

Swiss Agency for Development and Cooperation SDC स्वीस सरकार विकास सहयोग एसडीसी

SMALL IRRIGATION PROGRAM (SIP)



ANNUAL PROGRESS REPORT JULY 2020-JULY 2021 (FY 2077-78)



PROGRAMME MANAGEMENT AND IMPLEMENTATION SUPPORT CONSULTANT (PMISC) NOVEMBER 2021







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Cover Page Photo: Treasurer of the Dhodre Lamaswara Water Users Association disclosing the expenditures incurred during the public audit in Molung LG Okhaldhunga| Photo Credit: Krishna Tamang

1. Basic Information

Country	Nepal		
Programme Name	Small Irrigation Prog	gramme (SIP) – Phase	e II
Sector	Irrigation		
Sub-sector	Small Irrigation		
Advisory Agency at Federal Level	_	Affairs and General Adartment of Local Infra	
Coordinating Agency		Infrastructure Developater Resource and Er	
Implementing Agency	Local Governments		
Agreement		nt between the Govern ernment of Switzerland	
Programme Goal		ecially from the disady ir poverty by increasin	
Programme Outcomes	Local Governments (LGs) respond effectively to the needs of small farmers for irrigated agriculture Small farmers especially from DAGs increase agricultural productivity Market actors offer innovative supports and products to farmers in irrigated schemes		
Programme Components	Local Governme II. Improved irrigati	on infrastructures sociations irrigation sy	
Programme Duration	01.07.2020 - 31.12	.2024	
Geographical Coverage	Local Governments	of Mid Hills in Province	ce 1
Total Irrigation Coverage	20'000 Hectares		
Estimated numbers of schemes	Approx. 1'300 Sche	mes	
Beneficiaries	65'000 Households	(Assuming 0.30 Hect	are/Household)
Programme Finances ('000)	Swiss Francs (CHF)	Nepali Rupees (NPR)	Share (%)
SDC	17'600'000	2'024'000'000	35.58%
Federal Government (GoN)	8'860'000 1'018'900'000 17.91%		17.91%
Province 1 Government	8'960'000	1'030'400'000	18.12%
Local Governments	9'660'000	1'110'900'000	19.53%
Beneficiary Farmers	4'380'000	503'700'000	8.86%
Total	49'460'000	5'687'900'000	

Note: Exchange Rate: 1 CHF= NRs.115.00

2. Strategic Review and Outlook

The report covers the main achievements of fiscal year 2020-21 (July 2020-July 2021) of Small Irrigation Programme (SIP-II) being implemented in 48 local governments (LGs) in Province 1 of Nepal.

A total of 185 irrigation schemes were completed this year, all of which were carried over from fiscal year (FY) 2018-19. A total of 8,322 small farming households received year-round and increased irrigation water, among which 41% were from the disadvantaged groups (DAG) and 65% have a landholding of less than 0.5 ha. The completed schemes provided round the year irrigation to 2,511 ha of area.

Efficient utilization of irrigated water increased the yield of major irrigated food crops as well as the cropping intensity in schemes completed during SIP-Phase I. On an average, cropping intensity in completed schemes increased by 43% (Baseline 160%; Achieved: 228%). Similarly, on an average, crop yield for monsoon paddy was increased by 71% (Baseline 2.50 t/h; Achieved: 4.29 t/h), for spring maize by 159% (Baseline: 1.44 t/h; Achieved: 3.74 t/h) and for wheat by 12% (baseline 1.68, Achieved 1.88 t/ha). Discussions with the farmers during crop cut survey revealed that the unavailability of seeds and fertilizers on time this year resulted in low yields for wheat. Production of winter vegetables and potatoes increased by 101.06% in schemes completed under SIP-I. The results are based on the crop cut survey conducted in 24 schemes completed during SIP-I for monsoon paddy during November-December, 2020, in 15 schemes for spring maize in August 2021 and in 13 schemes for wheat and 14 schemes for potato during April 2021.

69% irrigation schemes built or rehabilitated under SIP-I in three of the working areas are functioning well after 3 years of completion. Further, 31% of the irrigation schemes are functional with minor damages caused by landslide, flood and road construction. 100% Water Users' Associations (WUAs) have established a fund for operation and maintenance. As upfront cash contribution of 1 % is mandatory for the WUAs before signing the agreement with the Palikas, all 185 completed schemes have established the fund.

97% of the WUAs have at least 40% or more women in its executive committee. Among the 185 WUAs registered, only five schemes have less than 40% women, while all schemes have at least 33% women in its executive committee. All schemes also have at least 1 woman or a representative of a discriminated group in a leadership position in the WUA.

Ministry of Physical Infrastructure Development (MoPID) initiated the formation of a task committee to draft a guideline on one window system for identification, budgeting, implementation, monitoring and support of small irrigation. The five membered committee will develop the guideline on one window system for small irrigation and is expected to be completed by November 2021.

With the primary objective to strengthen market linkages between WUAs and Agri-businesses, a memorandum of understanding (MoU) was signed between SIP-II and Nepal Agriculture Market Development Program (NAMDP). As a means to strengthen market linkages between WUAs and agri-businesses, potential private sector market actors with capacity and willingness to expand their businesses in SIP areas were mapped along three market corridors, i.e., Mechi, Koshi and Sagarmatha. Further, criteria to identify schemes with market development potential (MDP) was jointly established with NAMDP. Further a multi stakeholder meeting among WUA representatives, potential traders, input suppliers, service providers and municipality were organized in Phidim Municipality which resulted in a partnership with Kamakhya vegetable and fruits suppliers with the objective to capacitate traders (Kamakhya) to source out more agriculture produce from new areas that gives them sustainable supply of better-quality vegetables to trade through local collectors.

Due to the lockdowns imposed in response to the CoVID-19 pandemic, learning event on innovations and experiences in the development of small-scale irrigation could not be organized this year for LGs. A new desktop-based management information system (MIS) has

been developed for SIP-II which is also a part of the PPR system. Information included in the PPR system is automatically reflected in the MIS portal and the information entered in the MIS system is automatically generated in the newly designed website www.sipnepal.org.

Program operations continued in 48 LGs in the mid-hills of Province 1 and a new MoU was signed with all. Further, consultative meetings were held with 12 additional LGs in Bhojpur, Ilam, Panchthar and Terhathum. PMISC continues to support the LGs in planning, project implementation and monitoring with staff stationed at the LGs as project focal person.

A total budget allocated for FY 2020-21 was NPR 1,047,552,309 (CHF 9,109,151) excluding farmers contribution, out of which NPR 542,544,571 (CHF 4,717,779) [52%] was spent. Out of NPR 897,852,309 (excluding WUA's 10% contribution) allocated to civil works, 49% amounting to NPR 441,275,381 (CHF 3,707,266) was spent. Farmers have contributed work for approximate value of NPR 44,127,538 (CHF 383,718) meaning on an average, WUAs have raised 10% of the total construction cost. 35% of the overall programme fund was spent on discriminated groups and 65.42% on non-discriminated groups.

3. Introduction

3.1 Basic Information

SIP-II is implemented by the Government of Nepal (GoN) in collaboration with the Government of Switzerland and is built upon the experience of implementing SIP, Phase I. The programme will cover Local Governments (LGs) of mid hills in Province 1 (See Annex II). It will provide year-round irrigation to 20,000 hectares in about 1,300 small scale irrigation systems through community driven process benefiting 65,000 farmer households.

The expected impact of the programme is to reduce the poverty of small farmers especially from the disadvantaged groups by increasing their agricultural income. This will be achieved through three outcomes: (i) local Governments respond effectively to needs of small farmers for irrigated agriculture; (ii) small farmers especially disadvantaged groups (DAGs) increase agricultural productivity and (iii) market actors offer innovative supports and products to farmers in irrigated schemes.

The main approach of the programme is to consolidate the positive results in development of irrigation infrastructure, and further refine scheme design to condition these schemes for dry season irrigation of high value crops, and thus create enabling conditions for the introduction of commercialized agriculture. LGs shall actively support the introduction of improved agriculture practices with a focus on the production of high value cash crops as well as ensuring a conducive environment for the development of the private sector exist and facilitate the linkage between the input and output markets with the farmers.

A memorandum of understanding (MoU) was signed between Ministry of Physical Infrastructure Development (MoPID), Province 1 and Program Management and Implementation Support Consultant (PMISC) on 23rd July, 2020 for the implementation of SIP Phase II (See Annex V). Further, MoUs for phase II between 48 Palikas and PMISC were signed along with a brief orientation on the program.

With the primary objective to strengthen market linkages between WUAs and Agri-businesses, a MoU was signed between SIP-II and Nepal Agriculture Market Development Program (NAMDP) (See Annex VI). The collaboration aims to benefit both agri-businesses (NAMDP) and WUAs/farmers (SIP), ultimately contributing to strengthening market expansion and agriculture income. Concrete workplan for FY 2020-21 was also jointly prepared by SIP and NAMDP team which is attached in Annex VII.

3.2 Social-political context

The state restructuring and the transfer of power to newly instituted structures have been an important aspect of federalism in Nepal. Six years since the promulgation of the Constitution of Nepal and four years since the local level elections in 2017, the federal, provincial and local

governments are in operation today as envisioned by the Constitution. While roles and responsibilities among the three spheres of government with the spirit of federal governance have been gradually clarified, sector specific functions need further institutionalization by developing system and procedures.

In line with the Constitution, the Province 1 Government (PG1) passed the Province Public Services Commission Act, 2076 in September 2020 which paved the way for the formation of Province 1 PSC. However, PG1 has not been able to recruit staff for itself and local bodies, since 2017 as the Federal Civil Service Act is yet to be endorsed by the Federal Parliament. While the federal government had registered the Federal Civil Service Bill at the Parliament Secretariat in February 2019, there has not been a desired progress towards its passage.

The unprecedented public health and economic crisis brought by the CoVID-19 pandemic continued to have adverse effects in Nepal's efforts to wellbeing and prosperity. With the surge in CoVID-19 cases in neighbouring India with whom Nepal shares a 1,770 km long porous border, Nepal witnessed the second wave of the pandemic in mid-April, 2021. Nepal suffered altogether five months of lock down in 2020 and another two months in 2021.

The pandemic and lockdown have had negative impact on every sector in the county especially on employment, income and remittance inflows resulting into increased inequality and economic vulnerability of DAGs as their safety nets and social protection remains weak and limited. With an early vaccination drive, starting in late January 2021, the country has vaccinated around 22% of its total population until August 2021¹.

While the country wide lockdown ended on 21st July, 2020, many Palikas as well as Biratnagar remained under lockdown until early October 2020 due to increasing numbers of CoVID-19 cases. The case was similar during the second lockdown as well which started in late April 2021. As restrictions on public gatherings and mass meetings were in place, much of project implementation modality had to be adapted. Information was disseminated either virtually or with only the executive members. WUAs were formed through the wards with virtual presence of project teams. Palikas played a tremendous role in completing these activities.

3.3 Strategic Links

SIP-II adheres to the Swiss Cooperation Strategy (SCS), 2018-2021 by contributing to its overall goal of "women and men benefit from equitable socio-economic development and exercise their rights and responsibilities in an inclusive federal state." More specifically, it aligns with Domain 2 of the SCS, where in "women and men, especially from disadvantaged groups, find employment and increase their income" as SIP works in areas with higher DAG concentration as well as prioritizes DAGs and women during the entire project implementation process.

At national level, the 15th Plan, (2076/77-2080/81) aims to increase agriculture production and productivity through reliable and sustainable irrigation services. Similarly, the Agriculture Development Strategy (ADS), 2013 seeks to make "a self-reliant, sustainable, competitive, and inclusive agricultural sector that drives economic growth and contributes to improved livelihoods and food and nutrition security." SIP through the expansion of irrigated area by the most economic and equitable means, increases the irrigation efficiency and intensity, and improves irrigation management of existing systems as envisioned by the ADS.

At the provincial level, program aligns with the Periodic Plan of Province 1 Government. Out of the total 783,595 cultivable land, currently only 39% is irrigated and SIP will provide year-round irrigation to 20,000 ha in the mid-hill LGs of Province 1.

¹ https://kathmandupost.com/health/2021/08/24/all-you-need-to-know-about-nepal-s-vaccination-status-1629811950

4. Outcomes achieved for FY 2020-21 (2077-78)

4.1 Descriptions and assessment of achieved outcome indicators

Outcome 1: Local Governments (LGs) respond effectively to the needs of small farmers for irrigated agriculture

During FY 2020-21, 48 local governments of Province 1 responded effectively to the needs of small farmers for irrigated agriculture with 20% financial contribution in construction works.

a. 100% LGs have established a one window system for identification/ budgeting/implementation/ monitoring/ support of irrigation schemes

Ministry of Physical Infrastructure Development (MoPID) initiated the formation of a task committee to draft a guideline on one window system for identification, budgeting, implementation, monitoring and support of small irrigation. The five membered committee consisting representatives from MoPID, Ministry of Land Management, Agriculture and Cooperatives, Local Governments and experts on irrigation and governance will develop the guideline on one window system which is expected to be completed by November 2021.

b. 35% (20,000 hectares) increase in additional area under year-round irrigation in participating LGs

4% (2,511 ha) increase in additional area under year-round irrigation through the construction of 185 schemes in participating LGs have been recorded during FY 2020-21 against the target of 11 % (6,239).

A total of 337 irrigation schemes, 153 (2,239 ha) carried over from FY 2019-20 and 184 (4,000) new schemes resulting in 6,239 ha were planned for construction or rehabilitation during FY 2020-21. However, as the feasible schemes were proposed before the completion of the design process, area coverage of new schemes resulted in 3,582 ha. Further, two schemes in Arun RM (due to budget deficiency) and one in Champadevi RM (due to technical unfeasibility) were dropped, resulting in 3,557 ha.

While construction works were completed in all carried over schemes, among the new schemes, only 32 were completed. Due to the delay in program entry in the Line Ministry Budget Information System (LMBIS) at both federal and provincial level, agreement in 181 new schemes was only started in March. This was mainly due to the delay in allocation of federal government's share of budget as the bi-lateral agreement was signed in July (after the planning and budgeting process for FY 2020-21 was completed). LMBIS entry in Provincial LMBIS was completed on 23rd February 2021 while Federal LMBIS excluding FG's share of the budget was completed on 5th April, 2021. Further, restrictions imposed by CoVID-19 pandemic also impacted the program implementation process.

Work in 3,285 ha is on-going which is expected to be completed by January 2022.

c. 100% schemes have received at least one visit of a rural advisory services provider during the production cycle

34% schemes have received at least one visit of rural advisory service providers during the production cycle among the completed schemes. Under this, WUAs received visit from JT/JTAs for technical advices, seeds from LGs, soil testing facilities and other extension services.

A format to identify potential and needs of irrigation scheme has been developed and used by JT/JTAs while visiting the WUAs. As this was the first year of program implementation, the program teams initiated to align the overall planning process to agricultural planning specific to SIP. Further, information on availability of JT/JTAs in the LGs, review of agriculture plans and budget was also done during this FY.

A more systematic approach will be adopted from next FY to ensure that completed schemes receive at least one visit of rural advisory service providers. An agriculture planning &

implementation process guideline will be developed during next FY which will include stepwise process, from agriculture planning to implementation of the plan at WUA and LG level in SIP schemes to increase productivity & production. Further, project team will support the agriculture section staff to prepare SIP schemes-related action plans so that they can continue these in subsequent years too.

Outcome 2: Small farmers especially from DAGs increase agricultural productivity

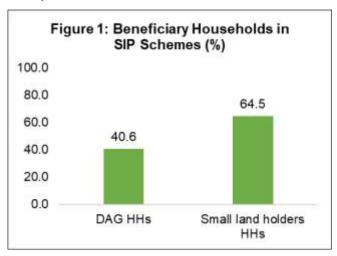
Small farmers especially from the disadvantaged groups increased the productivity of monsoon paddy and maize by more than 30%.

a. 65'000 HHs benefited from year-round and increased irrigation water

A total of 8,322 households benefited from year-round and increased irrigation water in FY 2020-21. On an average, each scheme covered 45 households. The total beneficiary household targeted in the YPO 2020-21 was 20,000.

Construction work in 185 schemes were completed during this FY due to delay in budget allocation and LMBIS entry. Delay in the implementation process in turn reduced the number of irrigation schemes completed and the households benefitted. However, with work on 149 schemes ongoing, an additional 7,654 households will be benefitted.

Among the benefitted households, 41% were from disadvantaged groups and 65% have a landholding of less than 0.5 ha. To ensure that households with a landholding less than 0.5 ha are covered



in higher numbers, the scheme prioritization criteria has already been revised during this FY which now includes small landholders as a criterion.

b. 30 % increase in yields of major irrigated food crops (Rice, Wheat and Maize) and 30 % increase in cropping intensity (baseline: 160% target 190%) in SIP command area

Efficient utilization of irrigated water increased the yield of major irrigated food crops as well as the cropping intensity in schemes completed during SIP-Phase I. On an average, cropping intensity in completed schemes increased by 43% (Baseline 160%; Achieved: 228%).

Similarly, on an average, crop yield for monsoon paddy was increased by 71% (Baseline 2.50 t/h; Achieved: 4.29 t/h), for wheat by 12% (Baseline 1.68, Achieved 1.88 t/ha) and for maize by 159% (Baseline 1.44, Achieved 3.74 t/ha). Discussions with the farmers during crop cut survey revealed, that the unavailability of seeds and fertilizers on time this year resulted in low yields for wheat. Regarding maize, the baseline was set based on the discussion with farmers and far below the national average which is 2.96. The achieved result however is closer to the current Province 1 average of 2.66 t/ha.

The results are based on the crop cut survey conducted in 24 schemes completed during SIP-I for monsoon paddy during November-December, 2020, 13 schemes for wheat, 14 schemes for potato during April and 15 schemes for maize during August 2021.

During this FY, crop cut survey was also conducted among new schemes to establish baseline for major irrigated food crops (Rice, Wheat and Spring Maize) as well as for winter vegetables (See Table 1 for the baseline data). Crop cut survey was conducted in 33 schemes for paddy, 34 schemes for spring maize, 22 schemes for wheat and 30 schemes for potatoes.

c. Winter vegetable production and other high value crops increases by a minimum of 50% (by volume) above the current total production in SIP schemes

Production of potatoes and winter vegetables increased by 101.06% in schemes completed under SIP-I. The average productivity (yield) of potato and winter vegetable increased from 5.96 t/ha to 10.06 t/ha (68.76% increase). Results are based on the crop cut survey conducted for potatoes in 14 schemes completed under SIP-I, while data for other vegetables was collected through discussion with farmers.

Table 1: Baseline Data for SIP-II			
	Baseline		
Yield of major food crops	mt/ha		
Monsoon Paddy	3.56		
Spring Maize	4.38		
Wheat	2.09		
Cropping Intensity	160%		
Winter Vegetable Production	mt		
Potatoes (in 531 ha)	851		
Vegetables (Cauliflower, cabbage,			
tomatoes, green peas)	On-going		

The increment in winter vegetables especially potato could be attributed to farmers practicing potato under limited irrigation water or on residual moisture in soil before the rehabilitation of the system. With increased availability of irrigation water and farmers applying the irrigation water with more efficiency resulted in higher production than the yearly target of 50%.

Winter vegetables and high value crops have been identified as potato,

cauliflower/cabbage, tomato, green peas and other allied crops for Phase-II. Crop cut survey to establish baseline data for winter vegetables is expected to be completed by March 2022 (See Table 1).

d. 90% irrigation schemes built or rehabilitated under the program are functioning well after 3 years of completion (Baseline # 93%)

69% irrigation schemes built or rehabilitated under SIP-I in three of the working areas are functioning well after 3 years of completion. Further, 31% of the irrigation schemes are functional with minor damages caused by landslide, flood and road construction. These damages can be repaired by the WUAs themselves (financially) and according to them will be done after the current crop season which is December 2021.

Results are based on a short-term monitoring conducted in 49 schemes completed during SIP-I in three of the working areas, i.e., Okhaldhunga, Khotang and Udayapur during the month of April, 2021.

e. At least 80% of WUAs establish a fund for Operation & Maintenance and major repairs, through the equitable collection of water service fees

100% WUAs have established a fund for operation and maintenance. As upfront cash contribution of 1 % is mandatory for the WUAs before signing the agreement with the Palikas, all 185 completed schemes have established the fund. However, whether WUAs collect regular funds through the equitable collection of water service fees will be monitored and reported in the six-monthly report.

Outcome 3: Market actors offer innovative supports and products to farmers in irrigated schemes

a. 50% of WUA that have contracted at least one input provider in the last 12 months and 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops (Baseline 0%)

Criteria to identify schemes with market development potential (MDP) was jointly established with NAMDP, however schemes could not be selected applying the criteria. The market related information required to select schemes were not collected during the detailed survey as the joint activities to be implemented by NAMDP and SIP was only developed in October 2020. Although the criteria itself was developed in October, market orientation to program team further delayed the information collection process to apply the criteria.

As this was the first year of collaboration between NAMDP and SIP to strengthen market linkages between WUAs and agri-businesses, potential private sector market actors with capacity and willingness to expand their businesses in SIP areas were identified along three market corridors, i.e., Mechi, Koshi and Sagarmatha corridor.

With the intention of meeting the target of WUAs contracting at least one input provider as well as establishing contracts with traders or wholesalers, a multi stakeholder meeting among WUA representatives, potential traders, input suppliers, service providers and municipality was organized in Phidim Municipality. One of the outputs of this meeting was partnership with Kamakhya vegetable and fruits suppliers with the objective to capacitate traders (Kamakhya) to source out more agriculture produce from new areas that gives them sustainable supply of better-quality vegetables to trade through local collectors. A tripartite MoU was signed between Kamakhya, NAMDP and SIP for this.

b. 70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market (Baseline will be established as the schemes are selected)

For FY 2020-21, identifying sample households from schemes with market development potential (MDP) for baseline study was planned. While the concept note for the baseline study was developed, the study to establish a detailed baseline data on key project indicators to measure the results over the course of the project in the 57 working Palikas has been planned only for FY 2021-22. This was mainly due to the restrictions on mobility caused by CoVID-19 pandemic.

4.2 Transversal themes

A gender action plan (See Annex VIII for details) is applied by the programme to address gender inequality and social exclusion issues. The action plan contains specific targets for participation of and ensuring project benefits reach women and disadvantaged groups. The gender action plan has been operationalized through,

- application of labour law,
- prohibition of child labour in construction and maintenance works.
- equal pay for equal work of equal value regardless of gender, ethnicity or caste.
- 40% representation of women in WUA executive committees,
- Proportional representation from head, middle and tail-enders,
- One woman holding a key leadership position (chairperson, secretary, treasurer) in the WUA committees.

A rapid risk and impact screening of the programme using SDC's Climate, Environment and Disaster Risk Reduction Integration Guidance (CEDRIG) tool reveals that overall, there is no serious risk due to climate change or natural hazards and the project has no serious impact to the environment. The programme however ensures environmental screening of all irrigation schemes during the survey phase where schemes with high environmental risks are not taken up for implementation. This is one of screening criteria for scheme selection. During the design phase, an environmental checklist is used which ensures that effects of all construction works are within the permissible environmental threshold.

Conflict Sensitive and Compliance Monitoring is also applied in a cross-cutting way by incorporating past lessons learned related to fragility, early detection of potential conflict situations, especially regarding water sharing issues addressing sensitivity to social disparities and social inclusion in the project's activities.

5. Outputs and performance according to YPO 2020-21

Provincial Government strengthens its capacity to support Local Governments

Province Government 1, as part of strengthening its capacity to support local governments, has formed a task committee at MoPID to draft a small irrigation guideline to ensure a one window system in the implementation of small irrigation projects. This guideline will also include the national survey and construction norms as well as relevant specifications and standards/manuals related to small irrigation. The guideline is expected to be completed by November 2021 and shared with all LGs in PG1 for adaptation and implementation.

Further, to ensure that no duplication occurs at the LG level regarding the implementation of irrigation schemes below 50 ha, MoPID circulated a letter (attached in Annex IX) in April, 2020 to the eight Water Resources and Irrigation Development Division under MoPID.

The responsible Federal/Provincial government agencies could not arrange to send the SIP budget authority to the program LGs by the end of August during FY 2020-21. There was substantial delay in program entry for FY 2020-21 (which in principle should have been entered in federal system by April 2020 and PLMBIS by May 2020). This was mainly due to the delay in allocation of federal government's share of budget as the bi-lateral agreement was signed in July 2020 (after the planning and budgeting process for FY 2020-21 was completed). PLMBIS was completed on 23rd February 2021 while Federal LMBIS excluding FG's share of the budget was completed on 5th April, 2021. Federal budget was entered only towards the end of the fiscal year.

A new desktop-based management information system (MIS) has been developed for SIP-II which is also a part of the PPR system. Information included in the PPR system is automatically reflected in the MIS portal and the information entered in the MIS system is automatically generated in the newly designed website www.sipnepal.org.

Due to the lock downs imposed in response to the CoVID-19 pandemic, learning event on innovations and experiences in the development of small-scale irrigation could not be organized this year for LGs.

LGs strengthen their legislative and executive capacity for implementing small irrigation schemes

All LG Councils selected irrigation schemes for implementation through a demand driven process as per the Local Government Operations Act, 2074.

All 48 working LGs have appointed a focal person for SIP planning, designing, construction supervision and post construction support. For every project, both running and final bills were prepared and approved by the LGs within three weeks of the start of the measurement.

Among the 153 carried over schemes, 104 schemes received timely payments which is within 30 days of bills being recommended for payment by LG support units. Similarly, among new schemes 68 schemes whose running and/or final bills were submitted, received timely payments. There were delay in payments in 49 schemes, mostly due to the delay in program and budget entry in the LMBIS system as well as the lockdown imposed in response to CoVID-19 pandemic.

LGs build their capacity to provide support to the farmers in irrigated agriculture development

The program mandates that at least 80% of the Economic Development Committees (EDCs) or where formed Agriculture Development Committees (ADCs) in SIP implemented LGs meet at-least twice every year and further recommend the selection of irrigation schemes for funding in annual budget to the LG councils. Similarly, it also mandates that EDCs/ADCs include and assign priority for the agriculture extension and input support for the selected SIP irrigation schemes.

Meetings of EDC/ADCs were recorded in nine LGs where SIP related activities were discussed among other things. However, it is noted that while meetings of EDCs/ADCs have

taken place, these haven't been systematically recorded. As this was the first year of program implementation, program teams initiated to align the overall planning process to agricultural planning specific to SIP. Project will ensure that SIP related activities will be discussed during the meeting of EDC/ADCs and will also be documented from next FY.

LGs provided agriculture extension support as well as facilitated the provision of agriculture inputs for 34% SIP projects during this FY under which farmers were provided seeds, soil testing facilities as well as various technical information.

Major contractual complaints related to irrigation schemes which would need mediation and resolution at the LG level were not reported at the LGs. Minor changes and revisions in design and construction, disagreements in selection of WUA committee members during WUA formation was shared and was addressed in satisfactory manner.

Small farmers organize themselves inclusively in Water User Associations

Small farmers have organized themselves inclusively in 185 WUA committees with representation from head, middle and tail of irrigation system. Similarly, 97% of the WUAs have at least 40% or more women in its executive committee. Among the 185 WUAs registered, only five schemes have less than 40% women, while all schemes have at least 33% women in its executive committee. All schemes also have at least 1 woman or a representative of a discriminated group in a leadership position in the WUA.

The implementation of each project was accompanied by measures to promote transparency and accountability. After project preparation, public hearing with 185 WUAs were conducted to disseminate information on total cost, design and estimates, envisaged equitable cost sharing by the beneficiaries and the social principle of the project for discussion and endorsement.

During construction, at least two public reviews are to be conducted to inform the beneficiaries about both physical and financial progress in the schemes. However, as the actual construction duration is short, only 56% of the total completed schemes conducted one public review while 61% conducted the second public review. Finally, upon completion of the construction works, public audit together with the testing of the system was conducted by the WUAs in 97% of the completed schemes. The remaining WUAs will conduct public audit during the next FY.

An analysis on the questions raised by participants during public hearing and audits showed that a total of 80 questions out of 103 were raised by discriminated groups. Among this, 48% were raised by women and 30% by discriminated men. All the questions raised by discriminated groups were addressed. Women mostly asked about labour and equal wages, women's engagement in the project and construction/implementation modality A sample of 46 schemes were analysed for this purpose.

Water User Associations (WUAs) build and/or rehabilitate Small Irrigation Systems equitably

WUAs built and/or rehabilitated a total of 185 schemes during FY 2020-21. While construction works were completed in all 153 carried over schemes from FY 2019-20, only 32 were completed out of the total target of 184 new schemes. This was mainly due to the delay in program entry in the LMBIS at both federal and provincial level which led to agreements in 181 new schemes only starting in March. As mentioned earlier, two schemes in Arun RM (due to budget deficiency in LGs) and one in Champadevi RM (due to technical unfeasibility) were

dropped before the agreement process, resulting in 181 schemes taken up for implementation during FY 2020-21.

	Table 2: Projects Implemented in FY 2020-21							
		Red Book		New Schemes				Carried
Working Area	Total	Carried over from FY 2019-20	New Schemes 2020-21	Tablet Survey	PPR	Agreement	Completed	
Bhojpur	17	7	10	17	17	10	8	9
Dhankuta	32	13	19	32	32	19	13	19
llam	43	16	27	43	43	27	16	27
Khotang	84	44	40	84	84	40	47	37
Okhaldhunga	57	28	29	57	57	29	48	9
Panchthar	18	4	14	18	18	14	4	14
Terathum	13	5	8	13	13	8	5	8
Udayapur	70	36	34	70	70	34	44	26
Total	334	153	181	334	334	181	185	149

In preparation for the next fiscal year, i.e., FY 2021-22, detailed survey in 609 schemes have been completed. A tablet-based application was used to conduct the verification using water availability and command area duplication/overlap as the primary criteria.

249,375 person days of employment was generated through the construction of irrigation schemes, out of which 63% of the employment generated went to disadvantaged groups. Although preference for employment during construction works was given to women, only 28% of the total employment went to women.

With the objective of building the technical capacity and to encourage women to participate during construction, mandatory masonry training for women has been organized as part of the quality control and construction management training. However, field reflections continue to show that women encounter structural and institutional obstacles to their full participation, more so in the case of rural women who have triple roles as farmers, caretakers and earners. While the project team continues to direct initiatives and resources towards capacity development of women through trainings, it is equally important to facilitate women's practical gender needs and address the broader constraints on women's meaningful participation, which remains outside the control of the project.

All WUAs/farmers have contributed equitably to construction works for approximate value of NPR 43,859,733 (CHF 381,389) contributing at least 10% of the project construction cost in 181 schemes. In four of the schemes which were carried over from FY 2018-19, WUAs have contributed to 7% of the total construction costs which is equivalent to NPR 778,066 (CHF 6,766).

WUAs operate and maintain irrigation systems equitably

Training on operations & maintenance (O&M) could not be organized during this fiscal year due to restrictions on mobility and most importantly on mass gathering due to CoVID-19 pandemic. Similarly, WUAs were unable to prepare plans and cost estimate for recurrent system maintenance as well as plans for equitable and timely water distribution as training on the same could not be organized. The training manual of O&M is also currently being revised and the trainings will be organized in all the completed schemes during the next FY.

Farmers access agriculture extension services from LGs

As the training manual on integrated crop and water management, including the operation of the distribution system, on farm storage facilities and pressurized water distribution (sprinklers, drip irrigation) was in the draft stage, it could not be completed during this fiscal year. Similar to the O&M training, this will be conducted during FY 2021-22.

As this was the first year of implementation, only 10% of SIP supported schemes (34 out of the 334 schemes taken up for implementation) received a visit from a LG JTAs at-least once during the construction cycle. A format to identify potential and needs of irrigation scheme has been developed and was used by JT/JTAs while visiting the WUAs.

A more systematic approach will be adopted from next FY for the mobilization of the JT/JTAs. With the support from an agriculture expert, an agriculture planning & implementation process guideline will be developed to support the LG JT/JTAs to plan & execute the agriculture activities in completed irrigation schemes. This would also include an agriculture technician mobilization plan to guide the JT/JTAs during their visits to the completed irrigation schemes in critical periods of crop cultivation. As the human resources at the LGs are inadequate, the project will also identify local agriculture resource persons in the LGs who can support JT/JTAs when required.

53% farmers in SIP schemes have contact numbers of LG ward chairs and JT/JTAs while 41% have the contact numbers of nearby agro-vet providers. These numbers are recorded in the project book that each WUAs are provided for documentation and while most farmers do have the contact details of LG ward chairs, it is yet to be systematically recorded in the project book. As this particular indicator has been recorded only from FY 2020-21, data from 32 new schemes completed in FY 2020-21 has been reported.

Water User Associations plan the production in their FMIS based on commercial opportunities

For the first year, WUAs with market development potential were to be identified for them to plan their irrigated commercial crops based on reliable information on market demand. Further, JT/JTAs and private service providers would provide production advice based on market demand to these schemes with MDPs. Criteria to identify schemes with MDP was jointly established with NAMDP, however application of the same to select schemes could not be completed. The market related information required to select schemes were not collected during the detailed survey as the joint activities to be implemented by NAMDP and SIP was only developed in October 2020. Although the criteria itself was developed in October, market orientation to program team further delayed the information collection process to apply the criteria.

For farmers to have the contact numbers of traders and buyers, whole-sellers, retailers of agriculture products and agri-insurers such potential market actors with capacity and willingness to expand their businesses in SIP areas were mapped along three market corridors, i.e., Mechi, Koshi and Sagarmatha. This information will be gradually shared with farmers in the coming fiscal years.

Input service providers provide maintenance, production advice or embedded services to FMIS;

The 48 working LGs for SIP lie along three market corridors, Mechi, Koshi and Sagarmatha. In collaboration with NAMDP, actors such as wholesalers, traders, collectors, input service providers are identified along these corridors.

Traders and retailers establish contacts with WUA members

A multi-stakeholder meeting was organized on 2nd March in Phidim Municipality, Panchthar with the objective to introduce different levels of actors working in the vegetable sector, establish common understanding among actors on constraints to sector growth and to agree upon a collective action plan to address those constraints. Wholesaler from Birtamode wholesale market, collectors/traders from Ganesh Chowk, Bhaluchap, Phidim, Athrai, Ranke, Biblyate and Nepaltar, Water User Association members, Mayor of Phidim Municipality, members of Dorumba Cooperatives and representatives from the Agriculture Knowledge Centre participated in this event. This is in line with the target of 80% WUAs report ongoing discussions with traders and buyers.

Wholesalers shared the constraints on supply management with limited access to producers, low quality, small and irregular supply, no registered/formal collectors, lack of common understanding about price among different stakeholders being some of the major constraints. For collectors' small volume of production and consequently seasonal nature of collection/aggregation business, quality of produce, lack of common understanding about price among different stakeholders, unregistered/informal business because of seasonal nature of business were some of the constraints for supply management. WUA members identified limited access to market, lower/unequal price of produce, insufficient technical services as constraints on the production side.

Similar meetings are being planned in LGs along the Koshi and Sagarmatha corridor in the next FY. Further, these meetings are also expected to be an opportunity for traders and farmers to conduct business to business meetings (B2B).

In-house discussions on the design of a simple and accurate price information system were conducted and work on the system will begin in the next FY.

6. Finance and Management

6.1 Budget and Expenditures

Total budget allocated for FY 2020-21 was NPR 1,047,552,309 (CHF 9,109,151) excluding farmers contribution, out of which NPR 542,544,571 (CHF 4,717,779) [52%] was spent. As the civil works budget is channelled to LGs as conditional grant, it was reflected only in the LMBIS and not in the Federal Redbook. Only a portion of the total budget was reflected in the Redbook, i.e., cost for technical assistance, WUA training and skill development of implementing agencies and recurrent cost of DoLI amounting to NPR 149,700,000 (CHF 1,301,739).

Out of NPR 897,852,309 (excluding WUA's 10% contribution) allocated to civil works, only 49% amounting to NPR 441,275,381 (CHF 3,707,266) was spent. The reason for less expenditure is due to the delay in program entry in the Line Ministry Budget Information System (LMBIS) at both federal and provincial level as well restrictions imposed by CoVID-19 pandemic. As the budget Farmers have contributed work for approximate value of NPR 44,127,538 (CHF 383,718) meaning on an average, WUAs have raised 10% of the total construction cost.

A total of NPR 32,700,000 (CHF 284,348) was allocated for WUA trainings as well as institutional strengthening and skill development of implementing agencies. Only 6% of the total budget amounting to NPR 1,926,620 (CHF 15,207) was expensed on quality control and construction management as well as institutional development training for WUA members. As institutional strengthening and capacity development component of the program for the PG, LGs as well as DoLI could not be initiated, there were no expenditure in this sub-heading.

Similarly, NPR 97,048,000 (CHF 775,882) was spent on technical assistance out of the allocated NPR 110,000,000 (CHF 956,522). A detailed program budget and expenditure is presented in Annex X.

Due to delay in budget entry in the budgetary system, SDC budget has been used to cover FG's budgetary contribution. Efforts will be made to adjust such expenses in the coming years.

6.2 Fund Flow Analysis

Out of CHF 9,109,151 expensed during the FY20-21, geographic allocations are based on the budget provisions at national and district/provincial level which are 0.78% and 99.22% respectively.

From discrimination perspective, discriminated groups benefited from employment opportunities under the consultant services, WUA training and especially from employment generated by the civil works for irrigation rehabilitation and/or construction. Although

preference for employment during construction work was given to women, only 28% of the total employment went to women.

35% of the overall programme fund was spent on discriminated groups and 65.42% on nondiscriminated groups. Likewise, regarding fund beneficiaries 82.42% was expensed for attributable fund and 17.03% for general and common costs. A detailed fund flow analysis is presented in Annex XI.

6.3 Project Management and Implementation

The first meeting of the Project Coordination Committee (PCC) was held on April, 2021. The meeting approved the annual progress report for 2020-21 (till March) as well as the yearly plan of operations for FY 2020-21 and FY 2021-22. The PCC endorsed the expansion of SIP into 12 new Palikas given that commitment letters are received from them. Further it also endorsed the formulation of one window system for small irrigation schemes all over province 1 (See Annex XII).

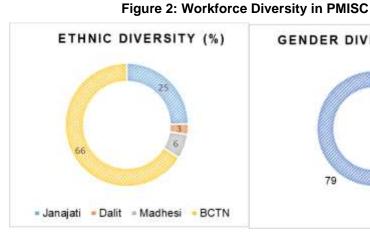
SIP-II's project document provisions for a committee at the local level. Project Implementation Committee (PIC). The task of PIC will be to review overall progress of SIP II at respective LG levels, approve the Annual Plan and Budget of the respective LGs, review issues and constraints in the implementation of the Programme and suggest for the corrective measures. 42 working LGs have formed the PICs till July 2021 and the remaining will form it during the next fiscal year.

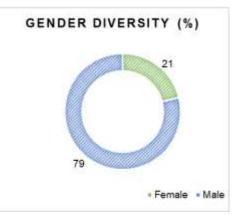
As per the mandate provided in the Project Document, SIP-II could be implemented in up to 60 LGs in the mid hill region of province-1 including the present 48 working LGs. Consultative meetings were held with additional 12 LGs: Maijogmai RM and Mai Municipality in Ilam: Tumbewa RM in Panchthar; Chaathar RM, Menchhayaam RM, Phedap RM and Aathrai RM in Terhathum; Ramprasad Rai RM, Hatuwagadi RM, Aamchowk RM and Shadananda Municipality in Bhojpur; Sahidbhumi RM in Dhankuta. Programme LGs will be selected as per the selection criteria (See Annex XIII) according to the project document. Commitment letter for the implementation of SIP along with potential schemes for next fiscal year was received from 9 LGs and budget has been reflected in the LMBIS.

Program Management and Implementation Support Consultant (PMISC) continued to provide technical assistance and support to the Project Coordination Unit (PCU) at MoPID, PG1 and

PMISC focal persons stationed in all 48 LGs where SIP is currently implemented to support them in project management and implementation.

During FY 2020-21, a total of 109 staff (both regular short-term) and





were working with the project at different times. Among them, 52 were regular staff, 17 in PMISC, Biratnagar and 35 in cluster offices. Further, 57 additional short-term staff were recruited throughout the year as to support verification survey. PPR preparation process as well as construction supervision works. A total of 4 staff resigned during this FY.

Among the total staff, only 23% were female. Despite conducive environment like the provision of child care allowance for female staff, the program still faces challenges to hire more female staff especially at the cluster level. The main reasons for unbalanced gender diversity as shown in Figure 6 remains remote geographical locations and limited female technical person in the sector.

7. Lessons Learnt

The experience of working with 48 LGs has been encouraging for SIP. Not only have LGs taken ownership of the project but have also been actively involved in direct supervision and monitoring of the projects. Further, LGs have committed and contributed 20% of total civil works cost. The experience has been similar at the province level with MoPID taking a leading role in the formulation of the small irrigation guideline.

It is evident that support to LGs for planning, implementation and post construction support should continue as human resource remains inadequate at the local level. However, there is also a need to focus on building the capacity of existing human resource at the LGs through in-service training as well as transfer of knowledge on innovative technologies such as the internet-based project preparation tools with GPS based tablet surveys currently used by the program.

The project document of SIP envisions that the agriculture extension and support will be provided by the agriculture extension staff under the Economic Development Section of the LGs. The agriculture support will cover agriculture extension activities aimed at improving irrigated agriculture practices and techniques and also the introduction of commercial crops. LG's agriculture extension and support are expected to continue for at least 2 years after the completion of the construction works. However, it is evident that a higher level of engagement with LGs is required to link irrigation with agriculture services & institutions and market to achieve the agriculture based economic growth envisioned by the program.

Unlike in SIP-I where the practice was to select, design and implement schemes all within the same year impacting the overall project cycle, detailed survey was completed in 609 schemes in preparation for the next fiscal year, i.e., FY 2021-22. PPRs for the same were also partially completed and it is expected that WUAs will be able to go into the agreement with the LGs by the end of November, 2021. This was possible largely due to the timely mobilization of an additional survey and design engineers.

While the overall planning is gradually streamlining along the LG's planning time frame, there is a need to synchronize the overall planning and agriculture planning at local level. An expert will be consulted for the preparation of an implementation process guideline in the next FY to synchronize the overall planning and agriculture planning at local level as well as to guide the implementation process so as to achieve the agriculture related targets.

One of the lessons learnt from SIP-I has been that most of the small schemes have limited or unreliable water supply in the irrigation source during the post monsoon cropping season. With the effects of climate change, the flows in these local streams with small catchments from which most of the local irrigation schemes draw water, will become even more irregular. Simple run-of-the-river irrigation schemes will no longer be able to provide reliable water supply during the dry season and not even when there is a long break in the monsoon. Therefore, irrigation schemes that draw water from small local streams, with very low or no base flow should include on farm water storage in the form of small water storage ponds that could be filled when there is water in the source and used when the discharge in the source temporarily declines. Further, to also reach the small landholders as well as to build more geographically feasible technology and design type it is imperative that the project adopts other irrigation technologies.

Starting this FY, participation of women in the quality control training and construction management trainings have been made mandatory. While the results have been encouraging (See Annex XIII for case study) with the trainings being linked to increased income generation as well as employment opportunities, much needs to be done to address the challenges women face for meaningful participation in the overall project implementation. Capacity

building activities such as training on leadership, public speaking, financial literacy should be linked with similar initiatives within the LGs and other SDC initiatives, if any. On the project's side, a questionnaire was developed to assess the knowledge of project team and current practices within SIP on beneficiary targeting. After the identification of the gaps on knowledge and practices, a re-orientation on beneficiary targeting has been planned for the next FY.

ANNEXES

Annex I: Abbreviations

ADCs : Agriculture Development Committee

AKC : Agriculture Knowledge Center

CoVID : Corona Virus Disease
DAG : Disadvantaged Group

DOLI : Department of Local Infrastructure

DoWRI : Department of Water Resources and Irrigation

EDC : Economic Development Committee

FG : Federal Government

FMIS : Farmer Managed Irrigation Systems

FY: Fiscal Year

GoN : Government of Nepal

ha : Hectare

LG : Local Governments

LMBIS : Line Ministry Budget Information System

MIS : Management Information System

MoF : Ministry of Finance

MoFAGA : Ministry of Federal Affairs and General Administration

MoU : Memorandum of Understanding

NAMDP : Nepal Agriculture Market Development Programme

NPR : Nepalese Rupee(s)

O&M : Operation and Maintenance

PCC : Programme Coordination Committee

PIC : Programme Implementation Committee

PCU : Programme Coordination Unit

PG : Province Governments

PLMBIS : Province Line Ministry Budget Information System

PPR : Project Preparation Report

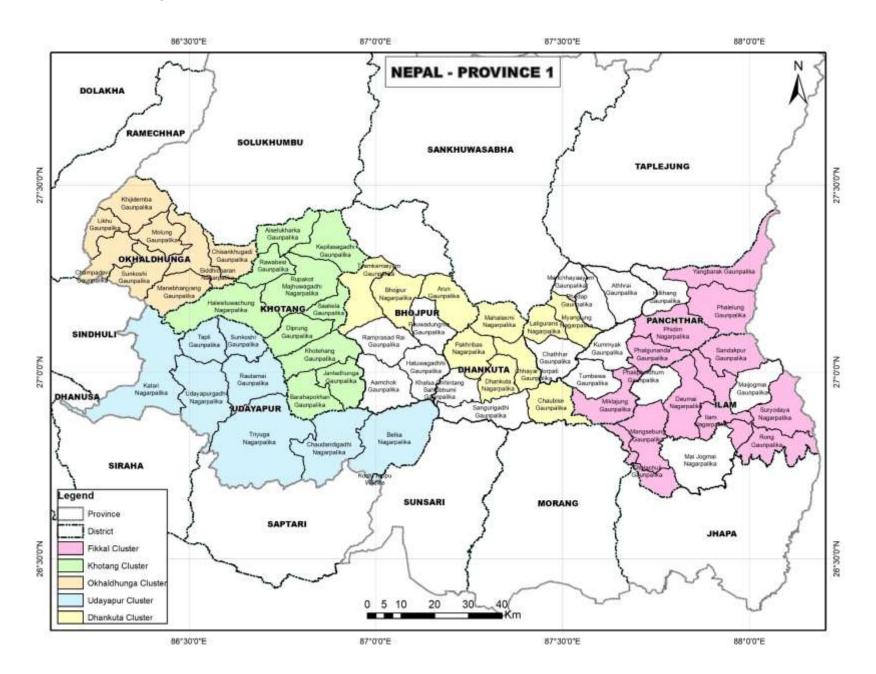
PMISC : Programme Management and Implementation Support Consultants

PSC : Public Service Commissions SCS : Swiss Cooperation Strategy

SDC : Swiss Agency for Development and Cooperation

STM : Short Term Monitoring
WUA : Water Users' Association

Annex II: SIP Working Areas



Annex III: Outcome Monitoring Summary

Outco	me 1: Local Governments (LGs)	respond effectively to the needs of s	mall farmers for irrigated agricultu	ire	
S.N.	Phase Target (July 2020– December 2024)	Expected Outputs FY 2020-21	Achievement FY 2020-21	Status/Remarks	
1.1	100% LGs have established a one window system for identification/ budgeting/implementation/ monitoring/support of irrigation schemes	A guideline on one window system for identification, budgeting, implementation, monitoring and support of small irrigation to be established by LGs will be formulated by PG1.	MoPID initiated the formation of a task committee to draft a guideline on one window system for identification, budgeting, implementation, monitoring and support of small irrigation.	Status: Not achieved	
1.2	35% (20,000 hectares) increase in additional area under year-round irrigation in participating LGs (baseline 56,893 hectares)	11% (6,239 ha) increase in additional area under year-round irrigation in participating LGs.	4% (2,511 ha) increase in additional area under year-round irrigation in participating LGs	Status: Partially achieved Due to delay in budget allocation at Federal level, implementation of new schemes was delayed resulting in only 32 schemes completed.	
1.3	100% schemes have received at least one visit of a rural advisory services provider during the production cycle (Baseline# 15%)	100% schemes receive at least one visit of a rural advisory services provider during the production cycle.	25% schemes have received at least one visit of a rural advisory services provider during the production cycle.	Status: Partially achieved	
Outco	Outcome 2: Small farmers especially from DAGs increase agricultural productivity				
2.1	65'000 HHs benefited from year- round and increased irrigation water	20,000 HHs benefit from year-round and increased irrigation water.	8,322 HHs benefitted from year- round and increased irrigation water	Status: Partially achieved	
2.1.1	40% beneficiaries are from DAGs	40% (8,000) beneficiaries are from DAGs.	41% (3,375) beneficiaries are from DAGs	Status: Achieved	

2.1.2	70% of the program beneficiaries have a (In SIP command area) landholding of less than 0.5 ha.	70% (14,000) of the program beneficiaries have a (In SIP command area) landholding of less than 0.5 ha.	65 % (5,369) of the program beneficiaries have a landholding of less than 0.5 ha	Status: Partially achieved
2.2	30% increase in the yields of major irrigated food crops (Rice, Wheat and Maize) in SIP command area	Yields of major irrigated food crops (rice, wheat and maize) in schemes completed during Phase I will increase by 30%.	Yields of major irrigated crop increased by the following: Monsoon paddy by 71% (Baseline 2.50 t/h; Achieved: 4.29 t/h), Wheat by 12% (Baseline 1.68, Achieved 1.88 t/ha) Maize by 159% (Baseline 1.44, Achieved 3.74 t/ha	Status: Achieved; Partially achieved for wheat Results are based the crop cut survey conducted in 24 schemes completed during SIP-I for monsoon paddy, 14 schemes for wheat, 15 schemes for maize and 14
2.3	30% increase in cropping intensity in SIP command area (baseline: 160% target 190%)	Cropping intensity in sample schemes completed during Phase I will increase by 30%.	Cropping intensity in schemes completed during Phase I increased by 43% (Baseline 160%; Achieved:228%)	schemes for potatoes.
2.4	Winter vegetable production and other high value crops increases by a minimum of 50% (by volume) above the current total production in SIP schemes	Winter vegetable production and other high value crops will increase by a minimum of 50% (by volume) in schemes completed during phase I	Production of winter vegetables 101.06% in schemes completed during phase I	
2.5	90% irrigation schemes built or rehabilitated under the program are functioning well after 3 years of completion (Baseline # 93%)	90% irrigation schemes built or rehabilitated under the program are functioning well after 3 years of completion.	69% irrigation schemes built or rehabilitated under SIP-I are functioning well after 3 years of completion.	Status: Partially achieved 31% of irrigation schemes have minor damages caused by landslide, flood and road construction. Overall, all sample schemes taken up for STM are functional.

2.6	At least 80% of WUAs establish a fund for Operation & Maintenance and major repairs, through the equitable collection of water service fees	At least 80% of WUAs establish a fund for O&M and major repairs, through the equitable collection of water service fees.	100% schemes completed in FY 2020-21 have established an O&M fund.	Status: Partially achieved As schemes have been recently completed, the regular collection of equitable water service fees will be reported during the sixmonthly report.	
Outco	me 3: Market actors offer innova	tive supports and products to farmer	s in irrigated schemes		
3.1	50% of WUA that have contracted at least one input provider in the last 12 months (Baseline 0%)	92 schemes with market development potential (MDP) will be identified for which criteria will be developed jointly with NAMDP.	MDPs has been jointly established with NAMDP, however schemes have not been	Potential private sector	
3.2	50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops (Baseline 0%)		selected.	their businesses in SIP areas has been mapped along three market corridors, i.e., Mechi, Koshi and Sagarmatha corridor.	
3.3	70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market (Baseline will be established as the schemes are selected)	Sample households from schemes with market development potential (MDP) will be identified for baseline study.	Concept note to conduct the baseline survey was developed.	Status: Achieved A request for proposal to conduct the baseline study has been advertised.	

Annex IV: Expected Outputs 2020-21

S.N.	Narrative Summary	Planned Outputs	Expected Outputs	Achievements
Outcor	ne 1: Local Governme	(July 2020-December 2024)	(FY 2020-21) e needs of small farmers for irrigat	ted agriculture
1.1	Provincial Government strengthens its capacity to support Local Governments	Norms, standards, strategies and policies for small irrigation are published officially		MoPID initiated the formation of a task committee to draft a guideline on one window system which will include a design manual as well as norms.
		All responsible Federal/Provincial Government Agencies arrange the program LGs by the end of August	All responsible Federal/Provincial Government agencies will arrange the budget for program LGs by the end of August	Federal government agency arranged to send the SIP budget authority to program LGs only by April 2021 as there was a substantial delay in budget allocation by federal government
		A guideline on one window approach for small irrigation within the LGs is available	A guideline on one window approach for small irrigation will be formulated by PG1.	MoPID initiated the formation of a task committee to draft a guideline on one window system for identification, budgeting, implementation, monitoring and support of small irrigation which is expected to be completed by November 2021
		An internet-based MIS and automated project preparation system is available and operational for use by the LGs	An internet-based MIS and automated project preparation system will be in operation	A new desktop-based management information system (MIS) has been developed for SIP-II which is also a part of the PPR system
		At least one learning event is organized every year for LGs included in the program on, innovations and experiences in the development of small-scale irrigation	A learning event to share the experiences of SIP-I in relation to the development of small-scale irrigation will be organized for LGs.	Due to the imposed lock downs in response to the CoVID-19 pandemic, learning event on innovations and experiences in the development of small-scale irrigation could not be organized this year for LGs.
1.2	LGs strengthen their legislative and executive capacity for	A one window approach for small irrigation within the LG is available	The guideline on one window approach for small irrigation will be shared with the LGs.	The guideline is expected to be completed by November 2021 and shared with all LGs in PG1 for adaptation and implementation
	implementing small irrigation schemes	LG Councils select irrigation schemes for implementation though a demand driven process	All LG Councils will select irrigation schemes for implementation though a demand driven process	All 48 LG Councils selected irrigation schemes for implementation through a demand driven

S.N.	Narrative Summary	Planned Outputs	Expected Outputs	Achievements
		(July 2020-December 2024)	(FY 2020-21)	
				process as per the Local Government Operations Act, 2074.
		LGs appoint a focal person ² for SIP planning, designing, construction supervision and post construction support	All 48 LGs will appoint a focal person for SIP planning, designing, construction supervision and post construction support	All 48 working LGs have appointed a focal person for SIP planning, designing, construction supervision and post construction support
		100% LGs prepare and approve the bills within three weeks of the start of the measurement	100% LGs will prepare and approve the bills within three weeks of the start of the measurement	All working LGs prepared and approved the bills within three weeks of the start of the measurement
		100% LGs ensure timely payments to WUA's (within 30 days of bills being recommended for payment by LG Support Unit	100% LGs will ensure timely payments to WUA's (within 30 days of bills being recommended for payment by LG Support Unit	104 out of 153 carried over schemes received timely payments which is within 30 days of bills being recommended for payment by LGs. Similarly, 68 new schemes whose running and/or final bills were submitted, received timely payments.
1.3	LGs build their capacity to provide support to the farmers in irrigated agriculture	80% Agriculture Development Committees (ADCs) in SIP implemented LGs meet at-least twice every year	80% ADCs or a committee for the purpose of the same in SIP implemented LGs meet at-least twice every year	19% EDC/ADCs (9 LGs) met at-least twice every year to discuss SIP related activities among other things
	development	80% Agriculture Development Committees (ADCs) in SIP implemented LGs recommend the selection of irrigation schemes for funding in annual budget to the LG councils	80% ADCs or a committee for the purpose of the same in SIP implemented LGs will recommend the selection of irrigation schemes for funding in annual budget to the LG councils	This data could not be tabulated this year as the minutes of the meetings haven't been systematically documented
		80% ADCs include and assign priority for the agriculture extension and input support for the selected SIP irrigation schemes	80% ADCs or a committee for the purpose of the same will include and assign priority for the agriculture extension and input support for the selected SIP irrigation schemes	

² The focal person approves the detail design and cost estimates of the irrigations scheme.

S.N.	Narrative Summary	Planned Outputs (July 2020-December 2024)	Expected Outputs (FY 2020-21)	Achievements
		LGs provide agriculture extension support and facilitate the provision of agriculture inputs for 80% SIP projects	LGs provide agriculture extension support and facilitate the provision of agriculture inputs for 20% SIP projects	LGs provided agriculture extension support as well as facilitated the provision of agriculture inputs in 34% of the SIP projects during this FY
		80% of the LG address contractual complaints related to irrigation schemes in a satisfactory manner	80% of the LGs will address contractual complaints related to irrigation schemes in a satisfactory manner	Major contractual complaints related to irrigation schemes which would need mediation and resolution at the LG level were not reported at the LGs. Minor changes and revisions in design and construction, disagreement in member selection during WUA formation was shared and was addressed in a satisfactory manner
Outcor	me 2: Small farmers esp	ecially from DAGs increase agricult	ural productivity	
2.1	Small farmers organize themselves inclusively in Water	100% WUA committees have representation from head, middle and tail of irrigation system	100% WUA committees will have representation from head, middle and tail of irrigation system	100% WUA committees have representation from head, middle and tail of irrigation system
	User Associations	40% WUA committee members are women, with at least 1 woman or a representative of a discriminated group in a leadership position.	40% WUA committee members are women, with at least 1 woman or a representative of a discriminated group in a leadership position.	97% of the WUA committees have at least 40% women with at least 1 woman or a representative of a discriminated group in a leadership position.
		100% WUAs practice public hearing, review and auditing & place hoarding board at scheme sites	100% WUAs will practice public hearing, review and auditing & place hoarding board at scheme sites	100% WUAs have practiced public hearing, while 61% and 70% have practiced public review and public audit respectively
				All schemes have placed hoarding boards before construction started
2.2	Water User Associations (WUAs) build and/or	Approximately 1300 irrigation schemes are constructed or rehabilitated	A total of 337 irrigation schemes will be constructed or rehabilitated	A total of 185 schemes were completed
	rehabilitate Small Irrigation Systems equitably	1'000'000 person —days of employment through the construction of irrigation schemes	400,000 person-days of employment will be generated through the construction of irrigation schemes	249,375 person days of employment was generated the construction of irrigation schemes

S.N.	Narrative Summary	Planned Outputs (July 2020-December 2024)	Expected Outputs (FY 2020-21)	Achievements
		All WUAs/farmers equitably contribute at least 10% of the project construction cost	All WUAs/farmers will equitably contribute at least 10% of the project construction cost	All WUAs/farmers have equitably contributed to at least 10% which amounts to approximate value of NPR 44,127,538 (CHF 383,718) of the project construction cost
2.3	WUA operate and maintain irrigation systems equitably	100% WUA have received training for Operations & Maintenance (O&M)	100% WUA will receive training for Operations & Maintenance (O&M)	Due to restrictions on mobility and mass gathering due to CoVID-19 pandemic, training on O&M could not be organized during this FY
		All WUAs prepare plans and cost estimate for recurrent system maintenance	All WUAs will prepare plans and cost estimate for recurrent system maintenance	WUAs were unable to prepare plans and cost estimate for recurrent system maintenance as well as plans for equitable and timely water
		80% WUAs prepare and implement plans for equitable and timely water distribution.	80% WUAs will prepare and implement plans for equitable and timely water distribution.	distribution as training on the same could not be organized.
2.4	Farmers access agriculture extension services from LGs	80% schemes receive training on integrated crop and water management, including the operation of the distribution system, on farm storage facilities and pressurized water distribution (sprinklers, drip irrigation)	As part of the O&M training, 80% schemes will receive training on integrated crop and water management, including the operation of the distribution system, on farm storage facilities and pressurized water distribution.	The training manual on integrated crop and water management is being prepared and the training on the same will be conducted during FY 2021-22
		100 % of SIP supported schemes receive a visit from a LG JTAs atleast once before the construction begins.	100 % of SIP supported schemes will receive a visit from a LG JTAs atleast once before the construction begins.	10% of SIP supported schemes (34 out of the 334 schemes taken up for implementation) received a visit from a LG JTAs at-least once during the construction cycle
		80% farmers in SIP schemes have contact numbers of LG ward chairs, JT/JTAs, nearby agro-vet providers	80% farmers in SIP schemes will have contact numbers of LG ward chairs, JT/JTAs, nearby agro-vet providers	53% farmers in SIP schemes have contact numbers of LG ward chairs and JT/JTAs while 41% have the contact numbers of nearby agrovet providers.
2.5	Water User Associations plan the production in their FMIS based on	50% Farmers in FMIS supported by the project plan their irrigated commercial crops based on reliable information on market demand	WUAs with market development potential (MDP) will be identified together with NAMDP in the first fiscal year.	Criteria to identify schemes with MDP was jointly established with NAMDP, however

S.N.	Narrative Summary	Planned Outputs	Expected Outputs	Achievements
	-	(July 2020-December 2024)	(FY 2020-21)	
	commercial opportunities	50% JT/JTAs and private service providers provide production advice based on market demand.	WUAs with market development potential (MDP) will be identified together with NAMDP where JT/JTAs and private service providers will provide production advice based on market demand.	application of the same to select schemes could not be completed
		80% farmers have contact numbers of traders and buyers, whole-sellers and retailers of agriculture products, agri-insurers	80% farmers will have contact numbers of traders and buyers, whole-sellers and retailers of agriculture products, agri-insurers.	One multi-stakeholders meeting, business to business meetings were conducted in Mechi corridor to connect the market with the farmers as well as to establish common understanding among actors regarding constraints and mechanisms to overcome it
	Outcome 3: Market ac	tors offer innovative supports and p	roducts to farmers in irrigated sche	mes
3.1	Input service providers provide maintenance, production advice or embedded services to FMIS	Input service providers provide maintenance, production advice or embedded services to FMIS	Identification and mapping of input service providers to provide maintenance, production advice or embedded services to FMIS in each of the working Palikas	Potential drivers and market actors have been identified along three market corridors, i.e., Mechi, Koshi and Sagarmatha with further effort ongoing to identify each in working LGs
3.2	Traders and retailers establish contacts with WUA members	80% of WUA reporting ongoing discussions with traders and buyers	Identification and mapping of traders and buyers in each of the working Palikas.	
		Simple and accurate price information system is developed and operational	Identification of potential stakeholders, partners for the development and anchorage of a simple and accurate price information system	In-house discussions on the design of a simple and accurate price information system were conducted and work on the system will begin in the next FY
		Famers consult price information system before bringing produce to the market	This target will be measured once the price information system is developed and operation	

Annex V: Memorandum of Understanding between MoPID, PG1 and PMISC

भैभौतिक पूर्वाधार विकास मन्त्रालय (MoPID), प्रदेश नं. १

कार्यक्रम व्यवस्थापन तथा कार्यान्वयन सहयोग परामर्शदाता (PMISC)

वीच

साना सिँचाइ कार्यक्रम - दोस्रो चरण

कार्यान्वयनका लागि भएको

समभवारी-पत्र

१७ आषाढ, २०७७ देखि १६ पुष, २०८१ सम्म तदनुसार ०१ जुलाई, २०२० देखि ३१ डिसेम्बर, २०२४ सम्म



प्रस्तावना

नेपाल सरकार र स्वीट्जरल्याण्ड सरकारबीच प्रदेश नं. १ का मध्यपहाडी क्षेत्रका गाउँ तथा नगरपालिकाहरुमा साना सिँचाइ कार्यक्रम (Small Irrigation Program) संचालन गर्नका लागि मिति २६ जुन, २०२० तदनुसार १२ असार, २०७७ मा द्विपक्षीय सम्भौता भई कार्यान्वयन शुरु भएकोछ । हाल देश संघीय राज्य प्रणालीमा रुपान्तरण भएको र स्थानीय सरकारहरुसमेत गठन भैसकेको परिस्थितिमा कार्यक्रमलाई सहज ढंगले कार्यान्वयन गर्नका लागि स्वीकृत कार्यक्रम दस्तावेजमा उल्लेख भएका बूँदाहरुका आधारमा भौतिक पूर्वाधार विकास मन्त्रालय, प्रदेश नं. १ (Ministry of Physical Infrastructure Development, MoPID-1) र कार्यक्रम व्यवस्थापन तथा कार्यान्वयन सहयोग परामर्शदाता (Program Management and Implementation Support Consultants, PMISC) बीच नेपाल सरकार तथा स्वीस सरकारबीच भएको द्विपक्षीय सम्भौताको बुंदा नं. १९.१ मा भएको व्यवस्थाया अनुसार कार्यक्रम कार्यान्वयन गर्न यो समभवारी-पत्रमा हस्ताक्षर गरेकाछौं । समभवारी गरिएका बूँदाहरु देहायअनुसार रहेकाछन् :

समभादारी-पत्रको अवधि

यस समभ्तदारी-पत्रको अवधि १७ आषाढ, २०७७ देखि १६ पुष, २०६१ (तदनुसार ०१ जुलाई, २०२० देखि ३१ डिसेम्बर, २०२४) सम्म रहनेछ । साथै, कार्यक्रमको अवधि थप हुन गएमा सो थप अवधिका लागि समेत मान्य हुनेछ ।

कार्यक्रमको क्षेत्र

परियोजना दस्तावेज (Program Document) को बुँदा नं. ६.१ मा भएको व्यवस्था अनुसार यस कार्यक्रमको लक्षित क्षेत्र पहिलो वर्षमा प्रदेश नं. १ का करीब ४८ वटा मध्यपहाडी क्षेत्रका गाउँ तथा नगरपालिकाहरु रहनेछन् भने कार्यक्रम अवधिभरमा क्रमशः विस्तार गर्दै ६० वटासम्म हुनसक्नेछन्।

कार्यक्रमको लक्ष्य

यस कार्यक्रमको मुख्य लक्ष्य साना किसान, विशेष गरी विपन्न कृषकहरुको कृषि आयमा वृद्धि गरी गरिबी घटाउने रहेको छ । यो लक्ष्यप्राप्तिका ३ प्रतिफलहरु देहाय बमोजिम रहेका छन :

(क) स्थानीय सरकारहरुले साना किसानहरुको सिचित कृषिसम्बन्धी आवश्यकताहरुलाई
 प्रभावकारी रुपले सम्बोधन गर्नेछन् ।

(ख) साना किसान, विशेषगरी विपन्न समूहहरुले कृषि उत्पादकत्वमा वृद्धि गर्नेछन् ।



 (ग) व्यवसायीहरुले सिंचित क्षेत्रका किसानहरुलाई बजारसम्बन्धी नवीनतम प्रकारका सहयोग तथा उत्पादनहरु प्रदान गर्नेछन् ।

कार्यक्रमले प्रदेश नं. १ सरकारको आवधिक योजनाको सिँचाइसँग सम्बन्धित लक्ष्य हासिल गर्न समेत मद्दत पुऱ्याउनेछ ।

कार्यक्रम दस्तावेज

कार्यक्रमको लक्ष्य, प्रतिफल, परिणाम, गतिविधिहरु तथा बजेट दायित्वको विस्तृत विवरण कार्यक्रम दस्तावेज (Program Document) मा उल्लेख गरिएकोछ । यो समभ्रदारी-पत्र कार्यक्रम दस्तावेजकै प्रष्टोक्तिको रुपमा रहनेछ ।

लागत सहभागिता

यस कार्यक्रममा कुल निर्माण लागतको २० प्रतिशत अंश संघीय सरकारबाट, ३० प्रतिशत स्वीस सरकारबाट, २० प्रतिशत प्रदेश सरकारबाट, २० प्रतिशत स्वानीय सरकार (गाउँपालिका/नगरपालिका) बाट र १० प्रतिशत अंश जलउपभोक्ता संस्था (ज.उ.स.) बाट बेहोरिनेछ । परियोजना अवधिभरको लागि सार्वजनिक निर्माणको कूल अनुमानित लागत तथा सम्बन्धित निकायको सहभागिता देहायको तालिकामा भएअनुसार हुनेछ ।

	संघीय सरकार (२०%)	प्रदेश सरकार (२०%)	स्थानीय सरकार (२०%)	स्वीस सरकार (३०%)	ज.उ.स. (१०%)	जम्मा
सावंजनिक निर्माण	9,00,00,00,000	9,00,01,00,000	9,00,00,000	9,29,99,00,000	xo,₹3,00,000	x,03,40,00,000

कार्यान्वयनमा संलग्न निकायहरुको दायित्व र भूमिका

कार्यक्रम दस्तावेज (Programme Document) को बुँदा नं. ५ अनुसार यस कार्यक्रमको कार्यान्वयनमा संलग्न निकायहरुको दायित्व र भूमिका देहाय अनुसार हुनेछ :

१. भौतिक पूर्वाधार विकास मन्त्रालय, प्रदेश नं. १

- क. कार्यक्रमको नेतृत्व प्रदान गरी प्रदेश सरकारको सशर्त अनुदानको समग्र व्यवस्थापन गर्नेछ ।
- ख. कार्यक्रमको समग्र योजना बजेटिङ्ग तथा स्थानीय सरकारहरुको सशर्त अनुदानको अनुगमन, सुपरीवेक्षण र मार्गनिर्देशन गर्नेछ ।
- ग. मन्त्रालय र कार्यक्रम व्यवस्थापन तथा कार्यान्वयन सहयोग परामर्शदाताबीच समभ्रदारीपत्रमा हस्ताक्षर गर्नेछ ।
- घ. कार्यक्रम संचालनको लागि पर्याप्त जनशक्तिको सुनिश्चितता गर्नेछ ।
- ड सदस्य सचिवको रूपमा कार्यक्रम समन्त्रम् समितिको संयोजन र तयारी गर्नेछ ।

- २. कार्यक्रम समन्वय इकाइ (Programme Coordination Unit, PCU) : कार्यक्रम दस्तावेजमा उल्लेख भएअनुसार मन्त्रालय एवं कार्यक्रम समन्वय ईकाइबाट देहायका विषयहरुमा समेत सुनिश्चितता हुनेछ :
- क. प्रदेशले स्थानीय सरकारलाई प्रदान गर्ने सशर्त अनुदानको नीतिगत मार्गनिर्देशन प्रदान गर्न, वार्षिक कार्यक्रम प्रतिवेदन र वार्षिक प्रगति प्रतिवेदन तयार तथा स्वीकृत गर्न एक प्रदेशस्तरीय कार्यक्रम समन्वय समिति रहनेछ । यो समितिको अध्यक्षता माननीय भौतिक पूर्वाधार विकास मन्त्रीज्यूबाट हुनेछ भने सदस्य सचिवको भूमिका मन्त्रालयको ऊर्जा, जलस्रोत तथा सिंचाइ विकास महाशाखाका प्रमुखबाट निवांह हुनेछ ।
- ख. मन्त्रालयले प्रदेशस्तरमा एउटा कार्यक्रम समन्वय इकाइ गठन गर्नेछ जसमा उर्जा, जलस्रोत तथा सिंचाइ विकास महाशाखा प्रमुख, कार्यक्रम संयोजक (Project Coordinator) को रुपमा रहने छन्।
- भौतिक पूर्वाधार विकास मन्त्रालय, प्रदेश नं. १ ले साना सिंचाइ कार्यक्रम कार्यान्वयन गर्नका लागि समन्वयकारी भूमिका निर्वाह गर्नेछ ।
- अन्य : कार्यक्रम दस्तावेजमा उल्लेख भएका थप कार्यहरु देहायअनुसार रहेका छन् :
- क. साना सिँचाइ कार्यक्रमका लागि विनियोजन गरिएको रकम प्रादेशिक मन्त्रालयगत बजेट सूचना प्रणाली (PLMBIS) मा प्रविष्ट गर्नेछ ।
- ख. साना सिँचाइ कार्यक्रमको बजेट संघ र प्रदेश सरकारबाट सम्बन्धित पालिकाहरुमा प्रत्येक आर्थिक वर्षको भाद्र मसान्तसम्ममा स्थानान्तरण भइसक्ने व्यवस्था मिलाउनेछ ।
- ग. द्वीपक्षीय सम्भौतामा उल्लेख भएका सबै किसिमका अनुदानका शर्तहरु अनिवार्य रुपमा पालना गर्नेद्ध ।
- घ. स्थानीय सरकारअन्तर्गत संचालन गिरने साना सिँचाइको आयोजना छनौट, डिजाइन, योजना तथा बजेट तर्जुमा, कार्यान्वयन, अनुगमन र निर्माणपश्चात् प्रदान गिरने सेवा (सञ्चालन तथा मर्मतसम्भार, बजारसम्म पहुँच) का लागि अपनाइने कार्यविधि र प्रकृयामा एकरुपता ल्याउन एकद्वार प्रणाली अवलम्बन गर्नेगराउनेछ र सोका लागि मार्गदर्शन निर्देशिका तयार गर्नेछ एवम् स्थानीय सरकारहरुमा सो लागू गर्नेगराउने व्यवस्था मिलाउनेछ ।
- इ. स्थानीय सरकारहरुमार्फत् साना सिँचाइ कार्यक्रम कार्यान्वयन गराउन आवश्यक पर्ने नीतिनियम तथा निर्माण कार्यको लागि आवश्यक पर्ने मापदण्ड, रणनीति, नीति नियम तथा नम्स् तयार एवम् लाग् गर्नेछ ।

- च. स्थानीय सरकार तथा अन्य सरोकारवालाहरूको प्रयोगका लागि साना सिँचाइसँग सम्बन्धित तथ्याङ्ग तथा दस्तावेजहरू समेटिएको इन्टरनेटमा आधारित व्यवस्थापन सूचना प्रणाली (MIS) स्थापना गर्ने व्यवस्था मिलाउनेछ ।
- छ. कृषि उत्पादनको बजारीकरणमा सहयोग पुऱ्याउन एउटा कृषि-मूल्य सूचना प्रणाली (Agricultural Price Information System) निर्माण गर्नेछ ।
- ज. प्रत्येक वर्ष स्थानीय सरकारको साना सिंचाइसँग सम्बन्धित सीप विकास तथा क्षमता अभिवृद्धिका लागि कम्तीमा एउटा कार्यक्रम (तालिम, गोष्ठी आदि) आयोजना गर्नेछ ।
- भ. गाउँपालिका/नगरपालिकामा संचालन हुने साना सिंचाइ कार्यक्रमका आयोजनाहरुमा संघीय सरकार, प्रदेश सरकार वा अन्य निकायहरुबाट प्राप्त हुने स्रोतमा दोहोरोपन नहुने गरी कार्यान्वयन गर्न सुनिश्चित गर्नेछ ।
- ञ. प्रदेश सरकारले PMISC द्वारा तयार गरिएका वार्षिक प्रतिवेदनहरु Yearly Plan of Operation (YPO) तथा Annual Progress Report (APR) लाई अन्तिम स्वरुप दिनेछ । साथै, सो तथा MIS मार्फत् कार्यक्रम कार्यान्वयनको अनुगमन गर्नेछ ।

४. कार्यक्रम व्यवस्थापन तथा कार्यान्वयन सहयोग परामर्शदाता (PMISC)

- क. PMISC ले प्रदेश सरकारबाट जारी हुने साना सिँचाइसँग सम्बन्धित एकद्वार प्रणाली, नर्म्स् तथा अन्य डिजाइन तथा निर्माण मार्गदर्शन निर्देशिकाहरु तयार गर्न सघाउनेछ ।
- ख. प्रदेश सरकारबाट स्थानीय सरकारलाई प्राप्त हुने सशर्त अनुदान रकमको अनुमान तथा प्रवाहमा सहजीकरण गर्नेछ ।
- ग. व्यवस्थापन सूचना प्रणाली (MIS) को स्थापना गर्नमा सघाउनेछ ।
- घ कृषि-मूल्य सूचना प्रणाली खडा गर्न सहयोग पुऱ्याउनेछ ।
- ङ आवधिक प्रतिवेदनहरु Yearly Plan of Operation, Annual Progress Report तथा अन्य प्रकाशनहरु तथार गर्न सहयोग प्-याउनेछ ।
- च. कार्यक्रम कार्यान्वयन र अनुगमनमा भौतिक पूर्वाधार विकास मन्त्रालयलाई सघाउनेछ । साथै कार्यक्रमको अन्तिम वर्षमा PCU को सहयोगमा बाह्य निकायबाट कार्यक्रमको अनुगमन मूल्याङ्गनको व्यवस्था मिलाउनेछ ।
- छ. स्वीस सरकारबाट प्राप्त हुने आर्थिक अनुदान संघीय कोषमार्फत स्थानीय सरकारहरुलाई उपलब्ध गराउनेछ ।

ज. प्रदेशस्तरीय कार्यक्रम समन्वय समिति (Programme Coordination Committee) का कियाकलापमा सहयोग प्रदान गर्नेछ । ४. माथि उल्लेखित कुराहरुमा थप स्पष्ट हुनुपरेमा नेपाल सरकार, अर्थ मन्त्रालय र स्वीट्जरल्याण्ड सरकारबीच मिति २०७७ असार, १२ गते भएको सम्भौता तथा कार्यक्रम दस्तावेज अनुसार हुनेछ ।

उपरोक्त बमोजिम कार्य गर्न मंजुरी भई आज मिति वि.सं. २०७७ साल साउन ८ गते हस्ताक्षर गर्ने पक्षहरु :

भौतिक पूर्वाधार विकास मन्त्रालय, प्रदेश

नं. १, विराटनगर

हस्ताक्षर

प्रदेश सचिव

कार्यालयको छाप :

भौतिक पूर्वाधार विकास मन्त्रालय, प्रदेश
सहयोग परामर्शदाताको कार्यालय

हस्ताक्षर

Annex VI: Memorandum of Understanding between NAMDP and SIP

Memorandum of Understanding between

Nepal Agricultural Market Development Programme (NAMDP) Phase 2 and Small Irrigation Programme (SIP) Phase 2

This Memorandum of Understanding (MoU) is signed between two SDC initiatives, Nepal Agricultural Market Development Programme (NAMDP) Phase 2, hereinafter called NAMDP, and Small Irrigation Programme (SIP) Phase 2, hereinafter called SIP on 20/10/2020 for collaborative partnership with the intention of increasing income opportunities of women and men in Province 1 as envisioned by the Swiss Cooperation Strategy (2018-2021). Through this partnership, it is expected that

- Water Users Associations (WUAs), farmer cooperatives and associations have increased capacity to sell vegetables and allied crops, contributing to farmers sustainably increasing their agricultural incomes.
- Agri-businesses' supply of good quality and quantity products needed to increase their performance is strengthened.

A. Background to the Collaboration

Nepal Agricultural Market Development Programme (NAMDP), also known as NAMDP, has been designed with a 12 years' time horizon with successive phases. The objective framework of NAMDP is based on a long-term vision of thriving and inclusive agriculture markets. The second phase of NAMDP is for four years (48 months) and is expected to start in late 2020. NAMDP operates under the bi-lateral agreement between the Government of Nepal (GoN) and the Government of Switzerland. Funded by the Swiss Agency for Development and Cooperation SDC, NAMDP is implemented by a consortium of Swisscontact (as the lead agency) and the Center for Environmental and Agricultural Policy Research, Extension and Development (CEAPRED).

NAMDP Phase 2 works on forward production linkages¹ and focuses on generating lasting impact in Province 1. As per the Food and Agriculture Organization (FAO, 2002), "Forward production linkages (or down-stream linkages) refer to the part of the non-farm sector that uses agricultural output as an input". "The distribution and processing of agricultural outputs are fundamental components of forward production linkages". NAMDP Phase 2 is designed to foster value-addition and processing activities leading to increased value of Nepalese agriculture products traded in the international and domestic markets, ultimately leading to employment generation; with an emphasis on support functions (services) and enabling environment for agri-businesses, particularly SMEs. The project has three main pillars in phase 2: agriculture service provision, non-agriculture service provision, and business enabling environment and federal state building. Under these pillars, interventions will identify and address constraints to innovative and sustainable products/service delivery by agriculture service providers (ASPs) and non-agriculture service providers (N-ASPs). This includes addressing policy bottlenecks and unlocking potential for closer collaboration between sub-national governments and the private sector. NAMDP phase 2 will have a rolling portfolio of sectors. Based on the feasibility and impact of interventions in

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specific sectors, NAMDP may opt out of some sectors and include new sectors during the implementation of the programme.

Small Irrigation Programme (SIP-II) implemented by the Government of Nepal (GoN) in collaboration with the Government of Switzerland is built upon the experience of implementing SIP, Phase I. The programme will cover Local Governments (LGs) of mid hills in Province 1. It will provide year-round irrigation to 20,000 hectares in about 1,300 small scale irrigation systems through community driven process benefiting 65,000 farmer households. The expected impact of the programme is to reduce the poverty of small farmers especially from the disadvantaged groups by increasing their agricultural income. This will be achieved through three outcomes: (i) local Governments respond effectively to needs of small farmers for irrigated agriculture; (ii) small farmers especially disadvantaged groups (DAGs) increase agricultural productivity and (iii) market actors offer innovative supports and products to farmers in irrigated schemes. The main approach of the programme is to consolidate the positive results in development of irrigation infrastructure, and further refine scheme design to condition these schemes for dry season irrigation of high value crops, and thus create enabling conditions for the introduction of commercialised agriculture. LGs shall actively support the introduction of improved agriculture practices with a focus on the production of high value cash crops as well as ensuring a conducive environment for the development of the private sector exist and facilitate the linkage between the input and output markets with the farmers.

B. Objectives of the Collaboration

The *main driver of this collaboration is to achieve* joint objectives, which unfold from better market linkages. The dedicated staff for this collaboration will work solely on strengthening market linkages between WUAs and Agri-businesses with the aim to meet:

1) SIP outcome and indicators as stipulated in the SIP log-frame:

Outcome 3: Market actors offer innovative supports and products to farmers in irrigated schemes.	50% of SIP schemes have established contracts with traders or wholesalers to buy their crops (Baseline 0%)
to turners in righted scrience.	70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market (Baseline will be established as the schemes are selected)
Output 3.2: Traders and retailers establish contracts with WUA members	80% of WUA reporting ongoing discussions with traders and buyers

And 2) through the same way meeting NAMDP's outcome, as stipulated in the NAMDP log-frame:

	15% increase in trade value in key value chains by end of phase 2
Outcome 1: Agri-businesses, particularly SMEs ¹ , increase trade	6% average annual increase in buy figures (domestically sourced) from agribusinesses, particularly SMEs

Agri-businesses, convert raw agricultural materials into value added products and sell agriculture produce to other value chain actors, including finished product to end customers.

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value of agricultural produce in key value chains	5% average annual increase in sales figures from agribusinesses, particularly SMEs
	15% average annual increase in private investments from agribusinesses, particularly SMEs, induced as a result of NAMDP interventions

C. Scope of Collaboration

SIP predominantly focuses on backward linkages and productivity while NAMDP focuses on understanding the forward market linkages and the constraints that agribusinesses face to produce high value products. The manager and officer deputed to SIP from NAMDP will work on strengthening the commercial potential and capacity of SIP supported farmers/ WUAs based on the needs identified in on the demand side. This is with the idea to strengthen the value chain linkages in sub-sectors where there is a thematic overlap.

The collaboration shall benefit both agri-businesses (NAMDP) and WUAs/farmers (SIP), ultimately contributing to strengthening market expansion and agriculture income. For this,

- Through SIP, the local governments will ensure agriculture extension, irrigation facility and support services (backward linkages);
- NAMDP will support the WUAs with the knowledge on harnessing the opportunity to meet market demands.
- 3. NAMDP will provide technical assistance to connect WUAs to markets and service providers so that they can be provided with solutions on how to better meet the demand of businesses in forward market linkages (e.g. in terms of quality, quantity, packaging, etc). This ultimately alleviate constraints for agribusinesses who import a large part of their products as they cannot find adequate quality or quantity in commodities produced locally.

To meet the above-mentioned objectives, two NAMDP staff will be deputed to work with the SIP team: one manager level and one officer level. More specifically, the NAMDP staff deputed to SIP will support the WUAs with the knowledge on harnessing the opportunity to meet market demands. As such they will provide technical assistance to connect WUAs to markets and service providers so that they can be provided with solutions on how to better meet the demand of businesses in forward market linkages (e.g. in terms of quality, quantity, packaging, etc). For this the NAMDP staff deputed to SIP can do capacity enhancement assessments and recommend what WUAs need to increase their commercial capacity. For example if WUAs require specific training, the NAMDP staff will recommend what kind of training content is needed and recommend what training provider/consultants could provide it. Then costs for these training will be paid through SIP funds. In all these collaborations, NAMDP staff deputed to SIP shall assure the quality.

1. Assessment and selection of the Water User Associations (WUAs): SIP and NAMDP will jointly prepare a criteria for the selection of irrigation schemes considering a market development potential and the challenges identified for forward market linkages actors. There will be approximately 1,300 irrigation schemes covering 20,000 hectares. Based on the selection criteria of the schemes, NAMDP and SIP will work together to identify the potential WUAs, where commercialisation of farming systems is viable. Not all WUAs will have potential to grow into stronger commercial entities and respond to what is demanded in the market. NAMDP and SIP will have to select those based on the demand and on the list of criteria.

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Access to market, WUA's capacity and willingness to invest, availability of service providers, etc. will be some of the criteria for identification.

- 2. Capacity Development of WUAs: NAMDP and SIP will jointly work together on the strengthening the capacity of WUAs regarding their market and business approach, willingness to establish linkages to business and service providers etc. SIP through the appointed NAMDP staff will work on the frontline with the WUAs for their training, coaching and orientations. NAMDP will provide the insights from the agribusinesses' point of view. To this end the NAMDP team will
- 1) Observe and identify constraints Agri-businesses face to increase performance.
- When these constraints lie in their ability to source <u>quality and quantity of raw products</u>, then NAMDP in collaboration with SIP will identify the WUAs who could <u>meet this demand</u>.
- NAMDP will provide those WUAs with the advice on how to improve or strengthen their business models and help establish fruitful partnerships with agri-businesses.
- 4) NAMDP will strategically link these WUAs with service providers who provide marketing advice or solutions for example, to help them innovate in the way they sell their products to forward market linkages.
- 3. Business Planning of the WUAs: NAMDP will provide strategic advice and provide technical support to WUAs, on how to strengthen WUAs' business planning, collective marketing, etc. to meet the needs of the market actors identified through NAMDP. These needs will be identified through working very closely with other NAMDP managers in agriculture and non-agriculture services.

SIP will organise coordination meetings with the stakeholders to develop a common understanding among themselves, where NAMDP will provide technical assistance.

4. Establishing Business Linkages: NAMDP will link its other interventions and partners with the WUAs wherever there is a viable business model, which responds to the market-demand. Such linkages may be with the agriculture or non-agriculture service providers such as traders, processors, business development service providers, associations or other local actors not directly engaged with NAMDP.

NAMDP will support in establishing contracts between WUAs and market actors (agri-business or traders/wholesaler) to buy their crops (please refer to second indicator of outcome 3).

Selection criteria (under discussion):

Criteria	Specification					
Commercial mindset and capacity	This criterion refers to the financial capacity of the WUA to invest in commercial agriculture. The WUA will need to have started to collect water fees, have a bank account with a positive balance and the WUA members ready to engage in more commercial activities	High				
Willingness and incentives to engage	This criterion describes the willingness and incentives of the WUA to engage in more agriculture commercialisation, for example the WUA needs to agree that a % of the production in the irrigated area is planted and harvested according to an agreed business plan, sold as a whole and the sales profit distributed to the members or re-invested as agreed by the WUA.	High				

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Criteria	Specification	Weight
Accessibility to market centre	In agriculture, access to markets affects productive practices. Roads facilitate access to markets and are a variable to consider in commercialisation effort. As such, NAMDP will engage primarily with WUA that are the closest – a maximum 30 minutes' walk - to a motorable road.	High
Availability of private sector partner willing to engage	This criterion refers to available processors, consumers, ASP and N-ASPS and other private sector actors willing to engage in a commercial relationship with a WUA. This criterion is the foundation of any commercial agriculture for the WUA.	High
Cluster of WUA	To take advantage of economy of scales and possible aggregation of production to meet market demands. NAMDP will engage in area where a cluster of WUA are concentrated within the 30 minutes' walk distance from the road. If such cluster do not exist, then NAMDP will increase the distance radius.	High
Favourable political economy	This criterion relates to the local power structures and relationships which need to be favourable and open for change for NAMDP to engage	High
Leverage potential for other NAMDP interventions	This criterion describes to what extent an engagement with a WUA in a particular location can leverage results in other NAMDP interventions	Low
Leverage potential for other SIP interventions	This criterion describes to what extent an engagement with a WUA in a particular location can leverage results in other SIP interventions	Low

D. Specific Roles of the Parties

NAMDP:

- Both the SIP dedicated manager and officer will be partially stationed in SIP office (3 days at SIP
 office in Biratnagar) and partially in NAMDP office (2 days at NAMDP office in Biratnagar). Should
 this arrangement not be effective it shall be revised by SDC.
- NAMDP will share its working modality with SIP team and try to find synergy and complementarity from the initial stages of the projects.
- 3. NAMDP will provide 2 staff, one manager level and one officer level, who will be working full-time on strengthening market linkages between SIP and NAMDP stakeholders, by advising WUAs on how to improve their business models to meet market demand. NAMDP will work on providing the business intelligence to support WUAs with potential to meet demand in forward market linkages. As such, it will link WUAs with Agricultural and non-agricultural service providers, access to finance etc.
- NAMDP will provide technical assistance to SIP team for the design and implementation of market interventions in the WUAs jointly selected by NAMDP and SIP based on the selection process and criteria.
- NAMDP will work with service providers in market research and information to help them increase the quality and access to accurate pricing information for the benefit of farmers and traders, through information system or platforms.

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SIP:

- SIP will provide working spaces and other logistic supports to the staff designated by NAMDP to be partially stationed in SIP office.
- SIP will share its working modality with NAMDP team and try to find synergy and complementarity from the initial stages of the projects.

SIP/NAMDP

- NAMDP and SiP Team Leaders will meet at least once a month to share ideas, programs, and plans with each other. The NAMDP Team is responsible to ensure that the workplan for the NAMDP manager / officer is aligned with the overall objectives of the collaboration.
- NAMDP manager and officer deputed to SIP will work at the WUA level, building their capacity and coordinating with relevant stakeholders as required based on capacity enhancement assessments. SIP will bear the costs of trainings when required.
- The NAMDP officer dedicated to SIP should start after planning lines of interventions required to achieve the goals of her/his assignment is complete and agreed. The manager will start the planning with the SIP team in October 2020 and the NAMDP officer will start working from November 2020.

E. Operations Understanding

- NAMDP staff dedicated to the SIP collaboration will have a cross accountability to both the
 projects. The NAMDP Manager will report to NAMDP Senior Manager Services and Innovation.
 The NAMDP manager will work closely with the SIP Team Leader and other SIP staff designated
 by the SIP Team Leader
- The NAMDP Team Leader and SIP team Leader will jointly set annual performance for the NAMDP manager dedicated to SIP. The NAMDP Team leader will be responsible to organise the performance assessment and under-go the process jointly with the SIP Team Leader. Both Team leaders should have equal weightage in providing their feedback on the manager's performance. Ultimately the NAMDP team Leader is responsible to take adequate actions based on the performance assessment results.
- Day- to-day administration (field trips, field reports etc) of the NAMDP staff assigned to SIP will be done by the SIP Team Leader.
- 4. The NAMDP staff assigned to SIP are expected to undertake extensive field visits.
- NAMDP officer assigned to SIP will report to the NAMDP manager assigned to SIP. She/he will work closely with relevant SIP staff.
- Cost of field trips (hotel and per diem) for the two NAMDP staffs assigned to SIP will borne by NAMDP. Vehicles and transport costs related to field visits of the two staff will be borne by SIP.

F. General provisions

a. Duration

This Memorandum of Understanding shall be valid for the period from October 2020 to September

MoU between NAMDP Phase 2 and SIP Phase 2

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b. Amendment

Any modification and amendment to the Memorandum of Understanding shall be made in writing with the consent of both the Parties.

c. Contact points, reporting and service of notices and communication

Both parties will assign respective contact points who will communicate with each other to followup activities, conduct reporting and other necessary tasks from time to time to implement this Memorandum of Understanding.

d. Limitations

This Memorandum of Understanding is not legally binding and does not create any right or benefit, substantive or procedural, enforceable by law or equity against either Party.

e. Cost sharing

Should cost sharing activities be envisioned, they will necessitate finalisation in (a) separate contract(s) with the consent of both Parties and must be duly executed in writing and signed by both Parties.

f. Third Parties and Assignment

This Memorandum of Understanding is not intended and shall not be construed to confer any rights and/or remedies to third parties. Neither Party shall assign and/or transfer any nor all its obligations and/or interests arising under this Memorandum of Understanding to a third party without obtaining the prior written consent of the other Party.

g. Conflict of interest

The Parties declare that no conflict of interest exists in the performance of the services at the date of signing of this Memorandum of Understanding. Immediately upon becoming aware of the existence of a conflict of interest, or possibility of a conflict of interest, or of any event which could have a negative influence on or endanger the successful accomplishment of the assignment, the Party that has become aware of such circumstance must immediately inform the other Party in writing. Neither Party and/or their employees shall offer a third party nor seek, accept, or consent to any gift or benefit, nor the promise of any gift or benefit, which would or could be construed as an illegal or corrupt practice directly or indirectly for itself or its staff or any other individual/organisation.

h. Confidentiality and representation of the other Party's names, logos, and views

Any information or data concerning to either Party's inputs and procedures entrusted to or processed by either Party in connection with this assignment which an objective bystander would reasonably consider to be confidential information shall be strictly confidential and cannot be used by the Party receiving the information or data for any other purpose, except with written consent of the Party providing the information or data. Both Parties shall refrain from holding out that it represents the views of the other Party. These obligations shall remain valid even after completion of the Memorandum of Understanding.

MoU between NAMDP Phase 2 and SIP Phase 2

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i. Dispute resolution

Any dispute arising out of or in relation to this Memorandum of Understanding shall be settled amicably by negotiation between the Parties with SDC as witness.

Signed in two originals in Kathmandu, Nepal.

For NAMDP

For SIP

Rick van der Kamp

Team Leader

Nepal Agricultural Market Development Programme -

Phase 2

Sanepa Road, Kupondole-10,

Lalitpur, Nepal

Date: 20 October 2020

Tulasi Nepal Team Leader

Small Irrigation Programme - Phase 2

VIP Marg

Biratnagar

Morang, Nepal

Date: 20 October 2020

Witness from SDC:

Name:

Designation:

Signature:

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		Annex VII: Joint Workplan (Octo	ober 2020-June 2021) of SI	P-II and NAM	DP- Phase 2										
SN	Key Activities	Related SIP Indicator	Target	Respon				2020			mefram	202			Remarks
	Support SIP team on planning for YPO 1 on forward market linkage of			Lead	TA	Sep	Oct	Nov	Dec	Jan	Feb I	Mar	Apr N	May Jun	
1	WUAs			SIP	NAMDP										Completed
2	Identification of market actors who are capable and willing to do sourcing and market management of the agricultural products produced by the WUA member farmers														
2.1	Mapping of private market actors (aggregators, local traders/commossion agents, Wholesalers, Processors) in and around the SIP Command areas	buyers, whole-sellers and retailers of agriculture products, agri- insurers	Mechi, Koshi and Sagarmatha market corridor	NAMDP	SIP										On-going/See Excel sheet titled contact details of traders
2.2	Constraint Analysis of the potential Private Sector market actors with capacity and willingness to expand their businesses in SIP areas.	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops Outcome 3.3:70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market	Mechi, Koshi and Sagarmatha market corridor	NAMDP	SIP										On-going/ See document titled field visit report_constraint analysis
3	Activities to link potential private market actors with commercially viable WUAs														
3.1	Advisory and technical assistance to conduct multistakeholder meetings among WUA representatives, potential traders, input suppliers, service providers and municipality for market linkage	Outome 3.1:50% of WUA that have contracted at least one input provider in the last 12 months Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops or but 11.3.4 i.Cs provide agriculture extension support and facilitate the provision of agriculture inputs for 80% SIP projects	15 LGs	NAMDP	SIP										1 MSP event organized in Panchthar/ See document titled field visit report_MSP; Next MSP planned in Dhankuta and Katari and Gaighat and also to invite representatives from other LGs;
3.2	Advisory and technical assistance in conducting B2B meetings among the WUAs and potential market actors	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops Outcome 3.3:70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market Output 3.2.1: 80% of WUA reporting ongoing discussions with traders and buvers	15 B2B meetings	NAMDP	SIP										Minute from the B2B meeting with traders and WUA to be collected
3.3	Advisory and technical Assistance in contract facilitation among WUAs and potential market actors	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops Outcome 3.3: 70% of beneficiary farmers sell part of their irrigated agriculture production directly to the market	6 WUAs	NAMDP	SIP										Currently exploring the following: 1. Effectiveness of contracts: Pricing being the main bottleneck for traders 2. Legalities of contracts (can price not be mentioned?) through NAMDP's legal expert 3. Alternatives to contracts
3.4	Advisory assistance to link private service providers with Municipal Governments for delivery of Extension Services to the WUAs	Outcome 1.3: 100% schemes have received at least one visit of a rural advisory services provider during the production cycle Output 2.5: 2: 50% JT/JTAs and private service providers provide production advice based on market demand Output 1.3.4: LGs provide agriculture extension support and facilitate the provision of agriculture inputs for 80% SIP projects	15 LGs	NAMDP	SIP										Orientation to LGs on market component; See YPO 2 for this: Discussion ongoing on supporting LGs to register private service providers/formulation of Acts through NAMDP's state building component
3.5	Linkage with NAMDP interventions (Agricultural and Non-agricultural Services) and WUAs	Output 3.1.1: Numbers of input providers offering services to FMIS to maintain or repair irrigation schemes	1 NAMDP intervention	NAMDP	SIP										Birtamode Market (Safer vegetable) 2. Vegetables akbare chilly 3. Dharan Market
4	Selection of WUAs with Market Development Potential for creating linkage with the market														
4.1	Development of Preliminary and Final selection matrices (Physical criteria' for preliminary selection; and 'Social Criteria' for final selection) for selection of Y1 WUAs with Market Development Potential (Already selected schemes)	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops		NAMDP	SIP										
4.2	Insertion of market related criteria in the SIP Selection Criteria of irrigation schemes for Y2 onwards (Schemes to be selected in Y2 onwards)	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops	Pre-selection: 295 schemes	NAMDP	SIP										50% of A and B each A. 184 new schemes for FY 77-78 (already
4.3	Preliminary selection of WUAs with Market Development Potential for creating market linkages through Preliminary Selection Matrix using information from MIS, PPR, and cluster coordinators	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops	Final selection: 100 schemes	SIP	NAMDP										selected) B. 406 schemes for FY 78-79 (yet to be selected)
4.4	Final selection of WUAs with Market Development Potential for creating market linkages through Final Selection Matrix through field visit and direct interviews	Outcome 3.2: 50% of SIP schemes that have established contracts with traders or wholesalers to buy their crops		ЫS	NAMDP										
5	Capacity Development of WUAs and LGs through Cluster Offices														
5.1	Orientation on Market Linkage Modalities to the SIP Cluster Offices	Output 2.4.2: 100 % of SIP supported schemes receive a visit	5 Clusters	NAMDP	SIP										Completed
5.2	Preparation of Trainer's manual for conducting Business planning (production plan/marketing plan/financial plan) training to WUA member farmers to be conducted by Cluster Offices	from a LG JTAs at-least once before the construction begins Ouput 2.5.1: 50% Farmers in FMIS supported by the project plan their irrigated commercial crops based on reliable information on market demand Output 2.5.2: 50% JT/JTAs and private service providers provide		NAMDP	SIP										MS currently preparing the manual
5.3	Conduction of the Business Planning Training	production advice based on market demand Output 2.5.1 '50% Farmers in FMIS supported by the project plan their irrigated commercial crops based on reliable information on market demand Output 2.5.2: 50% JT/JTAs and private service providers provide production advice based on market demand	50 WUAs	SIP	NAMDP										See document titled Concept note_Kamakhya
5.4	Development of a format to be used by JT/JTAs to identify agriculture potential and needs of schemes before construction begins	Output 2.4.2: 100 % of SIP supported schemes receive a visit from a LG JTAs at-least once before the construction begins		NAMDP	SIP										Completed/ See document titled JT/JTA information
6	Price Information System					<u> </u>	1					\dashv			NAMDP team currently profiling the existing
6.1	Coordination with stakeholders (Private) for development of agriculture Price Information System	Output 3.2.2: Simple and accurate price information system is developed and operational Output 3.2.3: Famers consult price information system before bringing produce to the market													systems in Nepal; A meeting with MoLMAC, FNCCI, Dharan and Birtamode Market Management Committees to be organized within this year

Annex VIII: GESI Action Plan

Project Outputs	Gender Activity/ Measure		Target/Performance Indicators	Data Source and Reporting Mechanism	Responsibility
Outcome 1 Local Govern	ments respond effectively to needs	of	small farmers for irrigated agriculture		
1.2 LGs strengthen their legislative and executive capacity for implementing small irrigation schemes	Enhancement of women's roles in decision-making positions.	•	equal rights for women in access to services and control over resources Implementation of existing policies to ensure	Project annual reports	Provincial Government and LGs
capacity to provide support to the farmers in	Agriculture extension addresses the needs and priorities of women, farmers and ensures participation of women, small and marginal farmers in all training events and access to agri-extension activities	•	Women, small and marginal farmers are consulted in the agriculture extension planning process Data on farmer group composition will be collected and maintained disaggregated by sex, caste/ethnicity.	Project monitoring, programme MIS and annual report	LGs and PMISC
Outcome 2 Small farmers	s especially from DAGs increase ag	ric	ultural productivity and shift from subsis	stence to commerciali	zed agriculture
2.1 Small farmers organize themselves inclusively in Water User Associations	agricultural data Executive committee formation ensures women's representation	•	Data available in programme MIS and reported in Annual Reports Minimum 40% representation of women in WUA executive committees Proportional representation from head, middle and tail-enders. All of WUAs have at least one woman	Review of Minutes of WUA General Assemblies, reported in project annual report	LGs and PMISC
	and reflects the demographic profile of the command area as guided by their constitution. WUA Constitution includes provision for meaningful participation of	•	holding a key leadership position (chairperson, secretary, treasurer) WUA rules provide for equal pay for men and women for work of equal value; and either the husband or the wife is an eligible member Women executive committee members	constitutions	
	women.		actively participate in discussions and decision-making related to the operation,		

Project Outputs	Gender Activity/ Measure	Target/Performance Indicators	Data Source and Reporting Mechanism	Responsibility
		management and maintenance of the schemes		
Associations (WUAs) build and/or rehabilitate	Ensure meaningful participation of women members of WUA executive committees through leadership and technical training to WUA executive committee members	 65% of trained women leaders (where applicable) demonstrate increased ability to perform Women are consulted on the design of scheme construction and/or improvement Design of water distribution systems benefits men and women in an equal manner Constitution provision for equal pay for men and women is applied in under the payable works implemented through WUA contracts 	Public hearings, WUA agreements, construction supervision. Muster roles and WUA payment records	LGs/PMISC
	Equitable distribution of irrigation water in the scheme command areas, especially with regard to irrigation water supply to plots farmed by women	80% of plot farmed by women in the scheme command areas receive timely water supply in sufficient quantity	Post construction monitoring and annual reports	WUAs, LGs, PMISC
	Promote and develop women leader farmers in the subproject areas. Provide priority access to subsidized agriculture inputs and equipment to women farmers	 40% of farmer group members trained are women farmers. 50% of women farmers have adopted improved agriculture technologies and are using improved seen varieties. LGs ensure the WUA's allow equal access of female-headed households, to community owned agriculture equipment 	Post construction monitoring and annual reports	LGs and PMISC

Project Outputs	Gender Activity/ Measure		Target/Performance Indicators	Data Source and Reporting Mechanism	Responsibility
production in their production in their FMIS	WUAs will involve all female members in planning of production and inform them on the commercial opportunities	•	50% of women farmers are plan their production based on commercial opportunities	Post construction monitoring and annual reports	LGs and PMISC
Outcome 3 Market actors	offer innovative supports and prod	duc	ts to farmers in irrigated schemes.		
maintenance, production	provides will ensure that the services are promoted to women and that women farmers have equal access		adriculture inpute and earlices provided	Post construction monitoring and annual reports	LGs and PMISC
	WUAs will ensure that all female members will be able to establish contacts with agriculture traders	•	production to traders	Post construction monitoring and annual reports	LGs and PMISC

Annex IX: Letter from MoPID to avoid duplication





भौतिक पूर्वाधार विकास मन्त्रालय

प्रदेश नं. १

विराटनगर, नेपाल

पत्र संख्या - ०७७। ७८ वलानी नम्बर - १६४

मिति -२०७८। ०१। १४

श्री जलश्रोत तथा सिंचाइ विकास डिभिजन, पाँचथर, इलाम, खोटांग, ओखलढुंगा, भोजपुर, धनकुटा, तेहथुम, उदयपुर।

विषय : साना सिंचाइ कार्यक्रम (SIP-Phase II) सम्बन्धमा।

प्रस्तुत विषयमा नेपाल सरकार र स्विट्बरल्याण्ड सरकारवीच प्रदेश १ को मध्यपहाडी आठ वटा जिल्लाका साष्ट्री वटा गाँउ तथा नगरपालीकाहरूमा साना सिंचाइ कार्यक्रम (SIP-II) सैचालन गर्न मिति २०७७ असार १२ गते द्विपक्षीय सम्झौतामा हस्तासर भएको र सोहि सम्झौताको बुँदा नं १९९ मा भएको व्यवस्था अनुसार यस मन्त्रालय र Programme Management and Implementation Support Consultants, PMISC बीच मिति २०७७ धावण ८ गते भएको समझदारी अनुसार पचास हेक्टर भन्दा कम क्षेत्रफल भएका सिंचाइ योजनाहरू SIP-II अन्तर्गत संचालन गरिने भएकोले संलग्न वमोजिमका सिंचाइ योजनाहरू SIP-II अन्तर्गत कार्यन्वयन प्रकृयामा गएको हुनाले तहाँ कार्यालयलाई सिंचाइ योजनाहरू तर्जुमा कार्यन्वयनमा स्पष्टता, दोहोरोपन नहोस भन्ने उद्देश्यले योजना कार्यक्रमहरू कार्यान्वयन अगाडी बढाउन हुन निर्देशानुसार जानकारी गरिन्छ।

संलग्न:

- १. आयोजनाको विवरण
- 7. Copy of Agreement between Government of Switzerland and Government of Nepal
- 3. Copy of Program Document of SIP-Phase II
- ४. भौतिक पूर्वाधार विकास मन्त्रालय र PMISC वीच समझदारी पत्रको छाँया प्रति

(डा. सरोज कार्की)

जलश्रोत तथा उर्जा विकास महाशाखा

वोधार्थ

PMISC, विराटनगर।

इन्जिनियर

Annex X: Programme budget and expenditure

	PROGR	AM BUDGET AND	EXPENDITURE FOR	FY 2020-21	
	Total (NPR)	Total (CHF)	Expenditure (NPR)	Expenditure (CHF)	%
Civil Works	897,852,309	7,807,411	441,275,381	3,707,266	49
Technical Assistance (100% SDC)	110,000,000	956,522	97,048,000	775,882	88
Machinery (100% SDC)	4,600,000	40,000	2,294,569	17,768	50
WUA Training, DoLl/ Provincial/Local Government Strengthening (100% SDC)	32,700,000	284,348	1,926,620	15,207	6
Recurrent Cost (100% FG)	2,400,000	20,870	-	-	
Total	1,047,552,309	9,109,151	542,544,571	4,516,123	52

						Fund Receive	ers			and Allocat		Fund Bene	
	Budget/Expense Headings	Expense Amount (in NPR)	Expense Amount (in CHF)	Geog	graphical Out	reach	Discrimination Perspective		PARTIES AND ADDRESS OF THE PARTIES AND ADDRESS O	ster perspe	the state of the s	Beneficiary Perspective Directly attributable or no	
		542,544,571	4,516,123	District/ Province	National	International	Discriminated	Non - Discriminated	Province 1		Others and National	Attributable funds	General and common costs
1	2			4	5	6	7	8	9	10	11	12	13
PART 2	Local Office of Contractor	4,010,337	31,550										
2.1	Local Office staff of contractor	4,010,337	31,550		100%	-	-	100%	-	-	100%	-	100%
2.2	Reimbursable cost	-	-		-	-	-	0%	-	-	-	-	-
PART 3	PROJECT IMPLEMENTATION	95,332,232	762,101										
PART 3a	Long Term Experts	27,457,354	215,964			-							
3.1	Professionals (expat and national)	27,457,354	215,964	100%	•	-	19%	81%	100%	-			100%
3.2	Travel expenses of residential expats	-	-		-	-			-	-	-	-	-
3.3	Other costs of resident expats	-	-	-	-	-			-	-	-	-	-
PART 3b	Short term experts	-	-	-	-				-	-		-	
3.4	Short term experts	-	-	-		-			-	-	-	-	100%
3.5	Reimbursable costs	-		-		-			-	-	-	-	100%
3.6	Remuneration of national support staff	44,579,590	360,392										
3.6.1	National Level	9,279,652	75,050	100%	-	-	95%	5%	100%	-		-	100%
3.6.2	Cluster Level	33,013,760	266,862	100%	_	_	58%	42%	100%	_		-	100%
3.6.3	Gratuity	2,286,178	18,479	100%	-	_	65%	35%	100%				100%
3.7	Reimbursable Costs	11,497,124	90,942	10070			0070	0070	10070				10070
3.7.1	Travel	569,087	4.484	100%		_	56%	44%	100%	_		-	100%
3.7.2	Accomodation incl DSA- National	639.009	5,034	100%		_	50%	50%	100%	_		-	100%
3.7.3	Accomodation incl DSA- Field staff	10,289,029	81,424	100%	_	_	59%	41%	100%				100%
	Purchase of equipment for project			100%	-	-	39%	4170	100%	-		-	100%
3.8	implementation	2,380,314	18,491										
3.8.1	Project Vehicles-SUV	-	-	-	-	-	-	-	-	-	-	-	-
3.8.2	Double Cab 4WD	-	-	-	-	-	-	-	-	-	-	-	-
3.8.3	Project Vehicles(motorcycles)	-	-		ı	-	-	-	-	-	-	-	-
3.8.4	Office Equipment	2,294,569	17,768	100%		-	-	100%	100%	-	-	-	100%
3.8.5	Furniture	85,745	723	100%		-	-	100%	100%	-	-	-	100%
3.9	Operating Costs PIU (effective cost)	9,417,850	76,313										
3.9.1	Office Rent	742,080	6,909	100%	-	-	82%	18%	100%	-		-	100%
3.9.2	Running Cost Office	4,062,670	32,901	100%	-	-	-	100%	100%	-		-	100%
3.9.3	Office Rent district	400,900	3,240	100%	-	-		100%	100%	-		-	100%
3.9.4	Running office cost district	948,026	7,589	100%	-	-	-	100%	100%	-		-	100%
3.9.5	Running cost vehicles	2,594,662	20,407	100%		-	-	100%	100%	-		-	100%
3.9.6	Local Auditing	450,000	3,600		100%	-	-	100%	_	_	100%	-	100%
3.9.7	Training national support staff	219,513	1,667	100%		-	60%	40%	100%			-	100%
PART 4	ADMINISTERED PROJECT FUNDS	443,202,001	3,722,473										
4.1	Civil works- SDC	266,233,244	2,185,160	100%		-	33%	67%	100%	-	-	100%	
	Civil works- FG	14,116,838	122,755	100%			33%	67%	100%			100%	
	Civil works- PG	78,950,259	686,524	100%			33%	67%	100%			100%	
	Civil works- LG	81,975,040	712,826	100%			33%	67%	100%			100%	
4.2	WUA training	1,911,690	15,091	100%	-	-	-	100%	100%	_		100%	
4.3	Institutional Strengthening of Dolidar	14,931	116	-	100%	_	_	100%	-	-	100%	-	100%
4.5	Skill Development for DDC technical staff including DTO Logistic support and strengthening capacity	-	-	-	-	-	-	-	-	-	-	-	-
	Development and maintenance of an automated, internet based, scheme				_	-	-	-	-	-	-	-	
4.4	verification system and project preparation system												

Annex XII: Local Government (LGs)Selection Process

Small Irrigation Program is to be implemented by the local governments of the mid-hill areas of Province 1.

There are a total of 137 local levels in Province 1 out of which 27 are in the mountainous area of Taplejung, Solukhumbu and Sankhuwasabha and the rest 110 in the non-mountainous regions. Given the nature of the small irrigation sector, local levels in the mountainous regions were excluded from the list of potential LGs.

An economic corridor approach was applied to further prioritize the local levels in non-mountainous region. The reference corridor is derived from the main arterial roads of most economic importance (also derived from previous District Core Road Network) in Province 1. The North-South alignment of the selected road corridor takes into account the relevancy of: i) organic flow of markets (goods and services) including that of off-season vegetables; and ii) ethnographic diversity. The core economic road corridor covers 63 LGs and another 12 LGs fall in-between the road corridor LGs making it a total of 75 LGs.

Given the nature and policy mandate (50 ha in the hills as per Province 1 Irrigation Policy) of the small irrigation sector, 23 local levels of Jhapa, Morang and Sunsari were further excluded. Hence, an initial list of 41 local levels were identified. As SIP-I was already implemented in Khotang, Udayapur and Okhaldhunga, nine LGs which are not part of the economic corridor were also included in the initial list of potential LGs for Phase II making it a total of 60 LGs.

The following criteria will be applied in selecting the LGs for Phase II.

- 1. Need of small irrigation in the LG; availability of water
- 2. Access to and linkages with market
- 3. Guaranteed and demonstrated agriculture extension and inputs,
- 4. Commitment from the LGs on:
 - > 20% funds contribution from LGs
 - One window system: Through a one window approach a variety of services will be provided to Farmer Managed Irrigation Systems (FMIS) including construction or rehabilitation of irrigation facilities, pro-active support for development of irrigated agriculture and facilitate the development or expansion of agriculture value chains. It will also require the building up and maintenance of comprehensive inventories of irrigations schemes in the LGs. Further it would also include small irrigation strategic plan; Dedicated technical personnel; LGs in leadership role (planning and prioritization in coordination with other stakeholders as well, setting standards and norms, implementation approach, monitoring, financial accountability and so on).
 - > Watershed/basin approach,
 - > Road corridor approach,

Using the above-mentioned criteria, a total of 48 LGs were selected for the first year with LGs sending an intent as well commitment letter for the implementation of Small Irrigation Program. During this FY, additional nine LGs were selected, making the total LGs to 57.

Annex XIII: Minutes of the Program Coordination Committee Meeting

Minutes of Program Coordination Committee Meeting of Small Irrigation Program – Phase II

Date of Meeting: 18th April 2021 Venue: OCMCM, Province 1, Biratnagar Time: 10:30-11:30

Participants

1,	Honourable Chief Minister Sherdhan Rai, Province 1	Chief Guest
2.	Honourable Minister Ambir Babu Gurung, MoPID	Chairperson
3.	Her Excellency Ambassador Elisabeth von Capeller, Embassy of Switzerland	Vice Chairperson
4.	Honourable Vice Chairperson Subodh Raj Pyakurel, Province Planning Commission, Province	Invitee
5.	Mr. Suman Raj Aryal, Principal Secretary, Province 1	Invitee
6.	Mr. Mohan Kumar Shakya, Secretary, Ministry of Physical Infrastructure Development, Province 1	Member
7.	Mr. Pankaj Bhurtel, Under Secretary, Ministry of Economic Affairs and Planning, Province 1	Member
8.	Mr. Pashupati Pokhrel, Senior Agriculture Development Officer, Ministry of Land Management, Agriculture and Cooperative, Province 1	Member
9.	Mr. Hornnath Poudel, Senior Divisional Engineer, Department of Local Infrastructure, MoFAGA	Member
10.	Mr. Ramesh Prasad Poudel, Chief, WREDD, MoPID, Province 1	Member Secretary
11.	Mr. Aman Jonchhe, Program Management Specialist, SDC	Member
12	Ms. Icchya Kumari Gurung, Deputy Mayor, Siddhicharan Municipality	Member
13.	Mr. Khajindra Rai, Chairperson Chaubise Rural Municipality	Member
14.	Ms. Sunita Yonghang, Vice Chairperson, Mangsebung Rural Municipality	Member
15.	Mr. Krishna Bahadur Katwal, Senior Divisional Engineer, DoLl, MoFAGA	Invitee
16.	Mr. Tulasi Nepal, Team Leader, PMISC/SIP	Permanent Invitee
17.	Mr. Rick van der Kamp, Team Leader, Nepal Agriculture Market Development Program	Permanent Invitce

Proceedings

The first meeting of the Program Coordination Committee (PCC) for SIP-II started in the presence of Honourable Chief Minister Sherdhan Rai, Province 1. The meeting was chaired by Honourable Minister Ambir Babu Gurung, Ministry of Physical Infrastructure and Development (MoPID) and co-

The meeting started with Mr. Mohan Kumar Shakya, Secretary, MoPID welcoming all the members and invitees. He briefly introduced the program and said that he was hopeful that the PCC meeting would review the progress made till date as well as provide necessary guidance to effectively implement the program.

Mr. Ramesh Prasad Poudel, Chief, Water Resources and Energy Development Division (WREDD)/MoPID, also the member secretary of the PCC then introduced Small Irrigation Program in detail outlining the outcomes, components, institutional arrangement and financial breakdown. He then presented the progress for FY 2077-78 and yearly plan of operations for FY 2078-79.

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- 1. Presentations on Progress and Yearly Plan of Operations (YPO)
- a. Annual Progress of FY 2077-78 (FY 2020-21)

Mr. Poudel, presented the annual progress of SIP for FY 2077-78, till March (For details pleasa see Annex 1)

In his presentation, Mr. Poudel briefed that a Memorandum of understanding (MoU) was signed between Ministry of Physical Infrastructure Development, Province 1 and Program Management and Implementation Support Consultant (PMISC) on 23rd July, 2020. Similarly, MoU between all 48 LGs and PMISC was signed as per the bilateral agreement established between the Government of Nepal and the Government of Switzerland. Further, MoU was signed between SIP-II and Nepal Agriculture Market Development Program (NAMDP) with the objective to strengthen market linkages between WUAs and Agri-businesses.

Mr. Poudel informed that 6,239 hectares of land will be irrigated in the FY 2077-78. Till 12th April 2021, a total of 140 irrigation schemes have been completed benefitting 5,782 small farming households among which 39% were from the disadvantaged groups (DAG) while 67% have a landholding of less than 0.5 ha (10 ropani). The completed schemes provided round the year irrigation to 1,693 ha of area (including both existing and new). On an average cropping intensity in 64 schemes completed in 2019-20 increased by 49.32%.

An additional 195 schemes (including 13 carried over from FY 2076-77) will be constructed by the end of this fiscal year covering 4,112 ha. This would further benefit 10,231 households with year-round irrigation, out of which 44% will be from DAG while 61% beneficiaries will have a landholding of less than 0.5 ha.

He also informed that a brief outline of the one window system for identification, budgeting, implementation, monitoring and support of small irrigation to be established by LGs has been drafted and is expected to be finalized by Province Government by July 2021.

b. YPO for FY 2078-79 (FY 2021-22)

During the presentation of YPO of FY 2078-79, Mr. Poudel informed that 8000 hectares of land will be irrigated benefitting 25,000 small farming households. (For details, please see Annex 2).

SIP is currently implemented in 48 LGs in the mid hill region of Province 1. Consultative meetings were held with 12 additional LGs in Bhojpur, Dhankuta, Ilam, Panchthar and Terhathum for SIP implementation from FY 2078-79.

A total budget of NPR 2,164,737,500 has been proposed for FY 2078-79, out of which NPR 2,000,000,000 is for civil works.

2. Discussions:

- a. Linkages to agriculture services and Irrigation: Mr. Pashupati Pokhrel, Ministry of Land Management, Agriculture and Cooperatives (MoLMAC) highlighted the need to link completed irrigation schemes with agriculture extension services as the results of crop yields are quite promising. He also stressed that under the leadership of Palikas the Agriculture Knowledge Centre should be involved in providing agriculture extension services. Further, it was agreed that SIP will send the list of completed schemes to MoLMAC so as to explore agriculture programs in these areas.
- b. Province Line Ministry Budgetary Information System: As the planning process for FY 2078-79 is ongoing, representative from Ministry of Economic Affairs and Planning, Mr. Pankaj Bhurtel suggested that the list of programs for next year should be prepared at the earliest.
- c. Ms. Ichhya Kumari Gurung, Deputy Mayor of Siddhicharan Municipality suggested that as the demand from Palikas for the implementation of small irrigation schemes are high, SIP should take up higher number of schemes each year.
- d. Alternative irrigation technologies: The need for SIP to explore other alternative irrigation systems especially lift irrigation was raised by many members.

3. Closing Remarks:

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Her Excellency Ambassador Elisabeth von Capeller remarked that the collaboration modality of all three governments for the implementation of SIP is a dream for this country. Further, she added that SIP's design is unique with Province Government as the coordinating and steering agency, local government as the implementation agency and federal government as advisory agency. HE Ambassador Capeller praised the progress made by the project despite the CoVID-19 crisis.

The Honourable Chief Minister Sherdhan Rai stated that we are at an important phase of implementing federal system in Nepal and with the collaborative effort of local, provincial and federal government as well as water users, SIP is a first of its kind in Province 1. He stressed on the importance of linking agriculture services and market along with the construction of irrigation schemes.

Concluding the meeting, Honourable Minister Ambir Babu Gurung assured the committee that the Province Government through MoPID will ensure its presence by provisioning the conditional grant, applying one window system for the implementation of small irrigation as well as through effective monitoring.

6. Decisions

- Annual progress report for FY 2077-78 and YPO for FY 2077-78 and FY 2078-79 was approved by the PCC.
- The PCC endorsed the expansion of SIP into 12 new Palikas given that commitment letters are received from them. Corresponding budget and programme to be prepared.
- 3. Enforce a one window policy for small irrigation schemes all over province 1.

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ANNEX XIV: Case Studies

Bina's courage rebuilds her house

A mother of two, 27-year-old Ms. Bina Karki, has been struggling to raise her children on her own. In the hopes of a better livelihood, her husband went abroad for employment five years ago. However, he did not send any money back home and has been out of contact. She not only had to go through the pain of missing her husband but now has added responsibility of earning a living.

When Ms. Karki heard about the construction of Dumsebesi irrigation scheme with the support of Chaubise Rural Municipality, Dhankuta/SIP, she was elated as now irrigating her land on time and with adequate water wouldn't be a problem. Moreover, she was excited about the income opportunities that the construction would bring for small farmers and women like her.

With no prior skills and training on masonry, Ms. Karki joined the construction works of the irrigation system as daily wage laborer. "I have learnt reinforcement bar bending, concrete mixing and formwork, all of which are completely new for me. I have earned Rs 42,000 after working for 2 months," she beamed happily.

She has spent some of her earnings on groceries and now plans to spend the rest to install roofing for her house. She has already started collecting wood for this.

Beneficiary focused program supports low-income families in income generation

Ms. Gita Bhujel is a single mother. Her husband passed away 2 years ago and she has been struggling to look after her children, their education and health care needs as she doesn't have any income source. The situation worsened when her son broke his hand after falling from a tree. "I had to take loan from a neighbor for the treatment of my 10-year-old boy and all I have been worried about repaying the loan", said Ms. Bhujel.

The construction of Simle irrigation scheme in Arun Rural Municipality, Bhojpur became a source of hope and relief for Ms. Bhujel as it created an employment opportunity for her. "I have earned Rs 27,500 from working in the construction of the irrigation system and have managed to repay the loan of Rs. 12,000", happily said Ms. Bhujel.



Ms. Gita Bhujel preparing concrete mix for the construction of Simle irrigation canal

Photo Credit: Dharmendra Bahadur Bista

Journey of Rewati Rai from unskilled labor to a mason

Ms. Rewati Rai worked along the skilled mason as well as received training on quality control and construction management in the Bahuni Irrigation Scheme in Chaudandigadi Municipality, Udayapur.

What started as a mandatory participation in the construction management training for Rewati Rai, has now transformed into a source of regular income. Before the construction of Bahuni Irrigation Scheme, Rewati's name had been proposed as the unskilled laborer for training. She was hesitant at first as the work looked difficult.

"After receiving the training and working alongside the skilled mason for few months, I feel much more confident on working on my own. I have learned how to bind the reinforcement bar. Now I think I can work for building constructions as well," says Rewati.



Ms. Rewati Rai binding the reinforcement bar in Bahuni Irrigation Scheme



A similar story followed of Ms. Shanti Thapa Magar in Debrepani Irrigation Scheme in Chaudandigadi municipality. After working in the irrigation scheme as laborer, she is now working in the construction of another irrigation scheme as a skilled laborer. "In the beginning, I didn't think being a mason would be easy. The income is good and I have not only earned money but also have gained respect from the community."

She believes that the way both her family's and community's perception towards her has changed after seeing her work as a mason. She says that participation of women in other public construction works should be mandatory as it builds the capacity of women and also provide a source of income.

Ms. Shanti Thapa Magar binding the reinforcement bar in Debrepani Irrigation Scheme

The power of a woman's voice against discrimination

" As we will be paid based on the volume of the work done, we should not include women in the construction works. Every household should send a man to do work as women will slow down the work," said a man during a Water Users' Association (WUA) meeting for Thulo Khola Dovela Irrigation Scheme in Diktel Rupakot Majhuwagadi Municipality. While most of the men and women quietly agreed, Ms. Laxmi BK, the treasurer of the WUA raised her objections and reminded everyone that the program did not discriminate against women as mentioned during the trainings.

Supporting Laxmi BK, Ms. Bishnu Maya who is also the secretary of the WUA said that, "Our aim is to complete the construction work successfully. As women we will work to the best of our capacity and with full honesty. And for this we should be paid equally as the men. If you do not let us work and give us equal wages, we will file a complaint at the Palika."

Hearing these two women from the committee, gave confidence to other women present in the meeting and they also started raising their objection. After a long discussion, the WUA agreed that each construction group will have compulsory participation from women and they will be paid equal wages as the men.

"Do you know that we were paid the same amount as the men, 900 rupees per day?" happily said Laxmi BK when the project team met with her after the completion of the scheme. Against the assumption of few men, women in Thulo Khola Dovela Irrigation Scheme proved that the construction could be completed on time and successfully with the active participation of women. Laxmi's courage to raise her voice against women discrimination in public works has paved way for other women to do the same.

In Okhladhunga, when Ms. Dhukuri Maya Magar showed interest to run for the Water Users' Association (WUA) chairperson position, majority of the participants of the meeting, mostly men, resisted. However, she persisted and stood her ground and was successful in being elected as the chairperson of the WUA. Not only her, but all the other members of the WUA except for the treasurer are women in Dhadkhola irrigation scheme in Sunkoshi Rural Municipality.

"Nobody in the community supported me initially after being elected as the chairperson of WUA. The institutional development training really strengthened my confidence," says Ms. Magar. She not only took up the managerial role in the WUA efficiently but also actively participated as construction worker.

work was Her well appreciated by the local government as well. "The timely and successful completion of the irrigation scheme under the leadership of women is a good example for our community. Women can do any work if they have the right opportunities," said Mr. Bishnu Bahadur Magar, ward chairperson during a visit to the site. The community is also happy with her efforts and



Ms. Dhukuri Maya (in pink) documenting the meeting minutes of Dhadkhola Irrigation Scheme, Okhaldhunga

she has now been elected as the treasurer of a farmers' group.

She knows that she has a long way to go and says that "my struggle has not ended; it has just started. I will now work dedicatedly to promote commercial farming in the coming days".