



# **Gap Analysis in Line with the National REDD+ Readiness Process in Shan State, Myanmar**

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## **Acronyms**

AAS	Asia Air Survey
ASEAN	Association of Southeast Asian Nations
CBD	Convention on Biological diversity
CFDTC	Central Forestry Development Training Centre
CSOs	Civil Society Organizations
ECD	Environmental Conservation Department
EIA	Environmental Impact Assessment
FD	Forest Department
FFPRI	Forestry and Forest Products Research Institute
FLEGT	Forest Law Enforcement, Governance and Trade
FREL	Forest Reference Emission Level
FRI	Forest Research Institute
FRL	Forest Reference Level
GCF	Green Climate Fund
GHG	Green House Gas
ICIMOD	International Center for Integrated Mountain Development
INGOs	International Non-Government Organizations
ITTO	The International Tropical Timber Organization
KFS	Korea Forest Service

MCCSAP	Myanmar Climate Change Strategy and Action Plan
MONREC	Ministry of Natural Resources and Environmental Conservation
MRRP	Myanmar Forest Reforestation and Rehabilitation Programme
MRV	Measurement, Reporting and Verification
NBSAP	National Biodiversity Strategies and Action Plan
NECCCCC	National Environmental Conservation Committee and Climate Change Central Committee
NFMS	National Forest Monitoring System
NSAP	National Strategy and Action Plan
NDC	Nationally Determined Contributions
NFMS	National Forest Monitoring System
NGOs	Non- Government Organization
PFEs	Permanent Forest Estates
PMU	Project Management Unit
PaMs	Policies and Measures
RECOFTC	The Center for People and Forest
REDD+	Reduced Emission from Deforestation and Forest Degradation and Carbon Enhancement
RF	Reserved Forests
PPF	Protected Public Forest
SDG	Sustainable Development Goals
SIA	Social Impact Assessment
SIS	Safeguard Information System

SALT	Slopping Agriculture Land Technology
TWG	Technical Working Group
UNCCD	United Nations Convention to Combat Desertification
UNFCCC	United Nations Framework Convention on Climate Change
VFVL	Vacant, Fallow and Virgin Land

## Gap Analysis in Line with the National REDD+ Readiness Process in Shan State

### 1. Background

In order to implement REDD+, Myanmar joined as a partner country of UN-REDD Programme in December 2011 and has quickly taken steps to start implementing REDD+ readiness activities. With the financial support of Norwegian Government, Myanmar REDD+ Readiness Roadmap was successfully developed in June 2013 through organizing a series of national and regional multi-stakeholder workshops in Bago Region, Sagaing Region, Ayeyarwaddy Region and Shan State. The Myanmar REDD+ Roadmap is composed of six components, setting out how Myanmar will implement its REDD+ Readiness activities:

- Management of REDD+ Readiness,
- Stakeholder Consultation and Participation,
- Development and Selection of REDD+ Strategies,
- Implementation of Framework and Safeguards,
- National Forest Reference Emission Level and/or Forest Reference Level (FREL/FRL) and
- National Forest Monitoring System

In order to achieve the REDD+ readiness, three phases are identified as Preparation (Phase 1), Implementation/ Result-based demonstration activities (Phase 2) and Full implementation with reporting and verification of performance (Phase 3). Currently, Myanmar REDD+ implementation is on the stage of Phase 1.

With the targeted supports of UN-REDD Programme, action plans for National Forest Monitoring System (NFMS) and Forest Reference Emission Level (FREL) and Forest Reference Emission Level (FRL) have been developed with the contributions of the respective TWG. REDD+ National Strategies are being developed and it is planned to complete at the end of this year 2016. Safeguard Information System (SIS) is not yet started. However, Criteria and Indicators for Environmental and Social Safeguard for REDD+ have been developed at the sub-national level with the support of ITTO-REDD+ Capacity Building Project.

In order to fulfill the requirement for the REDD+ readiness, Myanmar has been collaborating with international organizations including UN-REDD programme, Korea Forest Service (KFS), The International Tropical Timber Organization (ITTO), Asia Air Survey (AAS) Co.,Ltd, The

Centre for People and Forest (RECOFTC, Myanmar), Forestry and Forest Products Recourse Institute (FFPRI) and International Centre for Integrated Mountain Development (ICIMOD) and local NGOs/CSOs. The gap analysis frame-work forms the basis for a desk and field-based assessment of the REDD+.

This Gap Analysis was conducted by a REDD+ Core Unit of Forest Department and Project Management Unit (PMU) of REDD+ Himalaya Project with the technical guidance of the ICIMOD and financial contribution by the German Federal Ministry of Environment, Nature Conservation and Nuclear Safety (BMU).

## **2. Rationale**

This GAP ANALYSIS is building on the work by UNREDD on national level. There is the need to inform subnational (State) level actors and vice versa. The national level “REDD readiness” process analysis in terms of institutional capacity and set up will be replicated on State level for Shan State.

The technical REDD requirements on State level will need to be analyzed so that processes for REDD+ inform upwards from project to subnational level and eventually to national level. Pilot site experience and subnational approaches are limited in Myanmar. Given wide differences in social and environmental conditions, deforestation rates and technical capacities, subnational-specific tailoring will be important for Myanmar’s overall REDD+ success.

The building at national institutions of Reference Levels (RLs) and Measurement, Reporting and Verification (MRV) systems to cover the full scope of REDD+ allows for a fast start of REDD+. Nonetheless it needs to take into account the building of capacities on subnational i.e. Shan State level for a gradual expansion to other Union States in the future.

Moreover, as deforestation and forest degradation drivers are often quite local in nature, different regions and even micro-regions require local implementation of the response measures. Local implementation allowing for interventions customized to a particular region often produces far more successful results than uniform implementation of a national intervention. Therefore this REDD+ Gap Analysis will look at the feasibility and needs in Shan State to kick start the local level REDD+ processes.

### **3. Objective**

Objectives of the Gap Analysis are:

- 1) To comprehensively review the forest related legislation and institutional arrangements including policies, laws, action plans, acts, strategies, rules, regulations, operating procedures and other activities pertinent to REDD readiness in Shan State.
- 2) To compile information on activities being undertaken by government agencies, NGOs and civil society, with or without external donor support, that may be relevant to gap analysis in Shan State.
- 3) To analyse and identify gaps and provide recommendations as how to fill in those gaps across the process of REDD+ readiness in Shan State, (based on information compiled for the above two objectives)
- 4) To estimate the time and financial resources required to fill each identified gap
- 5) To broader stakeholder consultation/ consensus building on the findings before submitting the final report.

### **4. Methodology**

A Core Group was formed to provide input and guidance to the assessment and to contribute to and participate in key research activities for the Gap Analysis. The members of the Core Group are from REDD+ Core Unit of Forest Department and Project Management Unit (PMU) of the Himalayan REDD+ Project. Series of wider Consultative Meeting was held to provide input, comments and advices to the findings of a Core Group.

The gap analysis includes key elements of existing policies, laws, plans and project activities of REDD+ readiness process. Secondary data collection, desk study, field observations, semi-structured interview, and focus group discussions were carried out in order to achieve the set objectives. Particularly series of meeting with stakeholders from Shan State and consultations were carried out during the course of this study. Building the understanding of the Core Group on key issues and providing additional inputs to the identification of potential gaps and considerations made the way forward for REDD+. The followings are the consultation meetings held for the Gap Analysis and some records:

**Table 1. List of Consultation Meetings held for the Gap Analysis**

<b>No.</b>	<b>Date</b>	<b>Major discussion</b>	<b>Participants</b>
1	28-08-2017	Content of report, Methodology and Review of another reports, Assigned responsibility	REDD+ Core Unit members and researchers of FRI, Focal persons from REDD+ Projects
2	07-09-2017	Consultation on the progress by Gap Analysis team and Human resources and capacity development gap	Gap Analysis Team members, REDD+ Core Unit members and researchers of FRI, Focal persons from REDD+ Projects
3	26-09-2017	Policy & legislations gap	REDD+ Core Unit and researchers of FRI
	31-10-2017	Strategies/Plans/ Technical gap	REDD+ Core Unit members and researchers of FRI
4	08-11-2017	Institutional/ Information gap	REDD+ Core Unit members and researchers of FRI
	29-12-2017	Consultation on the draft report on gap analysis	Gap Analysis Team members, REDD+ Core Unit members and researchers of FRI, Focal persons from REDD+ Projects
5	22-02-2018	Consultation on draft Gap Analysis Report at Regional Workshop on Role of REDD+ in supporting SDGs and NDC	REDD+ Core Unit members, representatives of line ministries, private sector, NGO, CSO, country representatives from REDD+ Himalayas Project
6	22-03-2018	Consultation on REDD+ Gap Analysis Report	REDD+ Core Unit members, representatives of line ministries, private sector, NGO, CSO
<p><b>Note- Meeting of Gap Analysis Team members on the progress of Gap Analysis on REDD+ also conducted by two weeks intervals and upon the progress.</b></p>			







## 5. Finding of the Gap Analysis

Through the information obtained during the study, the following observations have been made:

Policies and Legislations-

In the forestry and environmental sectors, Policies and legislations which support directly to REDD+ are as follows:

- Forest Policy (1995),
- Land Use Policy (2016)
- Environmental Conservation Policy (1992),
- Climate Change Policy (Draft, 2017)
- National Environmental Policy (Draft, 2017)
- Forest Law (1992) and Forest Rules (1995)
- Protection of Wildlife and Wild Plants and Conservation of Natural Areas Law (1994), and Rules (2002)
- Environmental Conservation Law (2012) and Rules (2016)
- Myanmar Agenda 21 (1997),
- Community Forestry Instruction (1995, 2016)
- National Code of Practice for Forest Harvesting

### 5.1. Policy gaps and possible solutions

**Table 2. Gaps and Possible solutions of relevant Policies**

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
1.	Land Use Policy (2016)	<b>Objectives:</b> - Provide sustainable land use management with land tenure right and security, and protection of natural resources together with livelihoods improvement and food security of all people through promoting people's participation or gender involvement	- Lack of land tenure rights of REDD project area in especially vacant land or village land	- To register and record the REDD project area in order to avoid land conflicts or land disputes among villagers or local communities or government departments
		<b>Section 70 and 71 of the part 8:</b> - Recognizing reclassification, formal	- Weakness in the involvement of all	- Awareness raising of authorized persons from

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		recognition and registration of customary land use rights relating to rotating and shifting cultivation that exists in farmland, forestland, vacant land, fallow land, or virgin land in the new National Land Law and giving technical, financial and infrastructure	stakeholders especially decision makers from related department	related department
		<b>Section 24 of the chapter 2 of the part-3</b> - based on land use information, the District Land Use Committee may define the land use zones		-
2.	Agriculture Policy (Draft, 2017)	<b>No. 3 of water use and management policy:</b> - Exploring underground water resources without adversely affecting natural environment and water resources	- Weakness in the involvement of all stakeholders especially decision makers from related department	- Awareness raising of authorized persons from related department- especially environmental conservation, Environmental Impact Assessment and Social Impact Assessment (EIA and SIA) - law enforcement to be in line with EIA
		<b>No. 3 of environmental conservation and climate change resilience policy:</b> - Conserve and utilize natural resources and ecological system in a sustainable manner	- Lack of mutual understanding among departments or lack of contract	- Negotiate with related departments when facing land conflicts -
		<b>No. 9 of land use and management strategic thrust:</b> - Systematic records on shifting cultivation, support the development of hilly rice land and introduction of Slopping Agriculture Land Technology (SALT)	- Lack of legal right to compensate for loss of project site	- Register the project site - Formulate instructions for REDD+ to recognize by related department as a Community Forest under Forest Policy
3.	National	<b>Objective:</b>	- Weakness in the	- Awareness raising of

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
	Energy Policy (2014)	<ul style="list-style-type: none"> <li>- To provide energy security for economic development of the country, and energy supply to living in the remote areas and to integrate the social and environmental considerations in the national energy planning and in the complete cycle of energy development</li> </ul>	involvement of all stakeholders especially decision makers from related department	<ul style="list-style-type: none"> <li>authorized persons from related department- especially environmental conservation, Environmental Impact Assessment and Social Impact Assessment (EIA and SIA)</li> <li>- law enforcement to be in line with EIA</li> </ul>
		<p><b>No. 3 and 6 of section a of no. 21 of oil and gas sector and no. 3 of section b of no. 21 of electricity sector:</b></p> <ul style="list-style-type: none"> <li>- To promote energy efficiency and conversion and to review and systematically manage electric power generation system and transmission system with minimizing environmental impact and social impact</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of mutual understanding among departments or lack of contract</li> <li>- Negotiation mechanism is still needed to develop (the objective of both sectors is for development and thus the negotiation mechanism should be developed)</li> </ul>	<ul style="list-style-type: none"> <li>- Negotiate with related departments when facing land conflicts</li> </ul>
		<p><b>No. 4 and 7 of section a of no. 21 of oil and gas sector, no. 3 and 4 of section c of no. 21 of electric power generation from water reservoirs and canals, no. 4 of section d of no. 21 of coal sector and no. 1, 4 and 6 of section f of no. 21 of renewable energy sector:</b></p> <ul style="list-style-type: none"> <li>- To promote alternative energy uses (renewable energy resources, energy from biomass and animal waste, advance use of coal) to prevent deforestation</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of legal right to compensate for loss of project site</li> </ul>	<ul style="list-style-type: none"> <li>- Register the project site</li> <li>- Formulate instructions for REDD to recognize by related department as CFI under Forest Policy</li> </ul>

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		<p><b>No. 8 of section d of no.21 of coal sector:</b></p> <ul style="list-style-type: none"> <li>- To coordinate with other relevant Ministries in Myanmar with other ASEAN member countries for the conduct of EIA studies caused by the coal projects</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of monetary support for energy supply program or effective energy supply program in the REDD implementation activities</li> </ul>	<ul style="list-style-type: none"> <li>- To collaborate with related departments or non-governmental organization to promote alternative energy sources such as efficient stoves, solar, biogas</li> <li>- To draw energy support and utilization as one of the activities of REDD implementation</li> </ul>
			<ul style="list-style-type: none"> <li>- Lack of awareness of sustainable energy utilization to local community in the REDD+ implementation activities</li> </ul>	<ul style="list-style-type: none"> <li>- To arrange training programs and public talk like carbon inventory training to promote public awareness and people participation in sustainable use of energy and to encourage efficient use of energy through using solar or efficient stoves</li> </ul>
4.	Climate Change Policy (Draft, 2017)	<ul style="list-style-type: none"> <li>- Promote sustainable natural resource management, protect biodiversity and enhance the resilience of ecosystem services</li> <li>- Adopt environmentally sound technologies and good management practices</li> <li>- Decouple Myanmar's continued growth from increasing greenhouse gas emissions and contribute to the global climate change mitigation effort through sustainable, low-carbon energy, transport and industrial</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of concrete target of reduction of GHG emission level</li> <li>- Weak in sectoral policy for reduction of GHG emissions</li> <li>- Lack of institutional capacity for monitoring the impacts of Climate Change Policy</li> </ul>	<ul style="list-style-type: none"> <li>-</li> </ul>

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		<p>systems, while ensuring that Myanmar's social and economic development needs are met</p> <ul style="list-style-type: none"> <li>- Strengthen current partnerships and build new partnerships among ministries and between Government and the private sector, civil society and academia at the global, regional, national and local levels, for the effective implementation of climate action in Myanmar</li> </ul>		
5.	National Environmental Policy (Draft, 2017)	<p><b>National Environmental Policy Principles:</b></p> <ul style="list-style-type: none"> <li>- Myanmar's ecosystems are to be protected and managed in sustainable ways</li> <li>- Rights of indigenous people and ethnic nationalities to their lands, territories, resources and spiritual heritage, and their contributions</li> <li>- Myanmar's economic and social development strategies will prioritize low-carbon and green economy pathways</li> <li>- Sustainable and renewable energy for all Myanmar will be achieved through the use of existing technology and innovations in the generation, storage and supply of energy.</li> <li>- Climate smart approaches to development, including resilience, risk management and climate change mitigation strategies, will be aligned</li> <li>- Environmental decision making at all levels will be inclusive, transparent and accountable to relevant stakeholders, with communities</li> </ul>	<ul style="list-style-type: none"> <li>- The role of Land use, land use change and forestry in climate change mitigation and adaptation is not yet mentioned.</li> </ul>	<ul style="list-style-type: none"> <li>- Identification and implementation of suitable forest rehabilitation techniques for areas affected by deforestation and forest degradation could support to develop the action plan of reducing emission from forestation and forest degradation.</li> </ul>

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		and citizens having the right to access information that could affect their lives and property.		
	Myanmar Forest Policy (1995)	Six Policy Imperatives provides many enabling conditions for the preparation of REDD+ readiness.	- Concreted plans are needed to implement the Policy Measures.	-
			<ul style="list-style-type: none"> <li>- Forest Policy allows local communities to collect the fuel, water, fodder, shelter, food and recreation from the forest for their basic need.</li> <li>- If all of the accesses to forest are restricted (e.g. limiting or do not allow the production of resources from the forest) for the REDD+ project, the participation of local community would be declined.</li> </ul>	<ul style="list-style-type: none"> <li>- There should be alternative forest area or somewhere for fulfilling basic needs and that area should be monitored not to degrade and managed in sustainable manner.</li> </ul>
		<b>3.5. Participation</b> - Enlisting people's participation in raising trees for meeting, their needs and increasing non-farm incomes through adoption of community forestry/ agroforestry practices.	-	<ul style="list-style-type: none"> <li>- Develop/ Initiate awareness raising program to understand the community that conserving forest can also produce income from result based payment.</li> </ul>
		<b>5.1 Land Use</b> <ul style="list-style-type: none"> <li>- To evolve a system of balanced and complementary land use under which land is</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of land tenure security for implementing the</li> </ul>	<ul style="list-style-type: none"> <li>- An instruction like CFI should be developed to legally recognize land tenure and</li> </ul>

No.	Policy	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		<p>only diverted to uses where it would produce most and deteriorate least;</p> <ul style="list-style-type: none"> <li>- To phase out existing practices which are incompatible with sound land management and which support adverse environmental consequences; and</li> </ul>	REDD+ project.	register legitimate land tenure rights for local people in REDD+ implementation areas.
		<p><b>Forest Regeneration and Afforestation</b></p> <ul style="list-style-type: none"> <li>- To pursue sound programmes of forest development through regeneration and rehabilitation operations to optimize productivity from natural forests; and</li> <li>- To encourage planting of fast growing multipurpose tree species in degraded forests and farm lands, to meet industrial and domestic demand, and restore ecological balance.</li> <li>- <b>Policy Measure</b></li> <li>- Reforest an annual area of 30,000 hectares for rehabilitation of degraded lands and for meeting rural needs; and</li> <li>- Rehabilitate and protect denuded coastal areas.</li> </ul>	-	
		<p><b>Intersectoral Coordination</b></p> <ul style="list-style-type: none"> <li>- To establish an adequate and effective coordination/ cooperation among all related sectors of the economy having influence on forestry including international agencies and institutions concerned with forestry development.</li> </ul>		

## 5.2. Legislation gaps and possible solutions

**Table 3. Gaps and possible solutions of relevant legislations**

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
1	The Forest Law (1992)	<ul style="list-style-type: none"> <li>- The main principles (a), (b), (c), (d), (e) and (i), are directly synergistic with implementation of REDD+ program by prioritizing forest conservation policy, environmental conservation policy and implementation of international agreements.</li> <li>- No 13, 14 and 15 legally support the different kinds of plantations establishment in PFEs as well as outside PFEs.</li> <li>- According to no. 41, 42 and 43, the legalized prohibitions and fixed penalties will become an asset by enhancing the legal protection of established REDD+ forests in PFEs.</li> <li>- Inclusion of CF as one of the main function of FD which could support attracting local people to REDD+ program.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ concept is not included in the law and also in the principles.</li> <li>- The Forest Law is enforced only in PFEs and not to all forested area.</li> <li>- No Legal security for customary forest land.</li> <li>- No specific statement for prohibitions in REDD+ area and how to punish offenders</li> <li>- No legal statement for ensuring benefits sharing system from REDD+ forests.</li> <li>- A lack of legal support for developing financing mechanism for result based payment of REDD+ forest.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ concept should be included in the law or a legal mechanism which strengthen legal security of REDD+ should be developed.</li> <li>- Policy or procedures securing land tenure of REDD+ in customary forest land and forested area outside PFEs should be developed in coordination with line ministries.</li> <li>- Legal statement for securing REDD+ related activities, financing mechanism and benefit sharing mechanism should be developed.</li> </ul>

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
2	Forest Rules (1995)	<p>It enables forest officers to support REDD+ activities by the following means:</p> <ul style="list-style-type: none"> <li>- In protected public forest area, delegated forest officers have authority to prevent described destructive manners on forests and, can punish offenders according to rules.</li> <li>- Rules on establishment of different kinds of plantations, extraction and revenue collection from plantations are set up for forest officers.</li> <li>- Forest officers can allow extraction of forest produce by following the procedures in the forest rules and in accordance with the forest law (1992).</li> </ul>	<p>As the forest rules are issued in 1995, REDD + concept is absent especially for the following points.</p> <ul style="list-style-type: none"> <li>- No rules for establishing REDD+ plantations.</li> <li>- No rules for implementing REDD+ activities.</li> <li>- No rules for sharing benefit from REDD+ forests.</li> <li>- No defined rules of implementing REDD+ for FD staff</li> </ul>	<ul style="list-style-type: none"> <li>- Setting up clear legally binding rules for forest officers to implement REDD+ activities.</li> </ul>
3	Environmental Conservation Law (2012)	<ul style="list-style-type: none"> <li>- Formation of Environmental Conservation Committee, with responsibilities of supporting relevant departments, will strengthen REDD+ activities especially in the safeguard information system and safeguard development.</li> </ul>	<ul style="list-style-type: none"> <li>- No REDD+ concept is embedded in the law.</li> <li>- No legal support for getting benefits from emission reduction, especially from forestry sector.</li> </ul>	<ul style="list-style-type: none"> <li>- A legal mechanism securing benefits from emission reduction from REDD+ need to be provided.</li> </ul>

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		<ul style="list-style-type: none"> <li>- According to 18, 19 and 20, the Ministry must support forest department for the conservation of forest resources as its main responsibility.</li> </ul>		
4	Environmental Conservation Rules (2014)	<p>The rules support REDD+ by assigning Environmental Conservation Department especially in social and environmental safeguard development.</p> <ul style="list-style-type: none"> <li>- Environmental Conservation Committee chaired by minister of MONREC can prepare and modified relevant policies for environmental conservation in coordination with line departments.</li> <li>- The committee must promote environmental education and awareness raising program.</li> <li>- Before implementing development project such as REDD+, the department must carry out social and environmental impact assessment.</li> </ul>	<ul style="list-style-type: none"> <li>- Clear rules on role of ECD or MONREC in REDD+ implementation is missing.</li> </ul>	<ul style="list-style-type: none"> <li>- Specific rules on roles of ECD or MONREC in REDD+ implementation should be formulated.</li> </ul>
5	Protection of Wildlife and Wild Plants and	<ul style="list-style-type: none"> <li>- The law support REDD+ implementations by prohibiting the</li> </ul>	<ul style="list-style-type: none"> <li>- No special regulations for REDD+ activities.</li> </ul>	<ul style="list-style-type: none"> <li>- Statement for REDD+ implementation activities</li> </ul>

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
	Conservation of Natural Areas Law (1994)	<p>following destructive manners on forests without permissions in the natural forest area or protected area.</p> <ul style="list-style-type: none"> <li>- Entering, trespassing, grazing, plucking or breaking any kind of wild plants and cultivated plants in the prohibited zone.</li> <li>- Digging on the land,</li> <li>- Cultivating or carrying out any work,</li> <li>- Extracting collecting or injuring in any manner any kind of cultivated and wild plants,</li> <li>- Destroying ecosystem or any natural state in natural area and</li> <li>- Altering, removing, destroying or obliterating any boundary and boundary marks of protected area</li> </ul>	<ul style="list-style-type: none"> <li>- Spaces for REDD+ implementation allowing REDD+ activities in protected areas is lacking.</li> </ul>	<p>should be included in the law. As an alternative way, a certain legal document, policy or rules for implementation of REDD+ activities <i>in protected area</i> should be adopted.</p>
6	Vacant, fallow and virgin land Management Law (2012)	<p>The law secure REDD+ forests from encroachment or other business such as agriculture, mining and livestock raising by the following means:</p> <ul style="list-style-type: none"> <li>- the above mentioned business activities are only allowed in land</li> </ul>	<ul style="list-style-type: none"> <li>- In unclassified forest land areas outside PFEs, REDD+ implementation in forested areas are neither favored nor secured by the law.</li> </ul>	<ul style="list-style-type: none"> <li>- A legal document for securing and supporting REDD+ in <i>unclassified forest</i> should be developed.</li> </ul>

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		<p>which is legally nullified from reserved forests,</p> <ul style="list-style-type: none"> <li>- In case of permitting the mentioned business for the purpose of country's development, the administrative body must coordinate MOECAAF to ensure the business not to destroy reserved forests, protected public forests, protected areas and watershed areas.</li> </ul>		
7	Vacant, fallow and virgin land (VFVL) Rules	<p>In permanent forest estate (PFE), the law ensure land tenure security of REDD+ forests preventing from other business by the following regulations:</p> <ul style="list-style-type: none"> <li>- Before issuing permission on business land use, the township department must carry out inspections on whether the applied vacant, fallow and virgin lands are free from other official land use, land title or projects.</li> <li>- Approval of MONREC must be obtained not to destroy forest estate and environmental conditions.</li> </ul> <p>If REDD+ plantations are planned to be established in VFVL outside PFEs, the</p>	<ul style="list-style-type: none"> <li>- Although the procedures of applying VFVL for government projects such as REDD+ plantations are mentioned, the procedures are bureaucratic and time consuming which need to pass the application documents from township to central level and permission letters from central to township level.</li> </ul>	<ul style="list-style-type: none"> <li>- Clear specific rules describing procedures and how to facilitate the procedures of applying VFV land for REDD+ implementation should be specifically issued.</li> </ul>

No.	Laws/ Regulations	Linkage to REDD+ (supporting to REDD+)	Gaps	Possible solutions
		area of 5000 acres per time up to 50,000 acres can be applied as government projects to central land administrative body. If the land is granted, the land tenure is secured up to 30 years.		
8	Farm land law and farm land rules (2012)	<p>In order to prevent encroached farming in REDD+ implementing areas, the law creates the following favorable conditions.</p> <ul style="list-style-type: none"> <li>- Without legal approval from relevant administrative body, no trespass or carrying out agricultural activities are allowed.</li> <li>- Relevant Departments, including Forest Department can be a member of the administrative body of farm land management at different governance levels.</li> <li>- The administrative body should guide and supervise in respect of shifting cultivation.</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of verification process of proposed farm land with forest land title or other land titles before issuing legal documents permitting as farm lands.</li> </ul>	<ul style="list-style-type: none"> <li>- For issuing legal documents/ permission on farm lands, an instruction mentioning the committee to inform and strengthen coordination with local level forest department to check the existing land title should be added.</li> </ul>

### 5.3. Strategies and plans gaps and possible solutions

REDD+ has the direct linkage the following strategies and plans which contribute substantially to the REDD+ readiness of Myanmar:

**Table 4. Gaps and possible solutions of relevant Strategies and plans**

No.	Strategies/Plans	Linkage to REDD+	Gaps	Possible solutions
1	National REDD+ Strategies (2018, Draft)	<ul style="list-style-type: none"> <li>- The goal of the Myanmar REDD+ strategy is to contribute to the achievement of a climate resilient, low carbon and sustainable development path of the country (MCCSAP goal) through transformational change in the land use and forestry sector by reducing deforestation and forest degradation while enhancing livelihoods, sustainable growth and development.</li> <li>- In order to achieve this goal 7 major objectives are formulated, namely:               <ol style="list-style-type: none"> <li>(1) Reduction of deforestation and the related carbon emissions by 30% by 2030,</li> <li>(2) Enhancement of forest carbon stocks by 24.56 million tonnes of carbon by 2030,</li> <li>(3) reversal/ reduction of forest degradation on overexploited and depleted forests,</li> </ol> </li> </ul>	<ul style="list-style-type: none"> <li>- The financial investment requirements for implementing the Policies and Measures (PaMs) are, except for the funding requirements of the 10-year Reforestation and Rehabilitation Programme, not yet secured.</li> <li>- Institutional Arrangement should be strengthened; particularly sub-national level unit is required for the effective implementation.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ investment plan need to be developed and find appropriate funding sources e.g. GCF.</li> <li>- Forming sub-national level REDD+ Unit (e.g. District level REDD+ Unit)</li> </ul>

No.	Strategies/Plans	Linkage to REDD+	Gaps	Possible solutions
		<p>(4) Reduction of forest degradation from firewood extraction,</p> <p>(5) Stabilizing shifting cultivation and reducing pioneering encroachment in forests,</p> <p>(6) Reduction of forest fires, and</p> <p>(7) Reduction of forest degradation caused by grazing and browsing of domestic animals.</p>		
2	National Biodiversity Strategy and Action Plan- NBSAP (2016)	<ul style="list-style-type: none"> <li>- NBSAP provides a comprehensive framework for planning biodiversity conservation, management and utilization in a sustainable manner, as well as to ensure the long term survival of Myanmar’s rich biodiversity. NBSAP set up the targets and priority actions to achieve <b>Aichi Targets</b>.</li> <li>- <b><i>E.g. Target 15.1:</i></b> By 2020, over 130,000 hectares of forests under community forestry (CF) are implemented.</li> <li>- <b><i>Target 15.2.</i></b> By 2018: guideline for the national forest restoration programme that incorporate with the best international practice formally adopted by government and pilot project</li> </ul>	<ul style="list-style-type: none"> <li>- Lack of integrated plan to address issues of climate change impacts and biodiversity loss</li> <li>- Weak coordination (limited coordination mechanism) for climate change-related sectors and biodiversity conservation-related sectors</li> </ul>	<ul style="list-style-type: none"> <li>- Integrated action plan should be developed for win-win approach especially climate change mitigation and biodiversity conservation</li> </ul>

No.	Strategies/Plans	Linkage to REDD+	Gaps	Possible solutions
		<p>initiated.</p> <ul style="list-style-type: none"> <li>- <b>Target 15.3.</b> By 2020, REDD+ Readiness Road Map is actively being implemented</li> </ul>		
3.	(Intended) Nationally Determined Contributions (NDC)	<ul style="list-style-type: none"> <li>- Reserved Forests (RF) and Protected Public Forest (PPF) will be extended up to 30% of total country's area. <b>(50,025,402 acres)</b></li> <li>- Protected Areas will be extended up to 10% of total country's area. <b>(16,708,678 acres)</b></li> <li>- Increase the number of energy efficient cook stoves disseminated in order to reduce the amount of fuel wood used for cooking. (Indicative goal: To distribute approximately 260,000 cook-stoves between 2016 and 2031.)</li> </ul>	<ul style="list-style-type: none"> <li>- Limited staff and inputs for reservation process</li> <li>- Reservation process takes time</li> <li>- Weak coordination and cooperation of some States and Regional Government for reservation and establishment of Protected Areas.</li> <li>- Limited awareness and misunderstanding of local communities for expanding of RF, PPF and PA</li> <li>- No international supports and cooperation for the tasks of expanding RF, PPF and PA</li> </ul>	<ul style="list-style-type: none"> <li>- Cooperation among Government, INGOs, NGOs, CSOs and local communities should be strengthened.</li> <li>- Negotiation and forestry extension skills of staff members of Forest Department should be improved.</li> </ul>
4.	Myanmar Reforestation and Rehabilitation Program- MRRP (2016-17 to 2026-27)	<ul style="list-style-type: none"> <li>- Main objective is to restore and rehabilitate the degraded forests for enhancing ecosystem services. The indicative targets are:</li> <li>- Formulation of Forest Plantation Policy</li> <li>- Establishment of <b>148,627 ha</b> (352,438 Acres) of forest plantations owned by</li> </ul>	<ul style="list-style-type: none"> <li>- Weak in systematic monitoring and evaluation upon implementation of MRRP linking to REDD+</li> <li>- Limited or no studies on potential impacts of MRRP in terms of political, ecological,</li> </ul>	<ul style="list-style-type: none"> <li>- Systematic monitoring and evaluation upon implementation of MRRP linking to REDD+ should be carried out.</li> <li>- Since MRRP is a long-term programme,</li> </ul>

No.	Strategies/Plans	Linkage to REDD+	Gaps	Possible solutions
		<p>the State</p> <ul style="list-style-type: none"> <li>- Establishment of <b>115,427 ha</b> (285,104 Acres) of private plantations</li> <li>- <b>331,392 ha</b> (818,538 Acres) of Assisted Natural Regeneration in the Production Forests</li> <li>- Conservation of <b>202,429 ha</b> (500,000 Acres) of remaining natural forests in Central Dry Zone</li> <li>- Establishment of <b>311,875 ha</b> (770,332 Acres) of Community Forests</li> <li>- Reservation of <b>1,610 square mile</b> (6.19 5% of country area) to fulfill the national target of 30% of PFE in accordance with Myanmar forest policy 1995.</li> </ul>	<ul style="list-style-type: none"> <li>- social and economic perspectives</li> <li>- Limited consultations with relevant stakeholders</li> </ul>	<p>systematic studies should be conducted.</p> <ul style="list-style-type: none"> <li>- Stakeholder consultation should be taken into account for the full and effective participation of relevant stakeholders</li> </ul>
5.	30 year Forest Management Plan (2001-2002 to 2030-31)	<ul style="list-style-type: none"> <li>- It is a backbone of the sustainable forest management and a long-term plan to translate Forest Policy into practices.</li> </ul>	<ul style="list-style-type: none"> <li>- Weak monitoring and evaluation in achievement of the plan</li> <li>- Weak in consideration of linkage with international commitments related to UNFCCC, CBD and UNCCD</li> </ul>	<ul style="list-style-type: none"> <li>- Monitoring and evaluation should be strengthened.</li> <li>- 30 year Forest Management Plan should be developed linking to international commitments</li> </ul>
6.	National Strategy and Action Plan- NSAP for	<ul style="list-style-type: none"> <li>- It is a guiding principle and backbone of mangrove reforestation and rehabilitation</li> </ul>	<ul style="list-style-type: none"> <li>- Limited funding for mangrove conservation and reforestation in coastal areas</li> </ul>	<ul style="list-style-type: none"> <li>- Mangrove conservation and reforestation activities should be linked to international multilateral</li> </ul>

No.	Strategies/Plans	Linkage to REDD+	Gaps	Possible solutions
	Mangrove (2016)		<ul style="list-style-type: none"> <li>- Weak coordination among line ministries related to integrated coastal area management</li> </ul>	<ul style="list-style-type: none"> <li>funding sources including Green Climate Fund, Global Environmental Facility and Disaster Risk Reduction etc. as well as to bi-lateral cooperation</li> <li>- Coordination mechanism should be strengthened through Coastal Area Management Central Committee.</li> </ul>
7.	National Climate Change Strategy & Action Plans (2016-2030)	<ul style="list-style-type: none"> <li>- It outlines the <b>pathway</b> and <b>means</b> to address climate change, using a strategic coordinated approach. It intends to achieved climate resilient development and pursued a low-carbon development pathway by 2030 to support inclusive and sustainable development</li> </ul>	<ul style="list-style-type: none"> <li>- No concrete actions and funding for implantation is very limited.</li> <li>- Limited or no sectoral strategy and action plans</li> <li>- Limited capacities and facilities for implementation</li> </ul>	<ul style="list-style-type: none"> <li>- Funding should be secured through national budget or international multi-lateral funding mechanism and bi-lateral cooperation.</li> <li>- Sectoral plan for every related line Ministry needs to be developed and implemented as a part of National Action Plans.</li> <li>- Capacity building activities for each sector should be accelerated and required facilities should be provided.</li> </ul>

#### 5.4. Capacity development gaps and possible solutions

Capacity development and institutional strengthening related to REDD+ are of crucial importance. Since REDD+ is a long term process, it can only be achieved if capacity development of the relevant stakeholders and institutions are well planned.

**Table 5. Gaps and possible solutions for Capacity development related to REDD+**

No.	Capacity development and Institutions	Linkage to REDD+	Gaps	Possible solutions
1	Human resource development plan of Forest Department	No. linkage or specific actions for capacity development related to REDD+ and climate change mitigation	No. specific capacity development programme for the development of REDD+	Short-and long-term action plans for REDD+ capacity development of relevant institutions should be prepared.
2	Central Forestry Development Training Centre (CFDTC)	Despite providing conventional forestry subjects, no linkage between training courses and REDD+ training	No. REDD+ and climate change mitigation and adaptation training programme and lectures.	REDD+ and climate change course should be included in regular training programme.
3	Myanmar Forest School (MFS)	Despite providing conventional forestry subjects, no linkage between training courses and REDD+ training	No. REDD+ and climate change mitigation and adaptation training programme and lectures.	REDD+ and climate change course should be included in regular training programme.
4	Forest Research Institute (FRI)	<i>Focal Institutions for REDD+ and FRI provides many REDD+ trainings in collaboration with international organizations including UN-REDD Programme, ICIMOD, KFS, ITTO, FFPRI</i>	Limited resource persons and many researchers need to be trained. No. linkage between REDD+ and on-going research activities	Training of Trainers for REDD+ should be organized for FRI researchers/ REDD+ Working Group Member. Research projects of FRI should be designed to link with REDD+ and climate change mitigation.

## 5.5. Institutional arrangement gaps and possible solutions

**Table 6. Gaps and Possible solutions of Institutional arrangements for REDD+**

No.	Institutional arrangement	Linkage to REDD+	Gaps	Possible solutions
1	National Environmental Conservation Committee and Climate Change Central Committee (NECCCCC)	<ul style="list-style-type: none"> <li>- To take actions to prevent environmental damage and ensure environmental sustainability;</li> <li>- To supervise and oversee rehabilitation activities in relevant areas based on the magnitude and intensity of impacts caused by government projects and activities or commercial and private activities;</li> <li>- To participate in and promote actions towards international collaboration &amp; cooperation relating to environmental conservation;</li> <li>- To approve activities on Urban Management Planning;</li> <li>- To facilitate and negotiate among government agencies and institutions to find solutions to environmental problems;</li> <li>- To organize Special Task Force(s) with ToRs to implement conservation activities effectively and efficiently, if necessary;</li> <li>- To take actions on task and duties given by Cabinet.</li> </ul>	<ul style="list-style-type: none"> <li>- There is no direct linkage between REDD+ Task Force and the NECCCCC</li> </ul>	<ul style="list-style-type: none"> <li>- A regular reporting system for the progress of REDD+ to the NECCCCC should be created.</li> </ul>
2	REDD+ Taskforce	<ul style="list-style-type: none"> <li>- Supervise the implementation of all REDD+ Readiness activities including the development and monitoring of consolidated work plans and corresponding reporting by the</li> </ul>	<ul style="list-style-type: none"> <li>- There is no capacity building and awareness raising programme for</li> </ul>	<ul style="list-style-type: none"> <li>- Organizing capacity building and awareness raising</li> </ul>

No.	Institutional arrangement	Linkage to REDD+	Gaps	Possible solutions
		<p>TWGs, the REDD+ TF Office and whoever is involved in Roadmap implementation;</p> <ul style="list-style-type: none"> <li>- Coordinate and monitor all REDD+ relevant initiatives in the country to ensure new initiatives or projects are “nested” into the implementation of the REDD+ Readiness phase and contribute to the development of national REDD+ systems and approaches;</li> <li>- Consolidate and/or validate technical reviews and proposals generated by TWGs, the REDD+ TF Office, REDD+ projects or the National REDD+ Network and submit them to the NECCCCC for further review and endorsement if required;</li> <li>- Provide guidance on overall capacity building and adherence to safeguards under REDD+;</li> <li>- Advise on issues brought to the attention of the TF by key stakeholders through TWGs, consultations and other channels;</li> <li>- Ensure that community-level concerns are heard and acted upon, that FPIC principles are applied and that community partners are given due recognition in benefit sharing;</li> <li>- Report to the NECCCCC and MONREC on resource mobilization for REDD+ Readiness implementation and piloting of selected REDD+ strategies, if needed;</li> <li>- Inform the NECCCCC about the latest international</li> </ul>	<p>TF members as well as decision members. TF members are limited capacity and awareness about REDD+</p> <ul style="list-style-type: none"> <li>- There is no regular mechanism for meeting and discussion with TWGs and REDD+ Core Unit</li> </ul>	<p>programme for TF members</p> <ul style="list-style-type: none"> <li>- A regular meeting should be created to report all progress done by TWGs and INGOs, NGOs</li> </ul>

No.	Institutional arrangement	Linkage to REDD+	Gaps	Possible solutions
		agreements and developments related to REDD+ implementation and recommend possible feedback to the UNFCCC through the NECCCCC		
3.	REDD+ Core Unit	<ul style="list-style-type: none"> <li>- To provide technical supports to REDD+ Technical Working Groups (TWGs)</li> </ul>	<ul style="list-style-type: none"> <li>- There is no regular mechanism for meeting and discussion with TWGs and REDD+ Core Unit</li> </ul>	<ul style="list-style-type: none"> <li>- A regular coordination mechanism should be established between National TWG and REDD+ Core Unit of Forest Department.</li> </ul>
4.	National Technical Working Groups (TWGs)	<p><b>Stakeholders Engagement &amp; Safeguard TWG</b></p> <ul style="list-style-type: none"> <li>- To establish a process for stakeholder engagement during the development of the Roadmap, and to set out a broad strategy for further stakeholder engagement during the preparation of a comprehensive national REDD+ strategy, 2) to identify current measures in respect to the Cancun safeguards applying to forest management in Myanmar, and propose measures to strengthen those safeguards.</li> </ul>	<ul style="list-style-type: none"> <li>- There is no sub-national level TWG.</li> </ul>	<ul style="list-style-type: none"> <li>- Sub-national level REDD+ TWG should be formed in order to make close collaboration with National TWG.</li> </ul>
		<p><b>MRV TWG</b></p> <ul style="list-style-type: none"> <li>- To assess baseline national technical capacities and institutional arrangements related to the forest monitoring and measurement, reporting and</li> </ul>	<ul style="list-style-type: none"> <li>- There is no sub-national level TWG.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ TWG should be formed in order to make close collaboration with</li> </ul>

No.	Institutional arrangement	Linkage to REDD+	Gaps	Possible solutions
		<p>verification (M&amp;MRV) functions of the national forest monitoring system (NFMS) for REDD+ activities; and 2) to identify potential strategies for the development of Myanmar's forest RELs/RLs</p> <p><b>Drivers &amp; Strategies TWG</b></p> <ul style="list-style-type: none"> <li>- To identify and quantify the key drivers of deforestation and forest degradation in Myanmar and their underlying causes; and to identify potential strategies to address them</li> </ul>		<p>National TWG.</p> <ul style="list-style-type: none"> <li>- REDD+ TWG should be formed in order to make close collaboration with National TWG.</li> </ul>
5.	Informal REDD+ Stakeholder Network	<ul style="list-style-type: none"> <li>- An informal REDD+ multi-stakeholder network was established as part of the initial REDD+ awareness-raising and consultation activities conducted in 2010-12. The current network consists of a mailing list of interested individuals, primarily from government and civil society organizations. This mailing list has so far been used to disseminate REDD+ related information, to establish lists of invitees for REDD+ related workshops and events (including the national Roadmap Consultation workshops) and to establish the membership of the different Roadmap TWGs. The network includes members of other existing environmental networks</li> </ul>	<ul style="list-style-type: none"> <li>- Formal networking should be established through various means and ways.</li> </ul>	<ul style="list-style-type: none"> <li>- Networking for REDD+ should be established among relevant stakeholders (Government Ministries, NGOs, CSOs, private sector, local government and local communities, ethnic groups etc.)</li> </ul>
6.	CFNWG	<ul style="list-style-type: none"> <li>- To develop the CF related policy, strategies and plans for short- and long-term to achieve the objectives of CF</li> <li>- To provide overall guidance of development of community forestry targeted by Nationally Determined Contributions (NDC)</li> </ul>	<ul style="list-style-type: none"> <li>- No coordination and formal communication between CFNWG and REDD+ Taskforce/TWGs</li> </ul>	<ul style="list-style-type: none"> <li>- To establish a formal communication among CFNWG, National TWGs and REDD+ Taskforce.</li> </ul>

No.	Institutional arrangement	Linkage to REDD+	Gaps	Possible solutions
7.	CF Units (HQ. and States & Regions) of FD	<ul style="list-style-type: none"> <li>- To implement, and also monitor the progress of establishment of CF across the country</li> </ul>	<ul style="list-style-type: none"> <li>- There is no linkage with REDD+ Taskforce and CF Units of FD</li> <li>- No coordination and formal communication between CF Units and REDD+ Taskforce/TWGs</li> </ul>	<ul style="list-style-type: none"> <li>- To establish a formal communication among CFNWG, National TWGs and REDD+ Taskforce.</li> </ul>
8.	Settlement Unit of FD	<ul style="list-style-type: none"> <li>- To constitute Reserved Forests, Protected Public Forest (PPF) and Protected Areas in order to meet the NDC target</li> </ul>	<ul style="list-style-type: none"> <li>- There is no linkage with REDD+ Taskforce and Settlement Unit</li> <li>- No coordination and formal communication between Settlement Units and REDD+ Taskforce/TWGs</li> </ul>	
9.	FLEGT TWG	<ul style="list-style-type: none"> <li>- To fight against illegal logging and to ensure timber legality and assurance system</li> </ul>	<ul style="list-style-type: none"> <li>- There is no regular mechanism for meeting, sharing information and cooperation.</li> </ul>	
10.	National GHG Inventory TWG	<ul style="list-style-type: none"> <li>- To collect emission from various sectors, and prepare a national GHG report as a Second Communication to UNFCCC</li> </ul>	<ul style="list-style-type: none"> <li>- There is no regular mechanism for meeting, sharing information and cooperation.</li> <li>- Limited capacity of relevant line ministries</li> </ul>	

## 5.6. Technology

Two out of four elements of REDD+ mechanism are directly related to technology of REDD+. These elements are National Forest Monitoring System (NFMS) and Forest Reference Emission Level/Forest Reference Level (FREL/FRL). In addition to technology, these elements also need good facilities such as computer, high resolution satellite images, relevant software and internet access etc.). Without these facilities, these elements cannot be achieved.

**Table 7. Gaps and Possible Solutions related to Technology for REDD+ implementation**

No.	Technology	Linkage to REDD+	Gaps	Possible solutions
1	Remote Sensing and Geographic Information System (RS/GIS)	<ul style="list-style-type: none"> <li>- Directly contribute to the FREL/FRL as well as National Forest Monitoring System (NFMS)</li> </ul>	<ul style="list-style-type: none"> <li>- Limited availability of up-to-date Satellite Images on a regular basis</li> <li>- Limited availability of high resolution satellite images</li> </ul>	<ul style="list-style-type: none"> <li>- Providing up-to-date satellite images on regular basis</li> <li>- Providing high resolution satellite images covering whole country but at least some hot spot areas on regular basis.</li> </ul>
2	Forest Inventory	<ul style="list-style-type: none"> <li>- Directly link to NFMS as well as FREL/FRL</li> </ul>	<ul style="list-style-type: none"> <li>- Need appropriate NFI design to cover not only carbon accounting but also for calculation of sustained timber production (Annual Allowable Cut-AAC)</li> <li>- Centralized NFI system and NFMS. It is necessary to build up capacity of staff of States and Regions Forest Department</li> </ul>	<ul style="list-style-type: none"> <li>- NFI design should be developed to cover both carbon accounting and enough for calculation of AAC.</li> <li>- States and Regions Forest Department should be encouraged to improve their capacity and capability to be able to conduct inventory and forest monitoring by themselves.</li> </ul>

No.	Technology	Linkage to REDD+	Gaps	Possible solutions
3	Carbon enhancement activities (Role of forest conservation, sustainable management of forests and enhancement of forest carbon stock)	- Directly contribute to the REDD+	- Limited technical know-how of carbon enhancement activities of private investors and forest dependent communities	- Appropriate technologies for carbon enhancement activities and locally controlled forest management system/community based forest management system (from planning to marketing) should be accelerated.

### 5.7. Information sharing, awareness raising and stakeholder engagement

REDD+ implementation will fall within the responsibility of MONREC. The MoAI will be another key REDD+ institution playing a major role in land use planning and management. However, several other line Ministries, have responsibilities that are relevant for the management of a REDD+ programme.

It is of crucial important to improve coordination among Government Ministries, State/Regional Government, CSOs, NGOs, Communities, Private Sectors (horizontal, vertical coordination), and International organizations.

**Table 8. Gaps and Possible Solutions in terms of Information Sharing, Awareness Raising and Stakeholder Engagement**

No.	Information sharing, awareness and stakeholder engagement	Linkage to REDD+	Gaps	Possible solutions
1	Forest Department Website	- All forestry related information of Forest Department are published in website (including REDD+ progress)	- Limited articles and information about REDD+ progress.	- REDD+ related articles and up-to-date information should be uploaded on regular basis.
2	MONREC's website	- All forestry, forest products, environment and mining information of	- Limited articles and information about REDD+ progress.	- There are many priorities to be uploaded. REDD+ related articles and up-to-date information should

No.	Information sharing, awareness and stakeholder engagement	Linkage to REDD+	Gaps	Possible solutions
		MONREC are published in the website (including REDD+ progress)		be uploaded on regular basis.
3	FRI Facebook page	<ul style="list-style-type: none"> <li>- All forestry related information of Forest Department are published in website (including REDD+ progress)</li> </ul>	<ul style="list-style-type: none"> <li>- Only a brief information about REDD+ related events are published.</li> </ul>	<ul style="list-style-type: none"> <li>- FRI should link to UNREDD (Myanmar) to publish more information and REDD+/Climate Change related articles.</li> </ul>
4	UNREDD Programme (Myanmar) Website and Facebook	<ul style="list-style-type: none"> <li>- All REDD+ related information and progresses are published in the website.</li> </ul>	<ul style="list-style-type: none"> <li>- Only updated information and on-going events are uploaded.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ related articles should be published and shared on regular basis.</li> <li>- UN-REDD should also publish in Myanmar language.</li> <li>- UN-REDD Programme should also publish monthly or quarterly Journal focusing on REDD+ progress and climate change</li> </ul>
5	Monthly Journal (Thitaw Kyaemon) published by Forest Department	<ul style="list-style-type: none"> <li>- All forestry related information of Forest Department are published in website (including REDD+ progress)</li> </ul>	<ul style="list-style-type: none"> <li>- Limited information and publications about REDD+.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ related articles, REDD+ projects-related progress of Forest Department should be included in Journal on regular basis.</li> </ul>

No.	Information sharing, awareness and stakeholder engagement	Linkage to REDD+	Gaps	Possible solutions
6	Private sector, line Ministries, State and Regional Government etc.	- Success of REDD+ implementation is totally depend on full and effective participation of relevant stakeholders.	- Limited awareness about REDD+ so that their participation is still limited.	- Awareness raising campaign and capacity development trainings should continue to organize on regularly basis.

## 6. Financing

**Table 9. Gaps and Possible Solutions from financing aspect**

No.	Financing mechanism	Linkage to REDD+	Gaps	Possible solutions
1	National budgeting system	It provides budget for Forest Department's activities which include reducing deforestation and forest degradation and enhancing carbon stocks as well as NFMS	No specific budget allocation for REDD+ readiness	It is necessary to mainstream REDD+ into national budget system for regular allocation of budget annually.
2	Private sector financing	Private sector investing in private teak and other hard wood forest plantations which contributes to the REDD+.	No specific intention for REDD+ and climate change mitigation purposes.	Private sector should be organized to get involve, invest and contribute in REDD+ and climate change mitigation efforts.

3	Multi-lateral financing	It provides funding for REDD+ readiness.	No long-term commitment of financing for REDD+.	Sustainable financing mechanisms should be developed in collaboration with appropriate international organizations (to apply for Green Climate Fund-GCF and others).
4	Bilateral financing	It provides funding for REDD+ readiness and capacity building of Government staff, CSO, NGOs, local communities and relevant stakeholders.	It is a project basis and no long term commitment of financing for REDD+.	Bilateral cooperation should be extended in order to secure funding for sub-national (or Project level) REDD+ activities.
5	Environmental Trust Fund	It can provide REDD+ readiness and capacity building of Government staff, CSO, NGOs, local communities and relevant stakeholders.  It can also provide Carbon Enhancement activities	There is no Environmental Trust Fund in Myanmar.	Environmental Trust Fund should be created and it would contribute to the REDD+ substantially.
5	Payment for Environmental Services	It can provide REDD+ readiness and enhance of ecosystem services.	There is no legal background and PES practice in Myanmar.	PES should be initiated with the appropriate legal background.

### 6.1. Identification of priority gaps

Series of consultation meetings, expert interviews and round-table discussion have resulted that many gaps need to be fulfilled for the REDD+ readiness. In fact, it is not possible to implement all gaps at once or within short time due to limited funding, expertise and experiences. Therefore, based on expert consultations, priorities were again identified in order to estimate the cost of implementation. The follow table shows the lists of priorities and possible associated costs for fulfilling the gaps:

**Table 10. Prioritized Gaps and Possible Solutions for each Category**

No.	Category	Gaps	Possible solutions as priority
1	Policy	<ul style="list-style-type: none"> <li>- Weak policy supports for addressing drivers of deforestation particularly substitution of fuelwood and charcoal</li> <li>- Land use Policy (2016) is still in active and there are many land-related issues during the visits.</li> <li>- There is a lack of supporting policy and mechanisms linking to forest conservations.</li> </ul>	<ul style="list-style-type: none"> <li>- Identify possible source of energy including gas and electricity as well as energy efficiency programme such as efficient cook stove</li> </ul>
2	Legislations	<ul style="list-style-type: none"> <li>- <i>Legal support</i> for REDD+ implementation activities, land tenure and benefits is lacking as a consequence of absence of REDD+ concept in the laws</li> <li>- No legal support for REDD+ implementation in unclassified area (outside PFEs)</li> <li>- Rules/ Responsibilities for staff to implement REDD+ activities are not formulated in any inline department.</li> </ul>	<ul style="list-style-type: none"> <li>- A legal instrument for REDD+ securing implementation activities, tenure and benefits is needed to be formulated by the Forest Department or coordination of all relevant ministries.</li> <li>- A legal document for securing and supporting REDD+ in <i>unclassified forest</i> should be developed.</li> <li>- Setting up clear legally binding rules for implementation through staff/officers to do REDD+ activities.</li> </ul>

No.	Category	Gaps	Possible solutions as priority
3	Strategies and plans	<ul style="list-style-type: none"> <li>- Regarding the REDD+ Strategies, the financial investment requirements for implementing the Policies and Measures (PaMs) are, except for the funding requirements of the 10-year Reforestation and Rehabilitation Programme, not yet secured.</li> <li>- Regarding implementation of NDC, limited staff and inputs for reservation process.</li> <li>- Weak coordination and cooperation of some States and Regional Government, as well as local communities for reservation and establishment of Protected Areas.</li> <li>- Regarding NBSAP, there is a lack of integrated plan to address issues of climate change impacts and biodiversity loss</li> <li>- Weak coordination (limited coordination mechanism) for climate change-related sectors and biodiversity conservation-related sectors</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ investment plan need to be developed and find appropriate funding sources e.g. GCF. Or other bilateral cooperation</li> <li>- Cooperation among Government, INGOs, NGOs, CSOs and local communities should be strengthened.</li> <li>- Negotiation and forestry extension skills of staff members of Forest Department should be improved.</li> <li>- Integrated action plan should be developed for win-win approach especially climate change mitigation and biodiversity conservation</li> </ul>
4	Institutional capacity	<ul style="list-style-type: none"> <li>- There is no direct linkage between REDD+ Task Force and the NECCCCC</li> <li>- There is no capacity building and awareness raising programme for Task Force members as well as decision members. Task Force members are limited capacity and awareness about REDD+</li> <li>- There is no sub-national level TWG.</li> </ul>	<ul style="list-style-type: none"> <li>- A regular reporting system for the progress of REDD+ to the NECCCCC should be created.</li> <li>- Organizing capacity building and awareness raising programme for TF members</li> <li>- Sub-national level TWG should be formed and linked to National TWG.</li> </ul>

No.	Category	Gaps	Possible solutions as priority
5	Institutional arrangement	<ul style="list-style-type: none"> <li>- There is no direct linkage between REDD+ Task Force and the NECCCCC for overall supervision</li> <li>- Lack of sub-national level REDD+ TWG.</li> </ul>	<ul style="list-style-type: none"> <li>- A regular reporting system and mechanism should be built between REDD+ Taskforce and NECCCCC.</li> <li>- Sub-national level REDD+ TWG should be formed.</li> </ul>
6	Technology	<ul style="list-style-type: none"> <li>- Limited availability of up-to-date Satellite Images on a regular basis</li> <li>- Limited availability of high resolution satellite images</li> </ul>	<ul style="list-style-type: none"> <li>- Providing up-to-date satellite images on regular basis</li> <li>- Providing high resolution satellite images covering whole country but at least some hot spot areas on regular basis.</li> </ul>
7	Information sharing, awareness raising and stakeholder engagement	<ul style="list-style-type: none"> <li>- Limited articles and information about REDD+ progress.</li> <li>- Limited awareness about REDD+ so that their participation is still limited.</li> </ul>	<ul style="list-style-type: none"> <li>- REDD+ related articles and up-to-date information should be uploaded on regular basis.</li> </ul>
8	Financing	<ul style="list-style-type: none"> <li>- Regarding national budgeting system, there is no specific budget allocation for REDD+ readiness</li> </ul>	<ul style="list-style-type: none"> <li>- It is necessary to mainstream REDD+ into national budget system for regular allocation of budget annually.</li> </ul>

## **7. The way forward for national level implementation of REDD+**

Myanmar has been trying its best to be able to launch national level implementation of REDD+ as well as to access results-based payment through three phases: Phase I which covers capacity building and preparation of REDD+ four design element including developing national strategies and action plans, Phase II which is piloting and sub-national level implementation to demonstrate emission reduction and carbon enhancement through application of policies and measures and Phase III is the national level implementation of REDD+ for results-based payment.

It has been over three years of REDD+ readiness preparation since UN-REDD National Programme started in Myanmar in 2015. Furthermore, bilateral cooperation between Forest Department and international organizations, namely, ITTO, KFS, AAS have implemented sub-national level REDD+ projects/REDD+ related projects for capacity building of the government staff and relevant stakeholders to support REDD+ readiness. However, Myanmar as one of the least developed countries, there are many gaps, as mentioned above, to be fulfilled for the REDD+ readiness and successful implementation of national level REDD+ activities in order to be able to access results-based payment. It is of critical importance to fill the gaps step by step as well as in accordance with priority decisions.

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