box weaving and filling	Community people (20 Nos.)	
3	February - March		Bridge Painting	Community people (20 Nos.)	

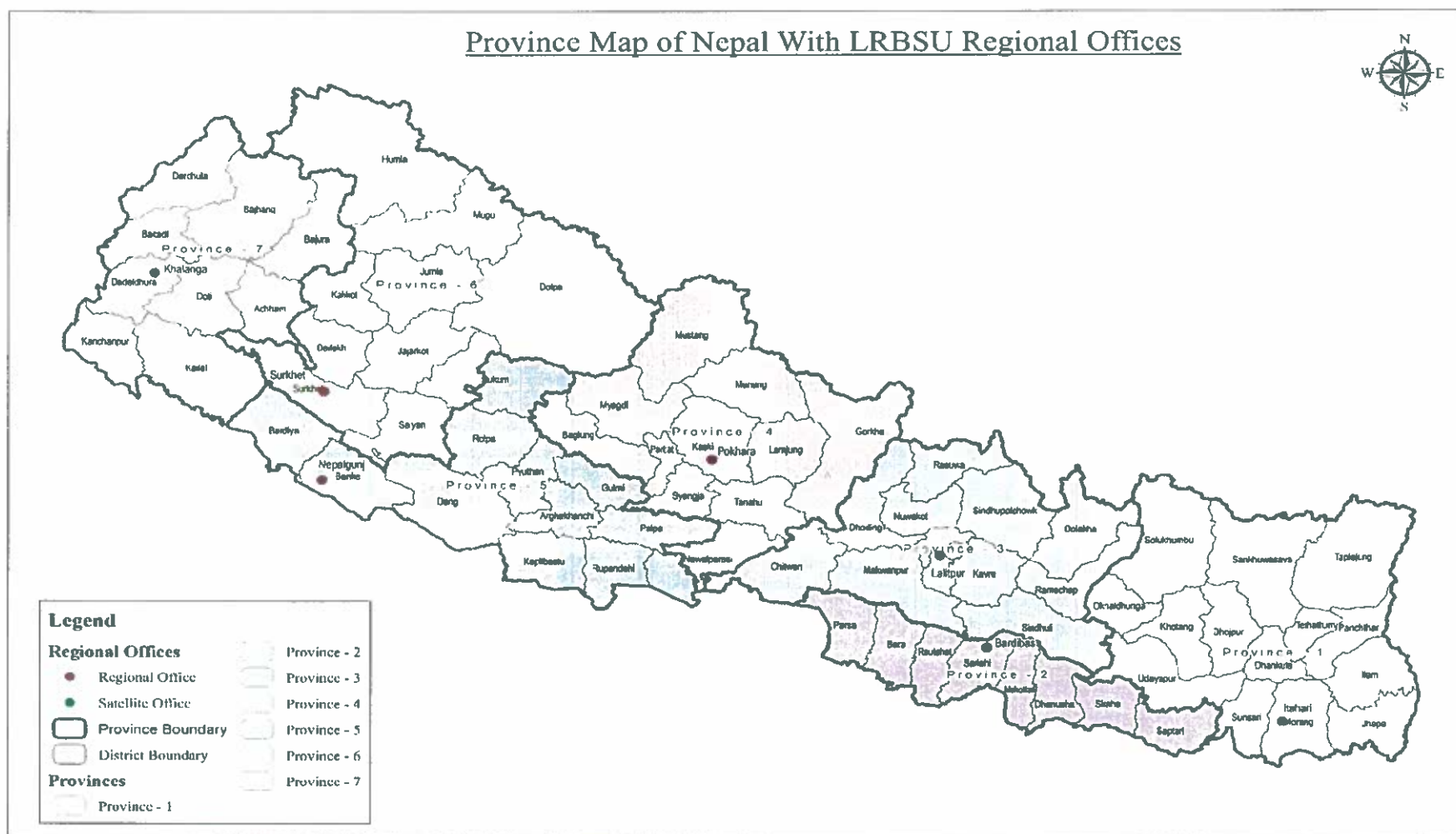


Annex 6: Procurement Plan for FY 2075/76 BS

SN	ITEM	Description	Quantity	Unit	Proposed unit budget (in CHF)	Total proposed Budget (in CHF)	Main responsible person	Support Person/s	Start date	Completion date
A. Local procurement										
1.1	Laptop Computers	Portable and Good Quality	15	Set	1,000	15,000	PO	IT Person	Jul-18	Sep-18
1.2	Solar Power and accessories	As per requirement	25	Set	250	6,250	PO	RBC	Sep-18	Jun-19
1.3	Field/ Site Office Equipment	As per requirement	20	No.	400	8,000	PO	DyTL	Jul-18	Jun-19
1.4	Survey Equipment	As per requirement	10	No.	2,000	20,000	PO	DyTL	Sep-18	Jun-19
Total (CHF)						49,250				



Annex 7: LRBSU State - Regional and Satellite Office Setup



Annex 8: Outcome Monitoring Summary (OMS) Sheet

10.1. The following table gives progress summary with relation to outcomes for the period FY 2074/75 BS

Phase III Indicators	Targets (July 2017-18)	Achievement (July 2017-July 2018)	Status/comments
Outcome 1: People, especially people from DAGs use motorable access provided by all-weather roads to services and opportunities.			
1.1 Average freight cost decreased by 25% as compared to the baseline data	Average freight cost decreased by 25%	Average freight cost decreased by 35 %	Status : Met
1.2 Traffic increased by 30% as compared to the baseline data	Traffic increased by 30%	Traffic increased by 124 %	Status : Met
1.3 Freight volumes (import and export) increased by 30% as compared to the baseline	Freight volumes (import and export) increased by 30%	Overall freight volumes (import – 161% and export – 40%) increased by 112%	Status : Met
1.4 200 trained DAGs in construction skills are employed as skilled labour in bridge construction trade.	60 trained DAGs in construction skills are employed as skilled labour in bridge construction trade	Out of 22 people trained 6 DAGs including 3 women. Of total, one received job in painting Badigad bridge.	Status : Not Met
1.5 Average travel costs (time and fares) are reduced by 25%	Average travel costs (time and fares) are reduced by 25%	9% travel fare and 11% time saved after the bridge construction	Status : Met
1.6 Increase in numbers of women seeking health cares in hospitals	Increase in numbers of women seeking health cares in hospitals	Numbers of women seeking health cares in hospitals increased by 31 %.	Status : Met
1.7 Increase in numbers of girls' enrolment in schools/ colleges	Increase in numbers of girls' enrolment in schools/colleges	Numbers of girls' enrolment in schools/colleges by 11 %.	Status : Met
Outcome 2: National and local institutions apply and enforce appropriate local road bridge strategy.			
2.1 Increase in the Percentage/Number of bridges selected following the 'Bridge Selection and Prioritizing Criteria'	Maximum number of bridge selected in FY 2016/17 follow Bridge Selection and Prioritization Criteria comparing to previous FY.	No new bridges were selected in FY 2074/75.	Status : N/A
2.2 Bridge builders ⁹ are following the endorsed Local Road Bridge Strategy including the norms and standards.	Bridge builders are following the endorsed Local Road Bridge Strategy including the norms and standards.	Contractors and Consultants are following norms and standards prepared by LRBSU	Status : Met
2.3 Local Bridge Section/DoLIDAR are managing and coordinating bridge building activities across the country.	Local Bridge Section/DoLIDAR are managing and coordinating bridge building activities across the country.	Despite ambiguity towards the role of LBS/DoLIDAR in the current structure of the country, DoLIDAR continued to manage bridge building activities across the country with support from LRBSU	Status : Met
2.4 GoN/MoFALD allocates adequate budget regularly to districts to implement rural motorable road bridges.	GoN/MoFALD allocates adequate budget regularly to districts to implement rural motorable road bridges.	The federal government allocated total 2.05 billion budget for 'Local Roads Bridges of Local Level and Community Access Improvement Programme' for the FY 2075/76 BS	Status : Met

⁹ DCCs and Private sector (Contractors, Consultants and Educational Institutes)

