



BASELINE REPORT

May 2022

Nepali Yuwa in Climate Action and Green Growth project

Madhesh Province

Nepali Yuwa in Climate Action and Green Growth

May 2022

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EXECUTIVE SUMMARY

Climate crisis combined with the ongoing COVID-19 pandemic has disproportionately affected young people who hold the largest proportion of the population. However, this also creates the opportunity to utilize young energy for the country's development. Nepali Yuwa in Climate Action and Green Growth (NYCAGG) focuses on promoting Nepali youth inclusion in the climate action and green economy in the post-COVID recovery of Nepal. However, measuring the outcome of the project requires a baseline study for establishing a benchmark. Hence, this baseline study enables the identification of the status of project defined indicators related to project impact, outcome, and output in Madhesh province.

Desk reviews, field surveys, and telephone surveys were conducted for the study. Field surveys were conducted at Loharpatti Municipality (Mahottari district) and Janakpurdham (Dhanusha District). While telephone surveys were conducted in the remaining eight municipalities. The questions pertaining to entrepreneurship were inquired with government bodies (provincial ministries/Chamber of industries/Federations/Associations) and National Youth Council, banking and financial institutions, academic institutions (BBA/Business Colleges), and business person/start-up.

Madhesh Province is vulnerable to various natural disasters such as floods, drought, storms, and cold waves. Only a few municipalities had prepared disaster related acts and policies. While none of the municipal bodies had a Local Disaster and Climate Resilience Plan (LDCRP). Likewise, in the entrepreneurship front, activities/programs/projects specifically on entrepreneurship and start-ups were lacking. Incubation space and innovation labs are yet to be established in Madhesh Province. Provincial and municipal governments are yet to have dedicated activities for Climate Change Adaptation (CCA) and Disaster Risk Reduction and Management (DRRM). Same is the case with entrepreneurship development.

Regarding environmental concerns, in Janakpurdham, solid waste, sound pollution, and road drainage issues were prominent. In different municipal bodies, pressing environmental issues ranged from air pollution, water pollution to solid waste.

TABLE OF CONTENTS

ACKNOWLEDGEMENT	iii
Executive Summary	iv
ABBREVIATION AND ACRONYM	1
1. Introduction	2
2. Methodology.....	6
3. Findings of the baseline study	11
4. Perception of stakeholders.....	19
5. Recommendation from the baseline study.....	21
6. Conclusion	23
7. Annexes	24

Table 1: List of DRRM and CCA related policies and status of LDCRP/LDRMP in provincial and local governments of Madhesh province.....	13
---	----

Table 2: Status of Disaster Management Committee (DMC) Emergency Operations Center, and human resources in the provincial and local governments in Madhesh Province	14
---	----

Table 3: Major entrepreneurial actors in Madhesh Province.....	16
--	----

Table 4: Traffic light mechanism of the perception of province and municipal bodies about the systems, policies, plans, and capacities supported by the interventions in place.....	19
---	----

Table 5: Traffic light mechanism of the perception of NYC and province about the systems, policies, plans, and capacities supported by the interventions in place.....	20
--	----

Table 6: Various actors who can contribute to various functions of such incubation center.....	22
--	----

Table 7: Logical framework with the baseline value for Madhesh Province (only the indicators assessed through this baseline survey are presented here).....	23
---	----

Figure 1: Major areas of youth engagement through NYCAGG project	3
--	---

Figure 2: Project areas for Climate Fellowship in Madhesh Province include nine municipal bodies and province headquarter.	6
---	---

Figure 3: Project areas for Climate Fellowship in Madhesh Province include nine municipal bodies and province headquarter.	10
---	----

Figure 4: Environmental concerns in Madhesh Province, solid waste being prominent.....	18
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ABBREVIATION AND ACRONYM

APF	Armed Police Force
BBA	Bachelor of Business Administration
BDS	Business Development Services
BFI	Banking Finance and Insurance
BIPAD	Building Information Platform Against Disaster
CAO	Chief Administrative Officer
CCA	Climate Change Adaptation
CCP	Climate Policy Paradigms
CDMS	Center for Disaster Management Studies
COVID	Coronavirus Disease
CREASION	Center for Research and Sustainable Development
CSOs	Civil Society Organizations
CSR	Corporate Social Responsibility
DIMS	Disaster Information Management System
DMC	Disaster Management Committee
DRR	Disaster Risk Reduction
DRRM	Disaster Risk Reduction and Management
EU	European Union
FNCCI	Federation of Nepalese Chambers of Commerce & Industry
FNCSI	Federation of Nepalese Chamber of Commerce and Industry
FWEAN	Federation of Women Entrepreneurs Associations of Nepal
GESI	Gender Equality and Social Inclusion
GTS	Ground Truth Score
HDI	Human Development Index
ICT	Information and Communication Technologies
IT	Information Technology
JCI	Junior Chamber International
LAPA	Local Adaptation Plans for Action
LDCRP	Local Disaster and Climate Resilience Plan
LEOC	Local Emergency Operations Center
MBA	Master of Business Administration
MEDPA	Micro-Enterprise Development for Poverty Alleviation
MEOC	Municipal Emergency Operations Centre
MoFAGA	Ministry of Federal Affairs and General Administration
MSEs	Midsized Enterprise
MSMEs	Micro, Small & Medium Enterprises
ND-GAIN	Notre Dame Global Adaptation Initiative
NGO	Non-Governmental Organization
NMEFN	National Micro Entrepreneurs Federation Nepal
NPC	National Planning Commission
NRB	Nepal Rastra Bank
NYC	National Youth Council
NYCAGG	Nepali Yuwa in Climate Action and Green Growth
NYEF	Nepalese Young Entrepreneur Forum
PEOC	Provincial Emergency Operation Center
REDD	Reducing Emissions from Deforestation and Forest Degradation
SENSE	Sustainability and Environmental Studies Endeavor
SME	Small and Medium-sized Enterprises
UNICEF	United Nations Children's Fund
YI-Lab	Youth Innovation Lab

1. INTRODUCTION

This chapter provides a brief background of COVID-19 and its impact in Nepal. The issues of Climate Change Adaptation (CCA) and Disaster Risk Reduction and Management (DRRM) along with the role of youth in these issues have been overviewed. A project description is also provided which comprises information on the project impact, outcome, and output. Then the objectives of the baseline study are outlined.

1.1 Background

COVID-19 has brought unprecedented challenges to the world. In Nepal, the impact has been far-reaching beyond the healthcare sector. Especially, the impact on the economy has been drastic which is shown by negative economic growth in the fiscal year 2020/21 (by 2.1%)¹. Over several rounds of surveys conducted by the United Nations Children's Fund (UNICEF) during different times of COVID in Nepal, it was reported that 90% of respondents had reported job losses more than once². Income reduction in Madhesh Province (Province 2) was reported to be 38.3%³. However, the impact of COVID-19 has not been equal. It has disproportionately impacted the working groups, especially young people, women, marginalized groups, and communities at risk. On the other hand, vulnerable and marginalized communities are already hard hit by humanitarian crises such as climate crisis and disaster. Despite having a negligible contribution to greenhouse gas emissions, Nepal ranks 10th in the Global Climate Risk (2000-2019)⁴. Likewise, Notre Dame Global Adaptation Initiative (ND-GAIN) index which measures a country's vulnerability to climate change and other global challenges in

combination with its ability to improve resilience has ranked Nepal as the 47th most vulnerable country and the 70th least ready country⁵. This signifies that Nepal has both a great need for investment and innovation for improving readiness combined with great urgency for action.

The climate crisis combined with the ongoing COVID-19 pandemic has disproportionately affected young people who hold the largest proportion of the population. Often the impacts could have been minimized or mitigated through risk-informed decision making. However, there exist gaps in timely accessing reliable information for understanding risks. Hence, the role of young people becomes crucial in supporting governments in designing actions and implementing them to adapt, mitigate, and reduce the impact. Young people are the critical stakeholders to fight climate change, respond to extreme climate events, and transform a better world for living as they are at the forefront of climate action. They are also the ones to face the collective impacts of climate change actions and inaction. They can be advocates to revitalize public connections, raise awareness, and generate innovative ideas to adapt to the climate crisis. Hence, promoting youth inclusion in climate action and green economy in the post-COVID recovery in Nepal is of utmost importance. But currently, there is a lack of such initiative.

1 GoN/MoF, "Public Announcement of Income-Expenditure Details of Fiscal Year 2021/22" (Government of Nepal/Ministry of Finance, 2021).

2 UNICEF, "Equity Focused Assessment of Secondary Effects of COVID-19 on Families and Children in Nepal" (UNICEF NEPAL COUNTRY OFFICE, 2021), <https://unicef.org/3MFITzn>

3 WFP, "The Impact of COVID-19 on Households in Nepal" (World Food Programme, 2020), <https://bit.ly/3rWskgZ>

4 David Eckstein et al., Global Climate Risk Index 2021 Who Suffers Most Extreme Weather Events? Weather-Related Loss Events in 2019 and 2000-2019, 2021.

5 University of Notre Dame, "Nepal | ND-GAIN Index," 2019, <https://gain-new.crc.nd.edu/country/nepal>.

1.2 Project Description

Youth Innovation Lab (YI-Lab) in the consortium of Restless Development, Center for Research and Sustainable Development (CREASION), and Center for Disaster Management Studies (CDMS) has won a grant from the European Union (EU) for the project Nepali Yuwa in Climate Action and Green Growth that will be implemented in Madhesh, Karnali, and Sudurpaschim provinces from 2022 to 2025. The project promotes Nepali youth inclusion in climate action and green economy in the post-COVID recovery of Nepal through their engagement in disaster and climate governance,

entrepreneurship, and advocacy. It focuses on working with young people and empowering and providing them a platform to aid towards the post-COVID recovery and development process. Furthermore, the activities under Climate Fellowship, Climate Smart Entrepreneurship, Mentee-mentorship, Digital Advocacy, and Youth Sounding Board work towards empowering young people, providing them employment opportunities, generating innovative ideas to address climate and environmental issues, and advocating for policy changes to promote environmental protection.

Climate Fellowship

- Climate Fellows placed at municipal governments and provincial government offices.
- Work towards strengthening ORR and CCA plans and policies

Climate Smart Entrepreneurship

- Finding innovative solutions to the pressing climate issues
- Providing innovation grant to develop prototypes for enterprise

Mentee-mentorship

- Selected entrepreneurship ideas pilfered mentorship by sectoral experts

Data Driven Advocacy

- Youth engagement in data collection • Development of 'Tag He app to collect data and web portal to visualize data.
- Engaging young people to advocate on the local climate and environmental issues and bringing them to the public.

Youth sounding Board (YSB)

- YSB a consultative youth advisory group developed
- YSB will Inform the ELM actions In Nepal .
- Will provide Inputs on program design, strategies, and interventions

Figure 1: Major areas of youth engagement through NYCAGG project

The project envisions increased participation of Nepali youth in governance, entrepreneurship, and advocacy for climate action through the intervention. The proposed activities of the project fall under five themes which work towards empowering youth, providing them employment opportunities, generating innovative ideas to address climate and environmental issues, and

advocating for policy changes to promote environmental protection (Figure 1). The program accountability and implementation team are responsible for overlooking the whole action, making decisions, and monitoring and evaluating the progress. And the beneficiaries include young people between the age of 15-29, 37 local governments, and three provincial governments

1.3 Theory of Change

The outputs of the project include the following:

- ◆ **Output 1:** Opportunities created for embedding youth to gain professional experience in provincial and local governments of Madhesh, Karnali, and Sudurpaschim provinces on DRR and CCA
- ◆ **Output 2:** Strengthened capacities of Nepali youth on DRR, CCA, and Gender Equality and Social Inclusion (GESI) in Madhesh, Karnali, and Sudurpaschim provinces
- ◆ **Output 3:** Increased awareness and capacities of provincial and municipal elected representatives and government officials on DRRM and CCA
- ◆ **Output 4:** Upgraded and updated DRR and CC-related plans at the municipal level and integrated DRR and CC related datasets into Building Information Platform Against Disaster (BIPAD) Portal
- ◆ **Output 5:** Opportunities created by the intervention for youth entrepreneurship, employment, and mentorship in the market of green economy and climate resilience
- ◆ **Output 6:** Strengthened capacities of Nepali Youth for data-driven advocacy and policy dialogue on climate change and environment

If the outputs from output 1 to 6 are achieved then it is expected in the mid-term to increase participation of Nepali youth in governance, entrepreneurship, and advocacy in climate action in Madhesh, Karnali, and Sudurpaschim provinces, which is the specific objective of the action. This is because the inputs of the intervention (technical assistance and facilitation, awareness campaigns, training on DRR, CCA, and GESI, mentorship and entrepreneurship support, and policy dialogue) will generate awareness, knowledge, new policies, strategies, models, products, and practices that will generate tangible results that are appreciated and utilized by youth and local governments to jointly advance the climate action and green economy agendas in the post-COVID recovery of Nepal.

This will happen under the following assumptions: municipal and provincial governments engage

with youth in climate change and green economy and young people are committed and provincial governments increase their openness to youth engagement in advocacy and policy dialogue and youth benefit from quality training and entrepreneurship support and actively engage in advocacy and economic actions.

And if the specific objective is achieved, then it is expected in the long-term to contribute to the promotion of Nepali youth inclusion in climate action and green economy in the post-COVID recovery of Nepal, which is the expected impact of the action. This is under the assumption that climate change issues, DRR, and entrepreneurship remain a priority of the government and provincial government, local governments, and the National Youth Council remain actively involved in the action and apply in practice the increased capacities.

1.4 Objectives

Measuring the outcome of the project requires a baseline study to benchmark the status before the implementation of the action. Whether intended project results are achieved, is identified through comparison between the initial stage of the project with the final stage. Therefore, it is necessary to find out the status of the planned targets and indicators throughout the project period and particularly important at the end of the project.

In this scenario, setting up an initial benchmark at the

start of the project is crucial which will be a reference milestone throughout the project. The baseline survey will help YI-Lab and consortium partners to determine the existing status of the project indicators which will be used as a basis to measure the project's progress. This baseline survey specifically focused on Madhesh Province which is the area of intervention for the first year of the project implementation. The overall objective of the baseline survey is to identify the current status of project defined indicators.

The specific objectives are:

1. DRRM and CCA plans and policies at the provincial and municipal level

- Identify the status of Climate and Disaster related plans (such as Local Disaster and Climate Resilience Plan (LDCRP), Local Adaptation Plans for Action (LAPA), and more) and policies at the Palika level.
- Conduct assessment of DRRM and CCA governance system at the provincial and Palika levels.
- Identify the information sharing and data management mechanism at the provincial and local levels.
- Check whether a risk assessment has been carried out by the provincial and local levels.

2. Entrepreneurial Ecosystem of Madhesh Province

- Identify the entrepreneurial ecosystem of Madhesh Province including the study of government policies, government initiatives in promoting entrepreneurship, startup financing, academic programs, and institutions promoting entrepreneurship.
- Assess finance and technologies for Small and Mid-size Enterprises (SMEs) and startups.

3. Identify the pressing environmental and climate concerns

2. METHODOLOGY

This chapter provides the methodology used to carry out this baseline study including brief information on the study area.

2.1 Study Area

Madhesh Province is the smallest province in Nepal with an area of 9,661 sq. km but has the highest population (6,126,288) and highest population density (630 per sq. km) in the country⁶. It consists of one Metropolitan, three Sub-Metropolitan, seventy-three Municipalities, and fifty-nine Rural Municipalities spread over eight districts. Among the provinces, Madhesh, Karnali, and Sudurpaschim provinces fall behind while examining HDI⁷. According to the vulnerability and risk assessment report 2021⁸, climate extreme events have the greatest impact on Madhesh province, and all its districts have experienced high to extremely high extreme events. Furthermore,

Madhesh Province is vulnerable to various natural disasters such as floods, drought, storms, and cold waves. NAPA vulnerability ranking of districts of Nepal show that Saptari and Siraha districts show very high ranking in drought vulnerability with Mahottari district showing very high ranking in flood vulnerability⁹. Flood was reported as the most frequently occurring disaster by all municipal bodies. For the baseline study, nine municipal bodies (shown in Figure 2) and the province headquarter, Janakpurdham were reached.

The study was divided into five phases: (1) Inception phase, (2) Field visit and survey, (3) Data processing and analysis, (4) Reporting, and (5) Data quality management plan and action. Each of these phases is described below.

6 CBS, "National Census 2078 Preliminary Results" (Central Bureau of Statistics, 2021).

7 Provincial Comparison of Development Status in Nepal: An Analysis of Human Development Trend for 1996 to 2026 - <https://bit.ly/3GiMKQq>.

8 Vulnerability and Risk Assessment and Identifying Adaptation Options - <https://bit.ly/3jBKjYp>.

9 Nepal's NAPA: <https://unfccc.int/resource/docs/napa/npl01.pdf>

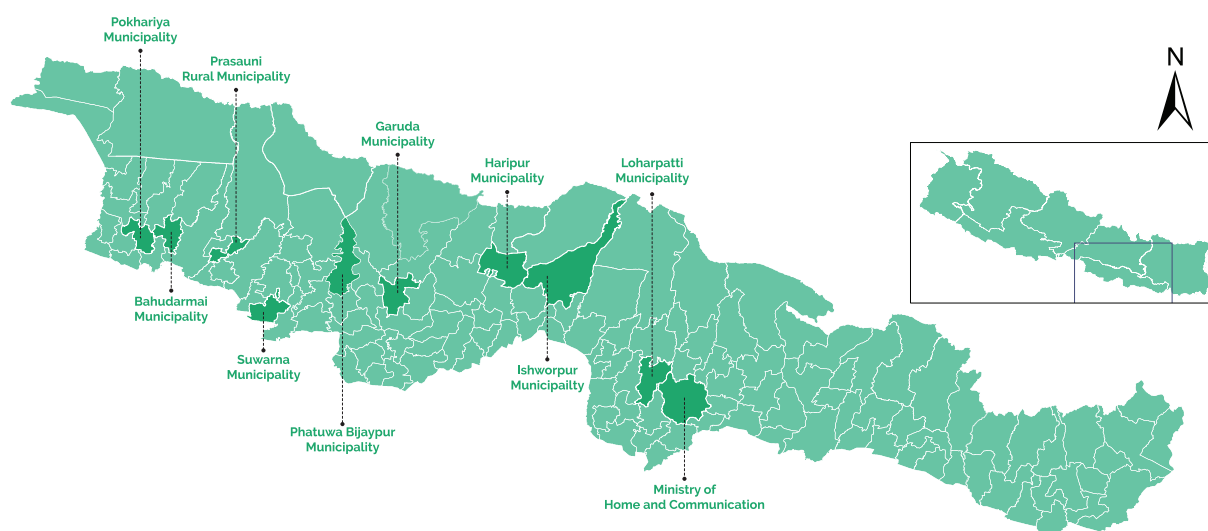


Figure 2: Project areas for Climate Fellowship in Madhesh Province include nine municipal bodies and province headquarter.

2.2 Inception Phase

During the inception phase, a review of existing policies related to DRRM, CCA, environment, and entrepreneurship was conducted in Madhesh province and in nine identified project municipal governments. The government websites were sought to obtain documents (municipal profiles, DRRM and CCA related acts, policies, etc.) regarding existing policies along with other relevant sites. After the initial study, survey questionnaires were prepared for the government bodies on the themes of (see Annex 1 for more details):

- **Understanding of disaster and DRRM:**

Inquiries into frequently occurring disasters in the municipal bodies, hazard and risk mapping that has been conducted, data recording and sharing medium, etc.

- **Municipal government capacity building:**

Inquiries into training received by municipal elected representatives on DRRM and CCA and if so, how many have received such training.

- **Identification of policies, plans, and committees:**

Inquiries into DRRM and CCA policies endorsed by the municipal bodies, Disaster Management Committee formation and their meet-up, the status of LEOC/MEOC, etc.

- **Outlining environmental concerns:**

Inquiries into the major environmental concerns of the province and municipal bodies.

- **ICT and human resources:**

Inquire into the availability of IT Officer, DRR Focal person, and ICT facilities.

Likewise, questionnaires pertaining to entrepreneurship were developed to inquire with different entrepreneurial stakeholders such as (see Annex 2 for more details):

- Policies placed to promote entrepreneurship,
- Conduction of youth engagements programs for promoting youth participation,
- Innovation lab establishment or their progress,
- Financial literacy/ loan schemes focusing on SMEs,
- Courses for entrepreneurship and business development,
- Hult Prize/Idea Studio or other entrepreneurship events that have been conducted,
- Challenges and issues for starting and running the business.

In the inception phase, stakeholders to interview for the survey were identified. To understand DRR and CCA governance at provincial and local levels, Chief Administrative Officer (CAO), DRR Focal Person, and IT officers were identified as potential persons to interview. Prior to the surveys, the contact details of different stakeholders were obtained from municipal websites and referrals from concerned bodies. Climate Fellowship Coordinator from YI-Lab communicated with provincial and municipal governments to inform them about the project and provide information on the baseline study.

Likewise, to understand the entrepreneurship ecosystem of Madhesh Province, officials from government bodies (Provincial ministries/Chamber of industries/Federations/Associations) and National Youth Council, staff from banking and financial institutions, academic coordinators from BBA/Business Colleges, and business person/start-up were targeted.

2.3 Field visit and surveys

Before moving to the field, survey questionnaires were finalized with the YI-Lab team. Field surveys were conducted at Loharpatti Municipality (Mahottari district) and Janakpurdham (Dhanusha District). Different government personnel and entrepreneurial stakeholders were interviewed during the field visit (list of interviewed individuals presented in Annex 3). For eight municipal bodies, the telephone surveys were conducted. These municipal bodies where telephonic survey was carried are:

1. Bahudarmai Municipality (Parsa),
2. Pokhariya Municipality (Parsa),
3. Prasauni Rural Municipality (Bara),
4. Suwarna Rural Municipality (Bara),
5. Garuda Municipality (Rautahat),
6. Phatuwa Bijayapur Municipality (Rautahat),
7. Haripur Municipality (Sarlahi),
8. Ishworpur Municipality (Sarlahi)

In total, 20 individuals were interviewed to get information about DRRM and CCA. Among these individuals, 7 were CAO, 1 DRR Focal person, and 5 IT officers/ Information Officers were interviewed from municipal bodies. To get information about entrepreneurship, 11 individuals were physically interviewed.

The interviewees comprised 93.55% male and 6.45% female. The majority were interviewed from Urban areas¹⁰ comprising 93.55% of the respondents. The ethnic groups interviewed were from Madhesi groups comprising 70% of respondents, Janajati comprising 6.67%, Tharu comprising 3.33%, and the remaining falling under other groups.

¹⁰ Interviews conducted at Municipalities and Provincial headquarters were considered Urban bodies.

2.4 Data Processing and Analysis

During the data processing and analysis phase, responses from interviews were transcribed and information was compiled for further analysis. From the interviews with stakeholders working in entrepreneurship and secondary research, stakeholder mapping of the entrepreneurship ecosystem of Madhesh province was carried out. Furthermore, data were collected and cleaned to identify the baseline for the five indicators presented below.

- **Indicator 001:** Perception of National Youth Council, Province, and Palika that the systems, policies, plans, and capacities supported by the interventions are in place
- **Indicator SO1.5:** Number of innovation labs established
- **Indicator OP1.3.1:** Number of municipal elected representatives and officials trained and/or sensitized on DRRM, CCA, and on BIPAD Portal
- **Indicator OP1.4.1:** Number of government policies developed or revised with civil society organization participation through EU support
- **Indicator OP1.5.2:** Number of entrepreneurial ventures developed under the thematic area of green growth, sustainability by young people

For the perception survey, the Ground Truth Score (GTS) was used based on the weighted average of responses across the 5-point Likert scale (Strongly disagree, disagree, neutral (neither disagree nor agree), agree, and strongly agree). It is based on the

formula: the percentage of respondents who strongly agree plus half the percentage of respondents who agree minus half the percentage of respondents who disagree minus the percentage of respondents who strongly disagree. Neutral responses are not counted. The score ranges from -100 to +100 with zero as the midpoint value. Positive scores indicate a tendency to agree with the statement and negative ones indicate a tendency to disagree. The ground truth score provides a reading of perceptions at the time of the assessment. Over time, it allows the concerned project to track how the issue is perceived – and how the perceptions change over time. The overall GTS for Madhesh Province was also calculated based on the total count of responses.

Furthermore, a traffic light mechanism was used as it has been identified as an effective inspection tool used in a range of fields for visual communication¹¹. It served as a performance report in which several indicators were presented together graphically on a single chart with color boundaries corresponding to limit or precautionary reference points. The colors – red, yellow, and green were representations of numerical values of GTS.

11 John F Caddy, "The Traffic Light Procedure for Decision Making: Its Rapid Extension from Fisheries to Other Sectors of the Economy," 2015, 30; "Traffic Light System for Quality Inspection in Garment Manufacturing," Online Clothing Study (blog), accessed March 23, 2022, <https://bit.ly/38BxsKo>

$$\text{GTS} = \% \text{ of strongly agree} + \frac{1}{2} (\% \text{ of agree}) - \frac{1}{2} (\% \text{ of disagree}) - \% \text{ of strongly disagree}$$

For this study, -100 to -40 was assigned Red color, -40 to +40 was assigned Yellow color and +40 to +100 was assigned Green color.

2.5 Reporting

A report outlining the baseline status of project defined indicators related to project outcome and output was prepared. Upon receiving feedback from YI-Lab, the final report has been prepared.

2.6 Data quality management plan and action

For ensuring the data quality of the interviews, secondary information collected from desk review was used. For instance, during an interview, if the respondents stated that their municipality had an act or directive, it was verified by the documents uploaded on the website or the availability of the hard copy.

Likewise, surveys were also conducted with multiple government officials whenever possible serving as validation of the collected information. For instance, in Loharpatti Municipality, both Planning Assistant and DRR Focal person were interviewed. The Planning Assistant had informed that a disaster risk action plan was prepared but when the DRR Focal Person was interviewed, he indicated no such policies were prepared for DRRM. This led to DRR Focal Person confirming this information with the Planning Assistant and it turned out that disaster risk action plan for Loharpatti Municipality had indeed been formulated but it was before he was assigned to the current position.

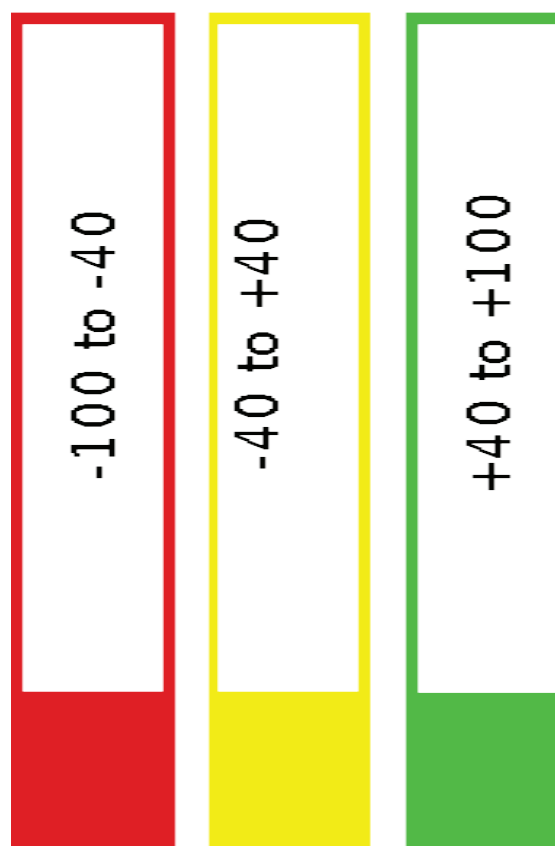


Figure 3: Traffic light mechanism used in the baseline study with score range assigned to different colors.

3. FINDINGS OF THE BASELINE STUDY

This chapter provides the findings of the baseline survey. The findings have been presented under the following titles: (1) DRRM and CCA plans and policies at the province and municipal level, (2) entrepreneurial ecosystem of Madhesh Province, (3) Environmental and Climatic concerns of Madhesh province.

3.1 Disaster Risk Reduction and Management and Climate Change Adaptation at the province and municipal level

This section provides information regarding the national policies related to DRRM and CCA. Then it delves into the status of climate change and disaster related plans and policies at the provincial and municipal level, its governance structure, information sharing mechanism, and risk assessments that have been carried out.

3.1.1 National policies related to DRRM and CCA

At the national level, various acts, policies, and plans have been formulated to promote DRRM and CCA. In the field of DRRM, it includes Disaster Risk Reduction and Management Act Amendment (2019)¹², Disaster Risk Reduction Policy (2018)¹³, Disaster Risk Reduction and National Strategic Plan of Action 2018-2030 (2019)¹⁴, Disaster Risk Reduction and Management Rules (2019)¹⁵, Monsoon preparedness and response plans (2021)¹⁶, and Disaster risk financing strategy (2021)¹⁷. These have focused on disaster risk management as a process and focus on different stages – mitigation, preparedness, response, and rehabilitation. They have a well-structured functional institutional setup from the center to the local level. For the policies related to Climate Change, Nepal has the National Framework on Local Adaptation Plans for Action (2011)¹⁸, Nepal National REDD+ Strategy (2018)¹⁹, National Climate Change Policy (2019)²⁰, GESI in Climate Change: strategy and action plan,

2077-2087 (2021)²¹ along with report submissions to UNFCCC - National Adaptation Program of Action to Climate Change (2010)²², Second Nationally Determined Contribution (2020)²³, Third National Communication Report (2021)²⁴, and National Adaptation Plan 2021-2050 (2021)²⁵.

The disaster risk reduction activities are planned for integration into climate change adaptation through the National Climate Change Policy (2019). The National Climate Change Policy (2019) has mentioned under the strategies and working policies of Disaster Risk Reduction and Management that DRRM system will be developed at three tiers for prevention and reduction of and preparedness to, climate-induced disasters. The policy interventions have made overall emphasis on preparedness and response rather than rehabilitation and mitigation²⁶. However, we can see a shift in policies over the years. Initially, Nepal's overall disaster management was focused on disaster response and relief (1997-2000),

12 Disaster Risk Reduction and Management Act Amendment (2019): <https://bit.ly/3y4A26l>

13 Disaster Risk Reduction Policy (2018): <http://drrportal.gov.np/uploads/document/1476.pdf>

14 Disaster Risk Reduction and National Strategic Plan of Action 2018-2030 (2019): <https://bit.ly/3ET5Qwi>

15 Disaster Risk Reduction and Management Rules (2019): <https://bit.ly/3xWymvx>

16 Monsoon preparedness and response plans (2021): <https://bit.ly/3vSpZyg>, <https://bit.ly/3EXhDte>

17 Disaster risk financing strategy (2021): <https://bit.ly/3OlssnG>

18 LAPA (2011): <https://bit.ly/3xZDQWu>

19 Nepal National REDD+ Strategy (2018): <http://redd.gov.np/post/nepal-national-redd-strategy-2018>

20 National Climate Change Policy (2019): <https://bit.ly/3KinJFO>

21 GESI in Climate Change: strategy and action plan, 2077-2087 (2021): <https://bit.ly/3OEOF62>

22 NAPA (2010): <https://unfccc.int/resource/docs/napa/npl01.pdf>

23 Second Nationally Determined Contribution (2020): <https://bit.ly/3KpSCiz>

24 Third National Communication Report (2021): <https://bit.ly/3LocVY7>

25 National Adaptation Plan 2021-2050 (2021): <https://bit.ly/3EVmmMe>

26 Pashupati Nepal, Narendra Raj Khanal, and Bishnu Prasad Pangali Sharma, "Policies and Institutions for Disaster Risk Management in Nepal: A Review," *Geographical Journal of Nepal* 11 (April 3, 2018): 1–24, <https://doi.org/10.3126/gjn.v11i0.19546>.

disaster risk reduction (2003-2008) and integrated climate change adaptation (2009-2011)²⁷. The shift has however followed a layering mode of change which means competing Climate Policy Paradigms (CPPs) currently exist in Nepal.

At the policy level in Nepal, Local Disaster and Climate Resilient Plan (LDCRP) has been put forward by the Ministry of Federal Affairs and General Administration

(MoFAGA), which is trying to combine Climate Change and DRR components to create resilient communities. A Local Disaster and Climate Resilience Plans (LDCRP) Guideline Draft (2017)²⁸ has also been formed which emerges the elements of the Local Disaster Risk Management Plans (LDRMP) and Local Adaptation Plans of Action (LAPA). LDCRP streamlines both DRR and CCA into one coherent policy.

27 Sumit Vij et al., "Changing Climate Policy Paradigms in Bangladesh and Nepal," *Environmental Science & Policy* 81 (March 2018): 77–85, <https://doi.org/10.1016/j.envsci.2017.12.010>.

28 LDCRP Guideline Draft (2017): <https://cbdrmpplatform.org/sites/default/files/inline-files/LDCRP-Guidelines-2017.docx>

3.1.2 Status of climate and disaster related plans and policies at the provincial and municipal level

The National Climate Change Policy (2019) outlines the role of province level to formulate provincial policies and other documents in conformity to this policy and to implement them and for local levels to do the same at the local level. The provincial level is responsible to carry out monitoring and evaluation of climate change mitigation and adaptation programs within the province with such works at the local level conducted by local government. Province should coordinate with the federal and local levels to formulate and implement programs related to climate change. The local level should conduct climate change mitigation and adaptation programs in coordination and collaboration with the concerned agencies while also forming and mobilizing Youth Volunteer Committees for climate-induced disaster management. Furthermore, DRRM Act Amendment (2019), DRR Policy (2018), and the Local Government Operational Act (2017)²⁹ have given the local government responsibility for preparedness, disaster management, and early response.

Based on the desk study and interview with the provincial stakeholders, following legal instruments in the field of disaster and climate were identified in Madhesh Province:

- DRRM Act (currently being updated)
- Directive for Providing Financial Support to the Affected 2077³⁰ and it states that victims within

the province can receive financial support but an application will be required.

- Monsoon Preparedness Plan of Health Sector 2078³¹ has planned for appropriation of the budget for disaster preparedness and management. Likewise, formation and activation of Province Rapid Response Team and District Rapid Response Team for the health sector has been planned.
- Forest Act 2076³² states that the management, use, and benefits from climate change adaptation and carbon storage and emission reduction will be distributed as stated by the Government of Nepal.

A disaster Action plan had also been prepared at the provincial level but the plan is yet to be endorsed.

DRRM Act 2017, DRR National Policy 2018, and the Local Government Operational Act 2017 have given the local government responsibility for preparedness, disaster management, and early response. At municipal level, municipalities such as Pokhariya Municipality, Prasauni Rural Municipality, and Suwarna Rural Municipality have endorsed municipal DRRM Act (Table 1). Likewise, Loharpatti Municipality has prepared a Disaster Risk Action Plan and Pokhariya Municipality has prepared and endorsed Disaster Management Fund Operation Directive. However, none of these nine municipal governments have prepared LDCRP.

29 Local Government Operational Act (2017): <https://bit.ly/3OKgCcu>

30 Directive for providing financial support to the affected 2077: <https://bit.ly/3xZGgEh>

31 Monsoon Preparedness and Response plan of health sector 2078: <https://bit.ly/3kjeU3V>

32 Forest Act 2076: <https://bit.ly/3Log1yk>

Table 1: List of DRRM and CCA related policies and status of LDCRP/LDRMP in provincial and local governments of Madhesh province

Provincial or local government	DRRM and CCA related Policies	Status of LDCRP/LDRMP
Province Headquarter	Provincial DRRM Act that is in process of update; Forest Act 2076	Not applicable
Bahudarmai Municipality	Not available	Not available
Pokhariya Municipality	Municipal DRRM Act, Endorsed, 2078	Not available
Prasauni Rural Municipality	Municipal DRRM Act, Endorsed, 2075	Not available
Suwarna Rural Municipality	Municipal DRRM Act, Endorsed, 2078	Not available
Garuda Municipality	Not available	Not available
Phatuwa Bijayapur Municipality	Not available	Not available
Haripur Municipality	Not Available	Not available
Ishworpur Municipality	Not Available	Not available
Loharpatti Municipality	Not Available	Not available

3.1.3 DRRM and CCA governance system at the provincial and palika level

At the provincial level, disaster falls under the jurisdiction of the Ministry of Internal Affairs and Communications. There is no particular section/department designated to look after climate change, however, climate issues are looked after by various branches of ministries. For instance, under the Ministry of Industry, Tourism and Forest³³, there is a Climate Change and Climate Finance branch and under the Ministry of Land Management, Agriculture and Cooperative³⁴, there is an Agrobiodiversity and Climate Change branch.

At the municipal level, all the interviewed municipal governments have a Disaster Management Committee (DMC) that is responsible for coordinating, contacting, and communicating to respond in case of an emergency. They hold meeting on the ad hoc basis and meetings are usually called upon after the occurrence of a disaster.

Pokhariya Municipality and Prasauni Rural Municipality have a separate disaster section. In the remaining municipal governments, there are no such dedicated units for DRRM and CCA. Almost 50% of municipal governments have a DRR Focal person. It was found that the DRR Focal person had additional responsibilities at the office. For instance, DRR Focal Person of Loharpatti Municipality was working as education coordinator.

Likewise, all of these municipal governments have full time IT officers. At these nine municipal governments, Local Emergency Operations Center (LEOC) has not been established. However, the provincial office had a Provincial Emergency Operation Center (PEOC) headed by APF staff. Risk assessment has been carried at the provincial and local level. Summary of status of Disaster Management Committee (DMC) Emergency Operations Center, and human resources in the provincial and local governments in Madhesh Province are presented in Table 2.

³³ Ministry of Industry, Tourism and Forest <http://moitfe.p2.gov.np/>

³⁴ Ministry of Land Management, Agriculture and Cooperative organogram <http://molmac.p2.gov.np/content.php?id=3>

Table 2: Status of Disaster Management Committee (DMC) Emergency Operations Center, and human resources in the provincial and local governments in Madhesh Province

Provincial or local government	Presence of Disaster Management Committee	Status of PEOC/LEOC/MEOC	IT Officer available	DRR Focal person available	ICT facilities
Province Headquarter	Yes	Established	Yes	Yes	Yes
Bahudarmai Municipality	Yes	Not established	Yes	No	Yes
Pokhariya Municipality	Yes	Not established	Yes	Yes	Yes
Prasauni Rural Municipality	Yes	Not established	Yes	Yes	Yes
Suwarna Rural Municipality	Yes	Not established	Yes	No	Yes
Garuda Municipality	Yes	Not established	Yes	No	Yes
Phatuwa Bijayapur Municipality	Yes	Not established	Yes	Yes	Yes
Haripur Municipality	Yes	Not established	Yes	No	Yes
Ishworpur Municipality	Yes	Not established	Yes	No	Yes
Loharpatti Municipality	Yes	Not established	Yes	Yes	Yes

At the policy level in Nepal, LDCRP has been put forward by the MoFAGA, which is trying to combine climate change and Disaster Risk Reduction components to create resilient communities. In the current three-tier structure of government, municipal governments are independent local governments and are closest to people in every aspect. Likewise, in times of emergencies and disaster, the local governments are nearest to respond to these

situations. Therefore, it is vital that they have plans and policies in place for DRRM and CCA.

With regards to GESI, there is general sensitization. From staff hiring at the municipality to the activities carried by the municipality, GESI aspect has been tried to incorporate. At the policy level, it has been mandatory to incorporate GESI. Municipal bodies shared that for any policies to be promulgated, the GESI component needs to be added.

3.1.4 Information sharing and data management mechanism at different tiers of governments

Currently, the data sharing mechanism follows: municipal bodies send the details of the disaster occurrence and data on loss and damage to the District Emergency Operations Center (DEOC). DEOC then sends the data to Province Emergency Operations Center (PEOC) who then sends it to National Emergency Operations Center (NEOC). As per necessity, certain information is also directly sent by municipal bodies to the province office. The correspondence is through email and at the provincial level, emails are received daily. NEOC analyzes the collected data and disseminates the information to stakeholders³⁵.

It was found that Initial Rapid Assessment was conducted to collect data on damage and loss at these nine municipal governments. The collected data were digitized as Word documents or Excel sheets. However, Bahudarmai and Ishworpur municipality only have hard copies of the records.

³⁵ NEOC functions: <http://www.neoc.gov.np/en/major-functions-3.html>

None of the municipal governments had carried hazard and risk mapping or assessment. However, the municipalities had identified hazard prone areas/wards based on the historical occurrence of floods.

The legal framework of Nepal including DRRM Act (2017), DRR National Policy (2018), DRR National Strategic Action Plan (2018-2030) have highlighted the need to develop and operate national, provincial, and local level Disaster Information Management System (DIMS) for understanding disaster risk. With this demand, BIPAD Portal³⁶, an integrated and comprehensive DIMS, initiated by the Government of Nepal is put in place with a bottom-up approach of data sharing and partnership. A level of initiation has been started by the government to localize the portal at the provincial and municipal levels. However, it has not remained without challenges. Interviewing IT officers, it was found that they had heard of BIPAD Portal but had not started integrating data in the Portal.

³⁶ BIPAD Portal: <https://bipadportal.gov.np/>

3.2 Entrepreneurial ecosystem in Madhesh Province

This section presents the findings on the entrepreneurial ecosystem in Madhesh Province and maps the entrepreneurial ecosystem actors.

3.2.1 Madhesh Province entrepreneurship programs

In Nepal, the start-up and entrepreneurial ecosystem is at a nascent stage. Through secondary research, it was found that the Government of Nepal is yet to define what start-up is and to develop a defined policy on start-ups. To accommodate this, the Ministry of Industry, Commerce & Supplies is on the verge of drafting the definition and policy for the start-ups. However, this is not to say that progress has not been made in this sector. Federation of Nepalese Chambers of Commerce & Industry (FNCCI) has made a start-up and innovation committee³⁷ and is setting up business incubation centers in all the provinces

of Nepal through provincial FNCCI. Banks have started to produce special loan schemes targeting theme-based start-ups due to huge competition in the market and to build pipelines of SMEs/MSEs to disburse loans from the banks.

In Madhesh Province, the entrepreneurial ecosystem is in its primitive stage as the coordination mechanism between the stakeholders has not been created yet. Incubation centers are yet to be established in the province. Some of the challenges identified from the survey are: availability of space, high cost of establishment, complicated process for business registration, and taxation.

³⁷ Start-up and innovation committee:
<https://www.fncci.org/start-up--innovation-286.html>

3.2.2 Major entrepreneurial ecosystem actors / stakeholders in Madhesh Pradesh

Entrepreneurial ecosystem comprises, but not limited to, federal, provincial, and local government bodies; academic institutions; business umbrella organizations; financial institutions; CSOs promoting entrepreneurial activities; market actors; aspiring/ existing entrepreneurs; investors; and business mentors. Though the entrepreneurial ecosystem is

in the primitive stage in Madhesh province, there are ecosystem actors that are identified below who are yet to be brought together in this ecosystem.

Gathering both secondary and primary research, the major entrepreneurial actors in Madhesh Province have been identified and consulted are presented below (Table 3).

Table 3: Major entrepreneurial actors in Madhesh Province

Government bodies	National Youth Council (NYC); Provincial Ministry - Ministry of Land management, agriculture, and cooperative
Academic institutions	Rajarshi Janak University, Dhanusa; Monastic College, Janakpur
Business umbrella organizations	Janakpurdham Chamber of Commerce & Industry; Nepalese Young Entrepreneurs Forum (NYEF), Janakpur chapter; JCI Janakpur
Financial institutions	Nabil Bank, Dhanusha; Siddhartha Bank, Dhanusha; Kumari Bank, Dhanusha
Others	Business person; start-ups



Government Bodies

National Youth Policy 2072 has one of its objectives to highlight the competence inherent in the youth class by establishing them as the basic power of the nation through the development of creativity, entrepreneurship, and investigative competence in them. To implement National Youth Policy 2072³⁸, Youth Vision-2025³⁹ (ten-year strategic plan) has been put in place – Youth Vision 2025 has five strategic pillars and Pillar 2: Employment, Entrepreneurship, and Skills Development. However, in Madhesh province, at the implementation level, activities promoting entrepreneurship were not witnessed. At the municipal level, skilled based training such as making candles, incense sticks etc. were provided to local people under Micro-Enterprise Development for Poverty Alleviation (MEDPA) program.

For provincial ministries, education tourism, health and transport have been identified as prioritized sectors to be included for entrepreneurial development programs.



Academic institutions

Academic institutions are establishing incubation centers, conducting events and programs related to entrepreneurship, business plan competitions, Hult Prize amongst others to foster the culture of start-up culture and entrepreneurships. There are entrepreneurship courses for BBA and MBA graduates but there are no practical sessions provided for the students. However, there are components of internship and industrial visits. Interactions amongst SMEs, start-ups, business tycoons are organized for the students for idea generation and motivation but these events are very rare.



Business umbrella organization

FNCCI has been conducting skill training and providing business motivation sessions to young people specially in close coordination with colleges and women groups. They have been lobbying with the government to ease the business issues and challenges faced by businesses. To showcase Mithila paintings and handicrafts mostly prepared by women, a concept of Koseli Ghar has been developed. FNCCI has prioritized religious tourism and agriculture for entrepreneurial development programs in different districts of Madhesh Province.



Financial institutions

Through Nepal Rastra Bank, the Government of Nepal has made provision that banks should provide subsidized loans to uplift start-ups and SMEs. Likewise, banks have started to provide financial literacy/ loan schemes for SMEs but yet to materialize for start-ups.



Others

Local businesses have identified the space for start-up as it has started to become a buzzword. There is a growing willingness and motivation to do something on their own. However, the start-ups are yet to receive support and encouragement from the government and relevant stakeholders and a conducive environment is yet to be developed.

³⁸ National Youth Policy 2072: <https://bit.ly/3OFsug7>

³⁹ Youth Vision-2025: <https://bit.ly/3MxtgOM>



Figure 4: Environmental concerns in Madhesh Province, solid waste being prominent

3.2.3 Challenges identified for establishing enterprises

Some of the challenges identified for establishing enterprises at different levels are:

- Government: Lack of budgeted programs according to the policies created.
- Academic institutions: Collaboration with ecosystem actors in conducting experiential activities for students pursuing business studies is lacking.
- Business umbrella organizations: Not enough activities targeting young people who are interested in starting their businesses.
- Financial institutions: Liquidity crisis in the current scenario, however, not taking risking approach of disbursing loans to start-up in general.
- Others: Difficult in accessing technology and finances

3.3 Pressing environmental and climate concern of the municipal bodies

The pressing environmental issues varied per municipal body. In Janakpurdham, solid waste, sound pollution, and road drainage issues were prominent. In different municipal bodies, pressing environmental

issues range from air pollution, water pollution, and solid waste (Annex 1). Every municipal body shared that there was an increasing occurrence flood that has further added to the issue of waste management.

4. PERCEPTION OF STAKEHOLDERS

This chapter provides the perception of stakeholders in the realms of DRR and CCA as well as in the entrepreneurship ecosystem.

4.1 Disaster Risk Reduction and Climate Change Adaptation

With regards to the perception of the province and municipal bodies that the systems, policies, plans, and capacities supported by the interventions are in place, the GTSs range from -60 to 50 (Traffic light mechanism of the score in Table 4).

There is a high agreement regarding the importance of DRRM and CCA related data for decision making, policies/plans playing an important role in DRRM and CCA, youths' role in policymaking and GESI responsive province/municipal bodies' policies/plans/activities being in place. This reflects an acknowledgment by the provincial and municipal bodies regarding

the relevance and importance of these measures. However, with regards to having digital records of damage and loss and activeness of DMC at the province or municipal level, the degree of agreement is lower. The activities on the ground regarding disaster risk management are less frequent and are more response-based. Besides, DRRM and CCA policies/plans being in place have received a mid-point score signifying the lack of adequate policies/plans in place for DRRM and CCA. Additionally, with regards to the understanding of disaster risk and handling of BIPAD Portal, a tendency of disagreement is reflected.

Table 4: Traffic light mechanism of the perception of province and municipal bodies about the systems, policies, plans, and capacities supported by the interventions in place

Understanding of handling BIPAD Portal	Understanding of disaster risk	Acknowledgement of relevance of DRRM and CCA related data for decision making
	Availability of digital records of damage and loss data	Acknowledgement that policies/plans play an important role in DRRM and CCA
	Province/municipal bodies have DRRM and CCA policies/plans in place	Importance of the role of youth and young professionals in policy making
	Disaster Management Committee activeness at the province/municipal bodies	GESI responsive, province/municipal bodies policies/plans/activities in place.

4.2 Entrepreneurial Ecosystem

With regards to the perception of NYC and the Province that the systems, policies, plans, and capacities supported by the interventions are in place, the GTSS have ranged from -100 to 100 (Traffic light mechanism of the score in Table 5).

100% agreement on the need to create an entrepreneurial space to address environmental and climatic concerns is exhibited. In agreement with the statement, family and community are supportive of start-ups reflects that there is a supportive entrepreneurial environment

within the immediate relations.

However, there is a lack of youth engagement programs for promoting their participation, lack of close working relations between the provincial government and NYC, and a lack of government approaches to facilitate innovative products or services into the market. Besides, an understanding of the incubation center is lacking. Entrepreneurship and start-ups also do not have easy access to loans and finance. These are all indicated by high negative GTSS.

Table 5: Traffic light mechanism of the perception of NYC and province about the systems, policies, plans, and capacities supported by the interventions in place

Provincial government/NYC has put in place youth engagement programs to promote their participation.		There is a need to create an entrepreneurial space to address environmental and climatic concerns.
Provincial government and NYC have close working relations.		Your family and community are supportive of your start-ups.
Government's approach facilitates innovation products/services being efficiently brought to market.		
Have an understanding on running an incubation center.		
Entrepreneurship and start-ups have easy access to loan and finance (posed to government bodies)		
Entrepreneurship and start-ups have easy access to loan and finance (banking and financial institutions)		
There is easy access to loan and financial support for entrepreneurship and start-ups.		
Government's approach facilitates innovative products/services being efficiently brought to market.		

5. RECOMMENDATION FROM THE BASELINE STUDY

In this chapter, recommendations on DRRM and CCA and for entrepreneurial context have been provided.

DRRM and CCA context

- As activities and programs pertaining to climate change adaptations have not been conducted in the municipal bodies, more emphasis should be given to CCA training and sensitization.
- DRR and CCA should be streamlined into one coherent policy at the local level. This can be done with the technical support from other organizations and stakeholders, if necessary.
- None of the IT Officers had received any training with regards to BIPAD Portal although it was opined that training would be fruitful. Likewise, Bahudarmai Municipality and Ishworpur Municipality still recorded information on damage and loss caused by the disaster in hard copy format. Proper training on how to systematically enter digital data should be given to these municipal bodies.
- Since none of the municipal governments had carried out hazard and risk mapping or assessment, it is paramount that such assessments are carried out.

Entrepreneurial context

- Given the recent focus on start-up promotion and funding from the Government's side, incubators, accelerators, and Business Development Services (BDS) providers should not only solicit the endorsement from the relevant bodies/units/programs under various Government entities/agencies but should also try to obtain funds. Such relevant Government entities are the Ministry of Cooperatives and Poverty Alleviation, Nepal Rastra Bank, Ministry of Industry (MOI), Ministry of Finance (MoF), Department of Cottage and Small Industries and National Planning Commission (NPC), units within Government agencies which are dedicated to the promotion and welfare of start-ups and entrepreneurial ecosystem.
- It is recommended that such an incubation center should be formed through a collaboration of multiple stakeholders (Table 6). Given the institutional identity, mission, reach, fund, infrastructure, relationships, and a bigger role of government agencies and willingness, it is recommended to bring in FNCCI (naturally local chapters of NYEF would be the best unit) as the major collaborator (patron/ co-sponsor) of such incubation center. Other associations such as the National Micro Entrepreneurs Federation Nepal (NMEFN), Federation of Women Entrepreneurs Associations of Nepal (FWEAN), Federation of Nepalese Chamber of Commerce and Industry (FNCSI) are more connected to Micro and Small Enterprises and thus, they should be also brought within the bracket of partnership/ collaboration.
- It is recommended that incubators should have some fees for the participation of beneficiaries. However, the collection of diversified funds from other sources such as grants, government funds, funds of trade/business associations, and CSR funds of the big businesses/ industries should be promoted.
- Academic institutions have been criticized for lacking courses and education which is friendly for the development of entrepreneurial culture. Academic institutions having business/ management related courses have human resources as faculties who can be integrated into the training, mentoring, and coaching services. The trend of having start-up incubation centers within colleges is also taking place in Kathmandu Valley. Interventions could also be designed to help Academic institutions in the corridor initiate such incubators.

Table 6: Various actors who can contribute to various functions of such incubation center

S.N.	Key actors	Functions of start-up incubators
1	All Actors (led by the Primary Collaborator such as FNCCI)	Sensitization and encouragement for start-up ideas from prospective entrepreneurs (from all socio-economic strata)
2	Industry/Business Associations, Large Businesses/ Industries, Successful Entrepreneurs, Individual Academicians or Trainers	Support services to convert ideas into a viable business (Trainings, Mentoring, Coaching etc.)
3	Industry/ Business Associations and BFIs	Help to find seed fund and networking
4	Industry/ Business Associations	Provide infrastructural support such as workplace (co-working space), internet etc.
5	Industry/Business Associations, Big Businesses/ Industries, Successful Entrepreneur, Individual Academicians, Trainers	Value added training/ workshops on start-up and business management.
6	MSME (Similar Service Providers) and Individual Trainers	Value added supports such as legal, accounting, launching, promotion etc.

6. CONCLUSION

In this chapter, the conclusions and limitations of the baseline study have been outlined.

This baseline study has enabled the identification of the status of NYCAGG project-defined indicators related to project impact, outcome, and output in Madhesh Province. The study made use of desk reviews, field surveys, and telephone surveys to conduct this study. The summary of the findings in relation to the indicators is presented in the following table.

Table 7: Logical framework with the baseline value for Madhesh Province (only the indicators assessed through this baseline survey are presented here)

	Result Chain	Indicator	Baseline (value & reference year)
Impact (Overall Objective)	To promote Nepali youth inclusion in climate action and green economy in post-COVID recovery of Nepal	OO1: Representatives of the National Youth Council and the Palikas considering that the conditions for a better inclusion of youth in climate action and green economy have improved as a result of the intervention	Ground Truth Score = 17.79
Outcome (Specific Objective)	Increased participation of Nepali youth in governance, entrepreneurship and advocacy in climate action in Madhesh, Karnali, and Sudurpaschim provinces	SO1.4: Number of innovation labs established that are operated by provincial governments	0 (2021)
Outputs	Output 1.3: Increased awareness and capacities of provincial and municipal elected representatives and government officials on DRRM and CCA	OP 1.3.2: No of people sensitized on climate and disaster by young people at municipal and provincial level	0 (2021)
	Output 1.4: Upgraded and updated DRR and CC-related plans at the municipal level and integrated DRR and CC related datasets into BIPAD portal	OP 1.4.1: Number of government policies drafted with civil society organization participation through EU support	0 (2021)
	Output 1.5 Opportunities created by the intervention for youth entrepreneurship, employment, and mentorship in the market of green economy and climate resilience	OP 1.5.2: Number of entrepreneurial ventures developed under thematic area undertaken by young people	0 (2021)

Overall, there were limitations in the baseline study. These are:

- DRR Focal Person could not be interviewed from all municipal bodies. Hence, some insights into the disaster scenario of the municipal bodies might have been missed.
- Due to constraints in budget and time availability, field surveys were limited to Janakpurdham and Loharpatti Municipality. For the remaining eight municipalities, telephonic surveys were conducted. The method of conducting surveys through telephone has its constraints as it does not allow for visual observations.
- There were different types of entrepreneurial stakeholders but due to constraints in time, a large sampling could not be conducted. Hence, the perceptions needed to be derived from a limited survey.
- The survey was conducted in nine municipalities and one municipal official with mostly one official as a representative of the municipality. Hence, the findings and recommendations cannot be generalized to other municipalities of the country.

7. ANNEXES

Annex 1: Questionnaires to provincial office and municipal bodies pertaining to disaster and climate

S.N.	Questions	Coding categories	Code	Instructions/ remarks
Understanding of disaster and DRRM				
1	What are the most frequently happening disasters at the province/palika? <i>For example: flood, fire, animal attack and so on.</i>			List down the frequently happening hazards
2	Has your municipality carried hazard and risk mapping or assessment?	Yes		
		No		
3	What is your understanding of disaster risk?	Strongly Disagree	1	(If the response covers about hazard, risk, vulnerability, exposure and coping capacity – Strongly Agree ; covers hazard, vulnerability, and exposure – Agree ; know the term but not the in-depth understanding – Neutral ; very little understanding – Disagree ; no understanding – Strongly Disagree)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
Data storage/sharing practices				
4	The province/palika have digital records of damage and loss data. (Indicator 001)	Strongly Disagree	1	(Have digital records of seasonal disaster – Strongly Agree ; Have digital records of disaster but not seasonal – Agree ; Available but not sufficient – Neutral ; available but in hard copy – Disagree ; Not available at all – Strongly Disagree .) If agree and strongly agree, ask question 5. If strongly disagree and disagree, ask question 6.
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
5	What medium do you use to digitally collect and record damage and loss data? <i>For example: ODK Collect, Kobo Toolbox, Initial Rapid Assessment, etc.</i>			Note the response
6	How is information on damage and loss caused by disaster recorded at the province/palika? <i>For example: Excel Sheet, Hard Copy, etc.</i>			Note the response

7	For decision making, DRRM and Climate Change Adaptation (CCA) related data are highly important. (Indicator 001)	Strongly Disagree	1	
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
7	What is the data-sharing mechanism between province, district, and palika?			Note the response.
8	Have you heard of BIPAD Portal or DRR Portal?	Yes		If yes, ask question the following question. Also, asked the IT officer
		No		
9	Have the municipal elected representatives and officials been trained/sensitized on BIPAD Portal?	Yes		If yes, ask the following question. Also, asked the IT officer
		No		
10	How many municipal elected representatives and officials have been trained/sensitized on BIPAD portal? (Indicator OP1.3.1)			Also, asked the IT officer
11	Has the province/municipality integrated data into BIPAD portal?	Yes		
		No		
12	You have an understanding of handling BIPAD Portal. (Indicator 001)	Strongly Disagree	1	(Has the understanding of six modules of BIPAD Portal, can upload and download data and use it for analysis and decision making – Strongly Agree ; Can upload and download BIPAD portal data and knows about six modules but understanding of each modules is not sufficient – Agree ; has accessed it but doesn't know much - Neutral ; has heard of BIPAD portal but not used it – Disagree ; doesn't know about BIPAD portal – Strongly Disagree .) Also need to ask this question the IT officer.
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
Municipal government capacity building				
13	Have the municipal elected representatives and officials been trained/sensitized on DRRM, and CCA?	Yes		If yes, ask the following question.
		No		
14	How many municipal elected representatives and officials have been trained/sensitized on DRRM and CCA? (Indicator OP1.3.1)			

Policies, plans, and committees				
15	Province/palika have DRRM and CCA policies/plans in place. (Indicator 001)	Strongly Disagree	1	(Have endorsed, adopted, and implemented DRRM and CCA policies – Strongly Agree ; understands the need and have formulated the policy and in the process of endorsement – Agree ; policy development is under discussion – Neutral ; not under discussion – Disagree ; doesn't see the need of policies – Strongly Disagree .)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
16	What are the DRRM and CCA policies endorsed by the province/palika?			List down the mentioned policies.
17	Does the province/palika have endorsed provincial/palika level DRRM act?	Yes		If yes, ask the following question.
		No		
18	When was the provincial/palika level DRRM act endorsed?			
19	Is there a department/section/unit dedicated to disaster and climate change?	Yes		Also ask if the disaster and climate change department/section/unit are same or different?
		No		
20	Does the province/palika have Disaster Management Committee?	Yes		If yes, ask the following question.
		No		
21	Disaster Management Committee meets once a month and is active at the province/palika. (Indicator 001)	Strongly Disagree	1	(If meets every month – Strongly Agree ; meets every three months – Agree ; meets on need base – Neutral ; committee was established but hasn't hold any meeting – Disagree ; Committee is inactive since last one year – Strongly Agree .)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
22	Does the status of the development of LDCRP/LDRMP in palika?	Not Started		Also ask, if they have endorsed LAPA and have carried out VCA? If yes, ask the following question.
		Endorsed		
		In review		
23	When was the LDCRP/LDRMP endorsed?			

24	Has LDCRP Committee handed over its roles and responsibility to Disaster Management Committee?	Yes		
		No		
25	Status of LEOC/MEOC	Established		If established, ask the following question.
		In process of establishing		
		Not established		
26	When was LEOC/MEOC established?			
27	How many staff are there?			Who they are?
28	Policies/plan play an important role in DRRM and CCA. (Indicator 001)	Strongly Disagree	1	
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
29	Through the EU's support, have civil society organization technically supported provincial/palika in DRRM and CCA related policy development? (Indicator OP1.4.1)	Yes		If yes, ask the following question.
		No		
30	Which policies have they supported? (Indicator OP1.4.1)			List down the policies and count them to match with indicator OP1.4.1
31	The role of youth and young professional in policy making is important. (Indicator 001)	Strongly Disagree	1	
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
32	Province/palika policies/plans/activities are Gender Equality and Social Inclusion (GESI) responsive. (Indicator 001)	Strongly Disagree	1	(If policies/plans/activities that are GESI responsive are adopted and implemented – Strongly Agree ; are in plan and in process of adoption – Agree ; are under discussion for policy – Neutral ; Not under discussion – Disagree ; need is not recognized – Strongly Disagree)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	

Environmental Concerns				
33	The major environmental concerns of the province are:	Waste disposal and management		If other, list them down (Ask this question to the province government)
		Air pollution		
		Plastic pollution		
		Water pollution		
		Biodiversity and Land use		
		Deforestation		
		Other		
ICT and human resources				
34	IT officer available	Yes		Is the IT officer full time or part time?
		No		
35	DRR Focal Person available	Yes		Is the DRR focal person full time or part time?
		No		
36	ICT facilities like Internet and computers	Yes		Also the internet speed.
		No		

Annex 1.1: Responses from the relevant stakeholders to the questionnaires of Annex 1.

Questions	Bahudarmai	Pokhariya	Prasauni	Suwarna	Garuda	Phatuwa Bijayapur	Haripur	Ishworpur	Loharpatti	Janakpurdham
What are the most frequently happening disasters in the province/palika?	Flood and inundation	Cold wave, flood, fire	Flood	Flood	Flood, fire	Flood	Fire, flood	Flood	Flood and inundation	Floods, Inundation, Fire
Has your municipality carried hazard and risk mapping or assessment?	No	No	No	No	No	No	No	No	No	No
What is your understanding of disaster risk?	2	4	4	2	2	2	2	2	2	4
The province/palika have digital records of damage and loss data. (Indicator 001)	2	4	4	4	4	4	4	2	4	4
What medium do you use to digitally collect and record damage and loss data?	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment	Initial Rapid Assessment
How is information on damage and loss caused by disaster recorded at the province/palika?	Hard copy	Word document	Excel sheet	Word document	Word	Word	Word document	Hard copy	Word document	Word document or sometimes excel sheet transferred through emails
For decision making, DRRM and Climate Change Adaptation (CCA) related data are highly important. (Indicator 001)	4	4	4	4	4	4	4	4	4	4

What is the data-sharing mechanism between province, district, and palika?	Not sent to anyone	Email correspondence with district and province	Email correspondence with concerned Ministry at province level	Email correspondence to district mostly	Email correspondence with district and province	Email correspondence to district and province	Email correspondence with district	Not sent to anyone	Email correspondence to district mostly	Province gets email from district which is then sent again to central government
Have you heard of BIPAD Portal or DRR Portal?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Have the municipal elected representatives and officials been trained/ sensitized on BIPAD Portal?	No	No	No	No	No	No	No	No	No	No
How many municipal elected representatives and officials have been trained/ sensitized on the BIPAD portal? (Indicator OP1.3.1)	They know of this through their own and not through trainings	Don't know	They know of this through their own and not through trainings	They know of this through their own and not through trainings	Don't know	Don't know	They know of this through their own and not through trainings	They know of this through their own and not through trainings	They know of this through their own and not through trainings	They know of this through their own and not through trainings
Has the province/ municipality integrated data into the BIPAD portal?	No	No	No	No	No	No	No	No	No	No. Police does it
You have an understanding of handling BIPAD Portal. (Indicator 001)	2	1	2	2	2	1	2	2	2	2
Have the municipal elected representatives and officials been trained/ sensitized on DRRM, and CCA?	Not trained but know bits of information	Not trained	Not trained but know bits of information	Not trained but know bits of information	No	Yes	A training conducted one from district	Not trained but know bits of information	Not trained but know bits of information	Not trained but know bits of information

How many municipal elected representatives and officials have been trained/ sensitized on DRRM and CCA? (Indicator OP1.3.1)	0	0	0	0	0	0	0	0	0	0
Province/Palika have DRRM and CCA policies/ plans in place. (Indicator 001)	2	5	5	2	2	1	2	2	4	5
What are the DRRM and CCA policies endorsed by the province/palika?		DRR act, fund mobilization directive	DRR Act						Disaster risk action plan	DRRM act present but the development of new one is process. CCA in sectoral form like the forest act has a CC component. Disaster plan for disaster made but failed to be approved. Also has a Monsoon Preparedness Plan from USAID UNFPA/ IOM's support
Does the province/palika have endorsed provincial/palika level DRRM act?	No	Yes	Yes	Yes	No	No	No	No	No	Yes
When was the provincial/palika level DRRM act endorsed?		2078	2075	2078					4 years back	2075
Is there a department/ section/unit dedicated to disaster and climate change?	No	Yes	Yes	No	No	No	No	No	No	Yes. Bipad tatha Janayodh Sakha

Does the province/palika have a Disaster Management Committee?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
The Disaster Management Committee meets once a month and is active at the province/palika. (Indicator 001)	4	4	4	4	2	4	4	4	4	4
What Is the status of the development of LDCRP/LDRMP in palika?	Not started	Not started	Not started	Not started	Not started	Not started	Not started	Not started	Not started	
When was the LDCRP/LDRMP endorsed?										
Has the LDCRP Committee handed over its roles and responsibility to the Disaster Management Committee?										
Status of LEOC/ MEOC	Not established	Not established	Not established	Not established	Not established	Not established	Not established	Not established	Talks on established circulating	PEOC
When was LEOC/MEOC established?										
How many staff are there?										Handled by one police
Policies/ plans play an important role in DRRM and CCA. (Indicator 001)	4	4	4	4	4	4	4	4	4	4

Through the EU's support, have civil society organizations technically supported provincial/palika in DRRM and CCA related policy development? (Indicator OP1.4.1)	No	No	No	No	No	No	No	No	No	No
Which policies have they supported? (Indicator OP1.4.1)									But there is another project called Bahuchetriya Posand Activity	
The role of youth and young professionals in policy making is important. (Indicator 001)	4	4	4	4	4	4	4	4	4	4
Province/palika policies/plans/activities are Gender Equality and Social Inclusion (GESI) responsive. (Indicator 001)	4	4	4	4	4	4	4	4	4	4
The major environmental concerns of the province are:		Air pollution			Water pollution, solid waste, deforestation				Solid waste	Solid waste, drainage issues, sound pollution
IT officer available	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
DRR Focal Person available	No	Yes	Yes	No	No	Yes	No	No	Yes	Yes
ICT facilities like Internet and computers	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

Annex 2: Questionnaires to entrepreneurial stakeholder

S.N.	Questions	Coding categories	Code	Instructions/remarks
For government bodies (provincial ministries/ Chamber of industries/Federations/Associations) and NYC				
1	Are there policies placed to promote entrepreneurship?	Yes No		If yes, do ask if the policy can be shared?
2	Provincial government/NYC has put in place youth engagement programs to promote their participation. (Indicator 001)	Strongly Disagree Disagree Neutral Agree Strongly Agree	1 2 3 4 5	(If programs are designed, developed, and implemented by the government/NYC on yearly basis – Strongly Agree; programs are implemented through external support – Agree; programs are being planned – Neutral; No programs planned – Disagree; Doesn't see the need of such programs – Strongly Disagree) If agree and strongly agree, ask the following question.
3	What are the activities for youth engagement and their capacity building?			Note down the response.
4	Provincial government and NYC have close working relation. (Indicator 001)	Strongly Disagree Disagree Neutral Agree Strongly Agree	1 2 3 4 5	(If provincial government and NYC meet on regular basis and have implemented programs together – Strongly Agree; have meetings and visits about twice a year - Agree; have meeting sometimes – Neutral; Have no working relation – Disagree; Doesn't see the need of working together – Strongly Disagree)
5	Government's approach facilitates innovation products/services being efficiently brought to market. (Indicator 001)	Strongly Disagree Disagree Neutral Agree Strongly Agree	1 2 3 4 5	(If government's approaches (clearly mentioned agricultural super zones, tourism centers etc.) are put in place to provide access to market and are successfully running – Strongly Agree; plans are put in place – Agree; plans are under discussion – Neutral; there is no plan – Disagree; there is no need of plan – Strongly Disagree)
6	Have you conducted activities/programs/projects specifically on entrepreneurship and start-ups in the past?	Yes No		If yes, ask the following question.
7	List of activities/programs/projects and who were your key partners?			Note down the response.
8	Are there innovation labs and/or incubation spaces established at the provincial level? (Indicator SO1.5)	Yes No		If yes, ask the following question.
9	What are innovation labs/incubation spaces and who is running and financing them?			Note down the response.
10	Progress status in setting up innovation labs			Note down the response. Ministry that has its priority in establishing innovation labs.

11	Have an understanding on running incubation center (Indicator 001)	Strongly Disagree	1	(If has incubation center in operation – Strongly Agree; has developed plans for running the center – Agree; has heard of incubation center - Neutral; No understanding – Disagree; Does see the need – Strongly Disagree)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
12	What are your current plans related to entrepreneurship and start-ups for Madhesh Province?			Note down the response.
13	Are there entrepreneurial ventures developed under thematic area of green growth, sustainability by young people? (Indicator OP1.5.2) For example: waste management, recycling, minimizing plastic waste, alternative for plastic, low carbon farming and more.	Yes		If yes, do ask how many and what are they to respond to indicator OP1.5.2.
		No		
14	There is a need to create an entrepreneurial space to address environmental and climatic concerns. (Indicator 001)	Strongly Disagree	1	If Agree and Strongly Agree, ask the following question.
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
15	Is there budget allocation for entrepreneurship and start-ups development?	Yes		
		No		
16	Entrepreneurship and start-ups have easy access to loan and finance. (Indicator 001)	Strongly Disagree	1	(If financing policies are developed and financing schemes are put in place and are providing financial support to start-ups – Strongly Agree; financing schemes are available but not in policy level – Agree; schemes are in discussion – Neutral; no such policies and schemes exist – Disagree; no need of such policies and schemes – Strongly Disagree.)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
17	What are the major prioritized sectors to be included for entrepreneurial development programs in different districts of Madhesh Province?			Note down the response.
Banking and financial institutions				
1	Have you conducted financial literacy/ loan schemes specifically focusing on start-ups and SMEs in the past?	Yes		If yes, ask the following question.
		No		
2	Details on program and loan schemes and who were your key partners?			

3	Entrepreneurship and start-ups have easy access to loan and finance. (Indicator 001)	Strongly Disagree	1	(If financing policies are developed and financing schemes are put in place and are providing financial support to start-ups – Strongly Agree; financing schemes are available but not in policy level – Agree; schemes are in discussion – Neutral; no such policies and schemes exist – Disagree; no need of such policies and schemes – Strongly Disagree.)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
4	Do you have any loan schemes specifically for start-ups and SMEs?	Yes		If yes, ask for more details? Data on loan disbursement to start-ups and SMEs.
		No		
5	Are there any sector focused activities performed by your organization in start-ups and SMEs?	Yes		If yes, ask the following question.
		No		
6	List down the sector specific program with its location (municipality)?			
7	Is your organization open to collaborating with other organizations to develop entrepreneurship and start-ups?	Yes		
		No		
8	What is your understanding of incubation centers?			Note down the response.
Academic Institution (BBA/Business Colleges)				
1	Do you teach courses on entrepreneurship and business development?	Yes		If yes, ask the following question.
		No		
2	Are there practical sessions designed? What is the modality?			
3	Are there any entrepreneurship programs or events related to current activities in your college?	Yes		
		No		
4	Has the college conducted any activities related to entrepreneurship development in the past?	Yes		If yes, ask how frequently they are organized and what kind of activities they are.
		No		
5	Are there upcoming (in planning process) activities related to entrepreneurship development?	Yes		
		No		
6	What is your understanding of incubation centers?			Note down the response.
7	Do you know about Hult Prize/Idea Studio or similar entrepreneurship events?	Yes		If yes, ask the following question. Mention the name of similar events.
		No		
8	Have the students participated in the program organized by Hult Prize/ Idea Studio or similar entrepreneurship events?	Yes		If yes, how many students have participated, and what has been their general experience.
		No		

Business person/start-up				
1	Have you received training/ workshop on entrepreneurship and start-ups?	Yes		If yes, ask the following question.
		No		
2	What was it and who did it?			Note down the response.
3	There is an easy access to loan and financial support for entrepreneurship and start-ups. (Indicator 001)	Strongly Disagree	1	(If financing policies are developed and financing schemes are put in place and are providing financial support to start-ups – Strongly Agree; financing schemes are available but not in policy level – Agree; schemes are in discussion – Neutral; no such policies and schemes exist – Disagree; no need of such policies and schemes – Strongly Disagree.)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
4	Government's approach facilitates innovative products/services being efficiently brought to market. (Indicator 001)	Strongly Disagree	1	(If government's approaches (clearly mentioned agricultural super zones, tourism centers etc.) are put in place to provide access to market and are successfully running – Strongly Agree; plans are put in place – Agree; plans are under discussion – Neutral; there is no plan – Disagree; there is no need of plan – Strongly Disagree)
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
5	Your family and community are supportive of your start-ups. (Indicator 001)	Strongly Disagree	1	In your opinion, what is the culture of entrepreneurship in your local region?
		Disagree	2	
		Neutral	3	
		Agree	4	
		Strongly Agree	5	
6	How do the family and students, society perceive entrepreneurship and start-ups?			
7	What is your understanding of incubation centers?			Note down the response.
8	Is there enabling environment for thriving entrepreneurship in the area?	Yes		
		No		
9	What are your current challenges and issues?			Note down the response.
10	Are there entrepreneurial ventures developed under the thematic area of green growth, sustainability by young people? (Indicator OP1.5.2)	Yes		If yes, do ask how many and what are they to respond to indicator OP1.5.2.
		No		
11	If someone was to offer you a job, would you choose that.	Yes		
		No		

Annex 2.1: Responses from the relevant stakeholders to the questionnaires of Annex 1.

Questions for government bodies (provincial ministries/ Chamber of industries/Federations/ Associations)	State Minister (Land management, agriculture and cooperative)	Janakpur Udhog Banijya Sangh	NYC
Are there policies placed to promote entrepreneurship?	There are no policies to promote entrepreneurship.	There are no policies to promote entrepreneurship.	Yes. National Youth Policy 2072 has one of its objectives to highlight the competence inherent in the youth class by establishing them as the basic power of the nation through the development of creativity, entrepreneurship, and investigative competence in them. To implement National Youth Policy 2072, Youth Vision-2025 (ten-year strategic plan) has been put in place – Youth Vision 2025 has five strategic pillars and Pillar 2: Employment, Entrepreneurship, and Skills Development directly touches on entrepreneurship.
Provincial government/NYC has put in place youth engagement programs to promote their participation. (Indicator 001)	1	1	4
What are the activities for youth engagement and their capacity building?	Increasing agriculture production, tourism promotion (cultural), promotion of cottage industries and fish farming in a sustainable and innovative way are some of the works that have been done.	Skill training and business motivation for young people have been conducted. Likewise, works are underway to coordinate with police and municipality on drug abuse which has led to increasing theft in the area.	Youth interaction program, motivation program, and Innovation Idea Hunt programs have been conducted. Likewise, NYC has provided training on establishing incubation hubs at provincial levels and have also provided funding
Provincial government and NYC have close working relations. (Indicator 001)	1	1	4
Government's approach facilitates innovation products/services being efficiently brought to market. (Indicator 001)	1	1	4
Have you conducted activities/programs/projects specifically on entrepreneurship and start-ups in the past?	It has not been conducted but planning is underway.	No activities have been conducted on this front.	NYC has provided entrepreneurship training to youth and linked them to financial institutions. However, for these training, NYC should be invited by the municipalities that have groups of youth who are interested in such training.
List of activities/programs/projects and who were your key partners?	Fish farming, religious and cultural tourism promotion, forestry promotions, and promoting agricultural production have been planned. It is envisioned to make Madhesh Province, the food grain of Nepal. All the activities are conducted through line ministries, departments and local and international bodies.	Lobbying with the government to ease the business issues and challenges faced by businesses have been conducted. In partnership with the municipality, land was obtained for establishing a vegetable center from a guthi as the land prices are quite high in Janakpur.	NYC has worked closely with local and provincial governments, in partnership with selected school and academic institutions, and NGO and INGOs.

Are there innovation labs and/or incubation spaces established at the provincial level? (Indicator SO1.5)	Innovation labs and/or incubation spaces have not been established at the provincial level.	Innovation labs and/or incubation spaces have not been established at the provincial level.	Innovation labs and/or incubation spaces have not been established at the provincial level.
What are innovation labs/incubation spaces and who is running and financing them?	NA	NA	Training has been provided on how to operate and run incubation spaces, however they are yet to be operational at provincial level.
Progress status in setting up innovation labs	No progress has been made.	No progress has been made.	Yet to be set up. The Ministry of Social Development is the concerned ministry.
Have an understanding on running incubation center (Indicator 001)	1	1	4
What are your current plans related to entrepreneurship and start-ups for Madhesh Province?	Do not know.	A concept of 'Koseli Ghar' where visitors can buy Mithila paintings and handicrafts is being developed. Local women will contribute to making the painting and handicrafts.	For Madhesh province specifically, NYC has program on enhancing science and technology for youth
Are there entrepreneurial ventures developed under the thematic area of green growth, sustainability by young people? (Indicator OP1.5.2) For example: waste management, recycling, minimizing plastic waste, alternatives for plastic, low carbon farming and more.	There has been no development of entrepreneurial ventures.	There has been no development of entrepreneurial ventures.	NYC last listed enterprises of Madhesh Province that have received subsidized loans to carry forward, however if they are under the thematic area of green growth and sustainability by young people is yet to be determined.
There is a need to create an entrepreneurial space to address environmental and climatic concerns. (Indicator 001)	5	5	5
Is there a budget allocation for entrepreneurship and start-ups development?	Yes, NPR. 20 crores have been allocated in the red book of Agriculture ministry	Some budgets have been allocated for youth motivation and skill training but specific budget allocation for entrepreneurship and start-up development has not been conducted.	Yes, there is provision of loan up to NPR. 5 lakhs but the obtaining process for regular youth is not easy.
Entrepreneurs and start-ups have easy access to loans and finance. (Indicator 001)	1	1	2
What are the major prioritized sectors to be included for entrepreneurial development programs in different districts of Madhesh Province?	Education, tourism, health and transport are the major prioritized sectors to be included for entrepreneurial development programs	Religious tourism and agriculture are the most prioritized sectors to be included for entrepreneurial development programs in different districts of Madhesh Province.	Agriculture, vegetable farming, animal husbandry, art and craft are the major prioritized sectors to be included for entrepreneurial development programs in different Madhesh Province.

Questions to banking and financial institutions	Siddhartha Bank, Dhanusha	Kumari Bank, Dhanusha	Nabil Bank, Dhanusha
Have you conducted financial literacy/ loan schemes specifically focusing on start-ups and SMEs in the past?	Financial literacy/ loan schemes have been conducted for SMEs but not startups.	Financial literacy/ loan schemes have been conducted for SMEs and MSMEs.	No such activities have been conducted.
Details on program and loan schemes and who were your key partners?	Loan schemes as guided by NRB have been issued and there is training on taxes, loan compliances, VAT, book keepings etc. by inhouse staff itself.	Financial literacy provided through auditors and in-house staff.	It is all managed by the Head office.
Entrepreneurs and start-ups have easy access to loans and finance. (Indicator 001)	1	1	1
Do you have any loan schemes specifically for start-ups and SMEs?	There are no local schemes for start-ups but for SMEs 'Saral Karja' schemes exist.	No, there are no loan schemes specifically for start-ups and SMEs.	For startups there are no loan schemes. However, there is a policy released by NRB circular which I am not very aware of.
Are there any sector focused activities performed by your organization in start-ups and SMEs?	Not yet, only the head office has the authority to do this.	No, majority of business are focused on trading such as cable wires, fancy shops, hardware, jeweler shops	There are no sector focused activities.
List down the sector specific program with its location (municipality)?	There are no specific programs with specific locations. Loans are issued as per NRB and bank's compliances.	There are no specific programs or locations.	There are no specific programs or locations.
Is your organization open to collaborating with other organizations to develop entrepreneurship and start-ups?	Not much openness to collaboration.	Yes, if there is a need and if NRB directs in that way.	Cannot answer this as the branch manager has the authority
What is your understanding of incubation centers?	Do not know about this.	Do not know about this.	Grooming hub with training and arrangement according to interest

Questions to academic Institution (BBA/Business Colleges)	Model Multiple College	Monastic College	Rajarshi Janaki College
Do you teach courses on entrepreneurship and business development?	Yes, for BBA and MBA grads, there are entrepreneur courses.	Just syllabus related courses for BBS students.	Just syllabus related courses for BBS students.
Are there practical sessions designed? What is the modality?	Not exactly entrepreneur related practical just internship and business area visit	Internship and industrial visit only	Internship and industrial visit only
Are there any entrepreneurship programs or events related to current activities in your college?	Interaction between SME, young start-ups, business tycoons, and students for ideation	Workshop (guest lecture especially entrepreneurs, businessmen, business coach from Kathmandu and Bardibas) for students taught on scope of business, boosting morale	No, entrepreneurship programs or events related to current activities in your college.
Has the college conducted any activities related to entrepreneurship development in the past?	Promoted to watch financials talk shows to get informed about financial literacy	Brought guest speakers only, no other activities have been conducted yet.	No other activities have been conducted yet.
Are there upcoming (in planning process) activities related to entrepreneurship development?	Yes, dialogue between NYC, FNCCI, Chamber of commerce and students is upcoming.	No upcoming activities related to entrepreneurship development have been planned.	No upcoming activities related to entrepreneurship development have been planned.
What is your understanding of incubation centers?	Incubation centers are spaces where mentors and facilitators are provided.	Incubation centers are workspace for students to develop ideas and meet investors	Incubation centers are workplace.
Do you know about Hult Prize/Idea Studio or similar entrepreneurship events?	Have only seen Idea Studio but other platforms are unknown.	Do not know about Hult Prize/Idea Studio or similar entrepreneurship events.	Do not know about Hult Prize/Idea Studio or similar entrepreneurship events.
Have the students participated in the program organized by Hult Prize/Idea Studio or similar entrepreneurship events?	Yes, one student had participated in Idea studio Nepal's event and reached the 2nd round, whereas other students are also quite familiar with Idea Studio's events.	No, students have not participated in such programs.	No, students have not participated in such programs.

Questions to Business person/start-up	Komal Hotel Dhalkabar, Dhanusha
Have you received training/ workshops on entrepreneurship and start-ups?	No training has been received on entrepreneurship and start-ups.
What was it and who did it?	NA
There is easy access to loan and financial support for entrepreneurship and start-ups. (Indicator 001)	1
Government's approach facilitates innovative products/services being efficiently brought to market. (Indicator 001)	1
Your family and community are supportive of your start-ups. (Indicator 001)	4
How do the family and students, society perceive entrepreneurship and start-ups?	Entrepreneurship and start-ups have become buzzwords right now and it's the right time to start any business. It might be small but doing things on our own has a lot of opportunities in Madhesh Pradesh. Majority of people are going abroad but if they work harder here, they can earn more. Due to social media, television and all people are being motivated to do something on their own. If we could tap into the youths of Madhesh, we can get lots of opportunities. As I was doing my bachelors in India, I made sure to return back to Nepal and do something which would benefit everyone. That is how the Komal Hotel idea came as there was no good hotel and good service in Dhalkabar. Now it's loved by everyone.
What is your understanding of incubation centers?	It's a place where your ideas can be turned into reality and we are in need of these kinds of incubation centers in our province.
Is there an enabling environment for thriving entrepreneurship in the area?	As said earlier, we need to tap into the youths who are going abroad and look into our competitive advantage of Janakpurdham and sell the products and services accordingly. We need to change our education system as we do not have entrepreneurship courses even at the college level, which should have started from the school level. There should be good infrastructure such as roads, health, and education to foster entrepreneurship. There is a shortage of skilled semi-skilled manpower as many people are going abroad for less money.
What are your current challenges and issues?	I am a CA, and being CA I have faced a lot of challenges, I am sure other people also face the same problems and more than me. For instance, for the Business registration process, a lot of offices need to be visited and a lot of hurdles need to be crossed. There is also a lack of motivation from the government and the provincial government for developing the entrepreneurship sector. Likewise, there also exists a complex system of government's tax and VAT.
Are there entrepreneurial ventures developed under the thematic area of green growth, sustainability by young people? (Indicator OP1.5.2)	Start-ups, entrepreneurship trends are increasing but have not heard about green enterprises in Madhesh Pradesh.
If someone was to offer you a job, would you choose that?	No, I would not choose a job.

Note

Indicator 001	Percentage of the representatives of the National Youth Council and the Palikas considering that the conditions for a better inclusion of youth in climate action and green economy have improved as a result of the intervention
Indicator SO1.4	Number of innovation labs established that are operated by provincial governments
Indicator OP1.3.2	No of people sensitized on climate and disaster by young people at municipal and provincial level
Indicator OP1.4.1	Number of government policies drafted with civil society organization participation through EU support
Indicator OP1.5.2	Number of entrepreneurial ventures developed under thematic area undertaken by young people

Annex 3: Individuals consulted for the baseline study⁴⁰

S.N.	Name	Organization	Designation	Physical or Virtual	Gender	Rural/Urban	Ethnicity
1	Binod K. Yadav	Loharpatti Municipality	CAO	Virtual	Male	Urban	Madhesi
2	Pankaj Nabh Singh	IOM	Provincial Focal Point	Physical	Male	Urban	Others
3	Jitendra Kumar Mahaset	Janakpurdham Chamber of Industries	President	Physical	Male	Urban	Madhesi
4	Pramod Kumar Shah	Komal Hotel	Owner	Physical	Male	Urban	Madhesi
5	Khil Narayan Shrestha	Kumari Bank Limited	Branch Manager	Physical	Male	Urban	Janajati
6	Yogendra Ray Yadav	Land Management, Agriculture and Cooperative	State Minister	Physical	Male	Urban	Madhesi
7	Laxmeshwor Yadav	Loharpatti Municipality	Planning Assistant	Physical	Male	Urban	Madhesi
8	Amit Kumar Yadav	Loharpatti Municipality	IT Officer	Physical	Male	Urban	Madhesi
9	Sushil Kumar Yadav	Loharpatti Municipality	Education Coordinator	Physical	Male	Urban	Madhesi
10	Sujit K. Jha	Ministry of Industry Tourism Forest	Assistant Forest Officer	Physical	Male	Urban	Madhesi
11	Rajesh Kumar Mishra	Ministry of Industry Tourism Forest	Administrative Officer	Physical	Male	Urban	Madhesi
12	Shanta Chaudhary	Ministry of Internal Affairs and Communications	Law Officer	Physical	Female	Urban	Tharu
13	Shambhu Pokhrel	Model Multiple College	BBS/BBA Coordinator	Physical	Male	Urban	Others
14	Shiva Kumar Yadav	Siddhartha Bank	Branch Manager	Physical	Male	Urban	Madhesi
15	Satish Shah	Janakpur Women's Development Center	Manager	Physical	Male	Urban	Madhesi
16	Ratnesh Shashi	Ministry of Land Management, Agriculture & Cooperative	Under Secretary	Physical	Male	Urban	Madhesi
17	Pramod Kumar Shah	Monastic College	Principal	Physical	Male	Urban	Madhesi
18	Rajendra Khatiwada	Nabil Bank	SME Head	Physical	Male	Urban	Others
19	Dharmendra Jha	Rajarshi Janaki College	BBA Coordinator	Physical	Male	Urban	Madhesi
20	Bidur Pd. Upreti	Bahudarmai Municipality	CAO	Virtual	Male	Urban	Others
21	Mrigendra Yadav	Suwarna RM	Information Officer	Virtual	Male	Rural	Madhesi
22	Ruplal Devkota	Haripur Municipality	Information Officer	Virtual	Male	Urban	Others
23	Hirakajee Shrestha	Ishworpur Municipality	CAO	Virtual	Male	Urban	Janajati
24	Lal Mani Bhandari	JCI Nepal, Ktm	President	Physical	Male	Urban	Others
25	Suni Pd. Keshari	Prasauni RM	CAO	Virtual	Male	Rural	Madhesi
26	Ram Babu Yadav	Garuda Municipality	CAO	Virtual	Male	Urban	Madhesi
27	Bhup Narayan Yadav	Garuda Municipality	IT Officer	Virtual	Male	Urban	Madhesi
28	Shambhu K. Yadav	Phatuwa Bijapur Municipality	CAO	Virtual	Male	Urban	Madhesi
29	Hansh Kumar Yadav	Phatuwa Bijapur Municipality	IT Officer	Virtual	Male	Urban	Madhesi
30	Sandesh K. Yadav	Pokhariya Municipality	CAO	Virtual	Male	Urban	Madhesi
31	Kamala Gyawali	National Youth Council	Under Secretary	Physical	Female	Urban	Others

40 The list is in chronological order according to the interview conducted.

