



# **IMPLEMENTATION OF THE VIENNA PROGRAMME OF ACTION FOR LLDC**

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# Contents

1. Socio-economic development in LLDCs
2. ICT development and digitalization in LLDCs
3. Energy sector development in LLDCs
4. Trade and trade facilitation in LLDCs
5. Transportation in LLDCs
6. Climate change and mitigation in LLDCs

# 1. Socio-economic development

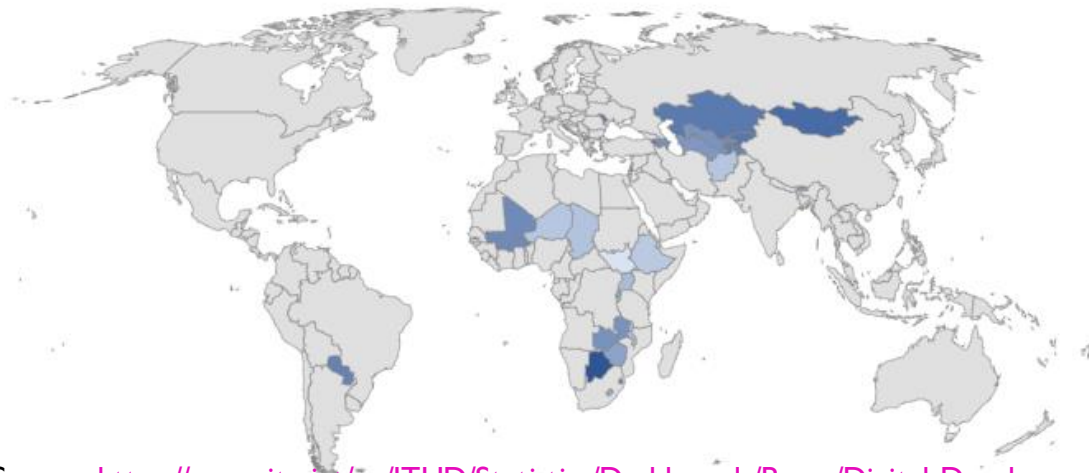
- Average GDP annual growth rate: 4.3% in 2019 and **2.4%** in 2020.
- Average GDP per capita: **USD 1 508**, the lowest level since 2013.
- GDP per capita: still **below USD 1 000** in 12 LLDCs.
- HDI value: **0.511** in 2019, the lowest level since 2013.
- The percentage of the population below the international poverty line of USD 1.90 per day: 27.3% in 2015 and **23.9%** in 2019.
- Social protection coverage: **14.2%**
- **18** are LLDCs experiencing food crises.

# 2. ICT development and digitalization

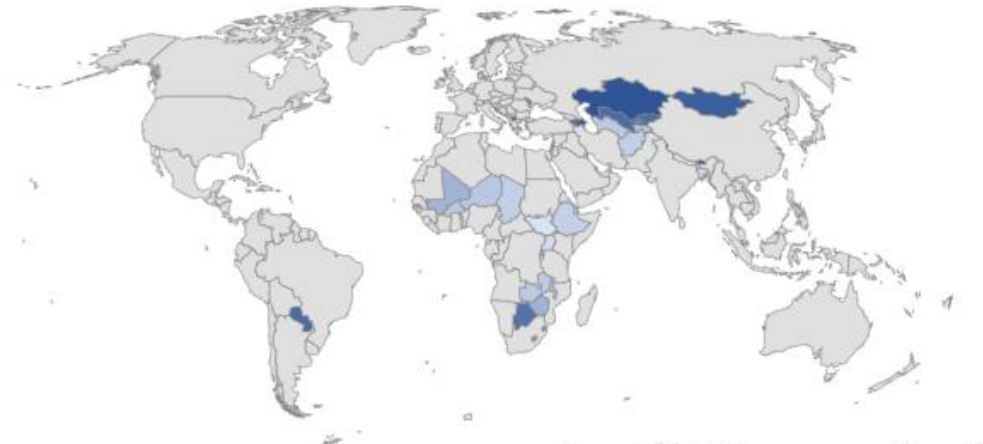
## VPoA Priority 2(b): ICT infrastructure selected indicators:

- **Mobile cellular subscriptions**
  - % of individuals using mobile:
    - **81.0% in LLDCs**
    - 108.0% in the World
    - 125.1% in developed countries
- **Access to internet**
  - % of individuals using internet:
    - **36.4% in LLDCs**
    - 66.3% in the World
    - 92.4% in developed countries

Mobile-cellular subscriptions per 100 inhabitants in LLDCs  30 161



Percentage of population using internet in LLDCs  6 91



# 2. ICT development and digitalization

## E-Government Development Index in LLDCs

Country	Rating class	EGDI rank	Subregion	OSI value	HCI value	TII value	EGDI (2022)	EGDI (2020)
Kazakhstan	V3	28	Central Asia	0.9344	0.9021	0.7520	0.8628	0.8375
Armenia	HV	64	Western Asia	0.7221	0.7945	0.6925	0.7364	0.7136
Uzbekistan	HV	69	Central Asia	0.7440	0.7778	0.6575	0.7265	0.6665
Republic of Moldova	HV	72	Eastern Europe	0.7380	0.8613	0.5760	0.7251	0.6881
Mongolia	HV	74	Eastern Asia	0.6263	0.8391	0.6973	0.7209	0.6497
North Macedonia	H3	80	Southern Europe	0.7020	0.7562	0.6417	0.7000	0.7083
Kyrgyzstan	H3	81	Central Asia	0.6176	0.8119	0.6637	0.6977	0.6749
Azerbaijan	H3	83	Western Asia	0.6119	0.7932	0.6761	0.6937	0.7100
Paraguay	H3	94	South America	0.6059	0.6947	0.5989	0.6332	0.6487
Bolivia (Plurinational State of)	H2	98	South America	0.5193	0.7483	0.5818	0.6165	0.6129
<i>Bhutan</i>	H2	115	Southern Asia	0.5996	0.5305	0.5261	0.5521	0.5777
Botswana	H1	118	Southern Africa	0.2740	0.6932	0.6814	0.5495	0.5383
<i>Rwanda*</i>	H1	119	Eastern Africa	0.7935	0.5322	0.3209	0.5489	0.4789
<i>Nepal*</i>	H1	125	Southern Asia	0.4592	0.5636	0.5123	0.5117	0.4699
<i>Tajikistan*</i>	H1	129	Central Asia	0.3968	0.7380	0.3770	0.5039	0.4649
<i>Zambia*</i>	H1	131	Eastern Africa	0.4414	0.6744	0.3909	0.5022	0.4242

Sources: 2020 and 2022 United Nations E-Government Surveys.

## Digital Transformation Index rankings and grade levels of LLDCs

Rank	Country	Grade
61	Azerbaijan	B
62	Kazakhstan	B
77	Botswana	C
78	Mongolia	C
80	Paraguay	C
83	Rwanda	C
89	Lao PDR	C
93	Uganda	C
94	Nepal	C
98	Zambia	C
99	Zimbabwe	D
102	Mali	D
103	Malawi	D
104	Burkina Faso	D

# 2. ICT development and digitalization

- **Challenges in times of pandemic and crisis in LLDCs**

- Accelerated mass digital adoption
- Deepened digital divide between and within the countries
- Becoming digital by default: e-governance, e-financing, e-learning, e-trade, and all sectors

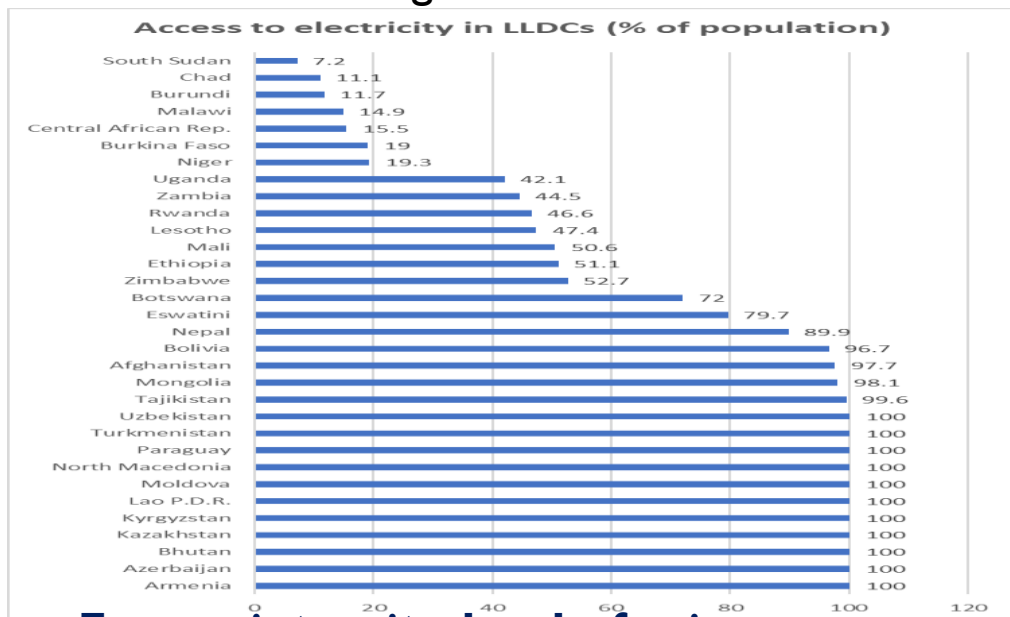
- **Ways forward for LLDCs**

- Accelerate investment in ICT infrastructure networks and connectivity, and Digital technologies and applications
- Conduct research and policy analysis on regulatory frameworks, policies and programmes on digital transforming trends and consequences
- Strengthen data systems, privacy, security, protection, cybersecurity and data resource management
- Strengthen digital literacy and skills in all sectors including disaster risk reduction, SMEs, financial services and etc.

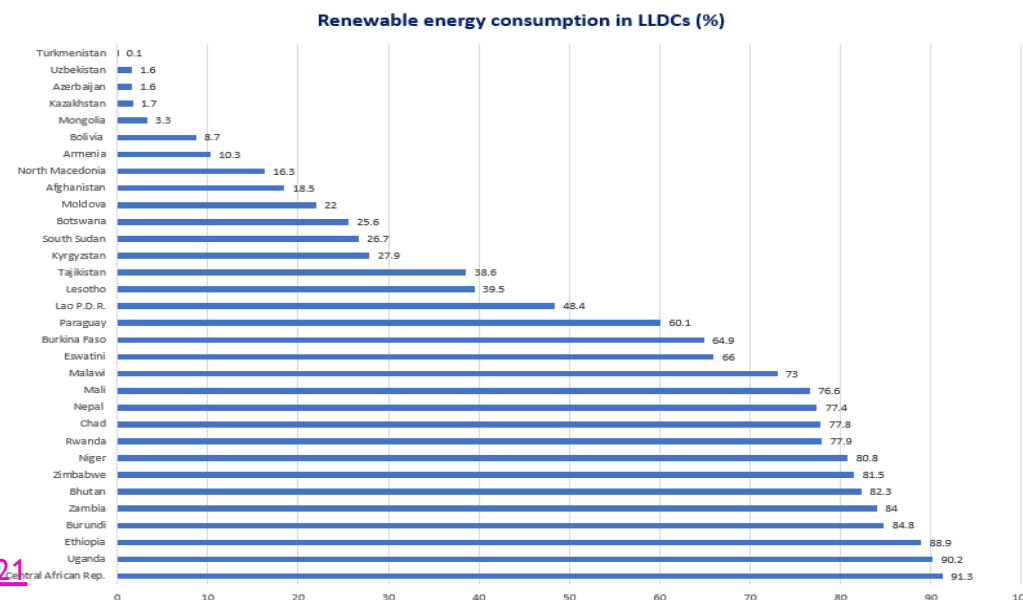
# 3. Energy sector development

## VPoA Priority 2(b): Energy infrastructure selected indicators 2022

- **Access to electricity** (% of population):
  - LLDCs average: **58.5%**
  - World average: **90.5%**



- **Proportion of population with primary reliance on clean fuels and technology** (%)
  - LLDCs average: **27%**
  - World average: **69%**
- **Renewable energy consumption** (% of total final energy consumption)
  - LLDCs average: **43.1%**
  - World average: **17.7%**



- **Energy intensity level of primary energy** (megajoules per constant 2017 purchasing power parity GDP)
  - LLDCs average: **6.2%**
  - World average: **4.7%**

# 3. Energy sector development

## Ways forward for LLDCs

- Increase investment and support renewable energy, as it contributes to community resilience and delivery of national development and climate action targets in LLDCs;
- Integrating policies ensure flexible deployment of resources and sustained system reliability;
- Better use public–private partnerships (PPPs);
- Exploit existing opportunities for cross-border bilateral renewable electricity trade with neighbouring countries and through regional electricity markets.
- Green financing (carbon credit)



# 4. International trade and trade facilitation

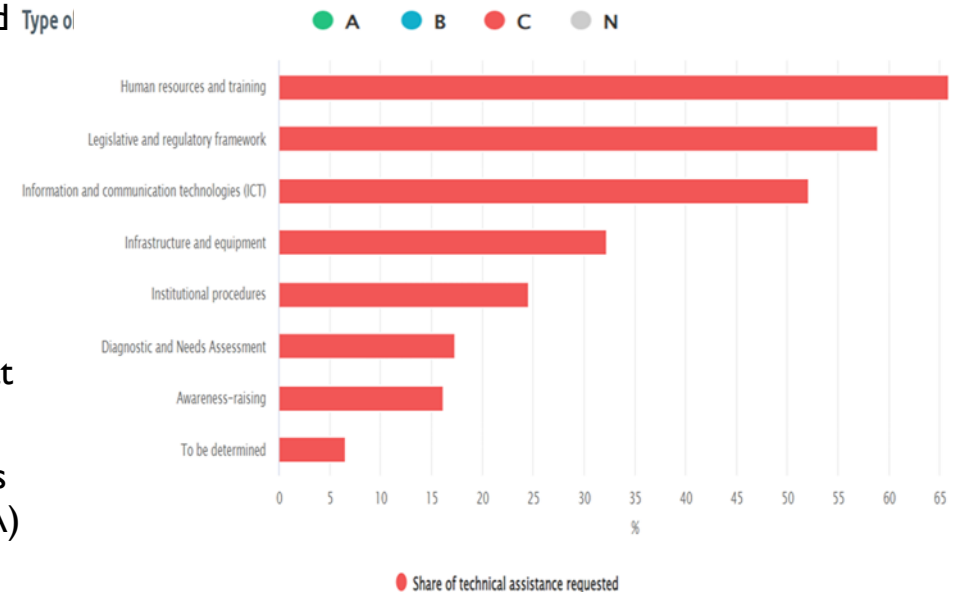
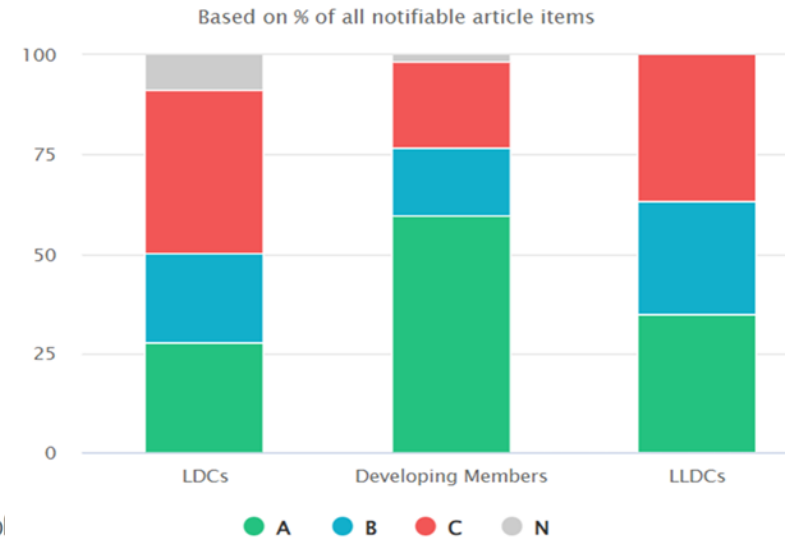
## **COVID-19 impact on LLDCs' international trade:**

- Increased and urgent demand for health care, medical equipment and pharmaceutical products
- Highly dependent on transit countries
- More costs and times for export and import
- Heavily reliant on commodity exports
- Importance of digital technologies and digitalization

# 4. International trade and trade facilitation

- **TFA ratification** - 156 countries and 26 LLDCs
- **The rate of implementation of TFA commitments in LLDCs:**
  - 56.2% in 2022
  - 50.7% in 2021
- **Benefits of TFA implementation for LLDCs:**
  - Reduction of trade costs estimated (by OECD) to be:
    - 14.5% for low income countries (that includes 10 LLDCs)
    - 15.5% for middle income countries (that includes 9 LLDCs)
    - 13.2% for upper middle income countries (that includes 4 LLDCs)
- **Key challenges(WTO and ESCAP surveys):**
  - Financial constraints
  - Lack of coordination between government agencies (in the development and maintenance of transport infrastructure, e.g. inefficient border infrastructure, and between customs and other border agencies and traders, e.g. unwarranted long waiting times at customs)
  - Limited human resources (e.g. shortage of skilled staff to promote better understanding of the TFA)
  - Weak standardization and harmonization (e.g. transloading from and between different modes of freight)
  - Lack of border coordination and burdensome documentary requirements and paper processing of documentation (e.g. multiple clearances and declarations at customs)
  - Lack of equipment and digital infrastructures (e.g. information communications technology (ICT) and laboratory equipment for the implementation of the TFA)

Share of Categories A, B, C by grouping



# 4. Further concerns for LLDC trade and trade facilitation

- Increased support from the international community and development partners in implementing the WTO's TFA in LLDCs to simplify, modernize and harmonize export and import processes
- Enhanced connectivity by digitalizing border processes, enhanced implementation of the TFA and targeted Aid for Trade support
- Concerted action towards joining the international trade system
- Constructive cooperation of transit countries for the early and effective implementation
- Involvement of private sector
- Multidimensional approaches - implementation of policies and measures aimed at economic restructuring
- The development of productive capacities
- Export-led growth, diversification of higher-value added activities and destinations of imports and exports
- Greater engagement in regional and global trade by strengthening LLDCs' infrastructure and connectivity

# 5. Transportation

- Increasing connectivity is the crucial way to transform landlocked countries into land linked countries



For Asian LLDCs, particularly in Central Asia, railway plays a central role in regional transport network to transport goods.

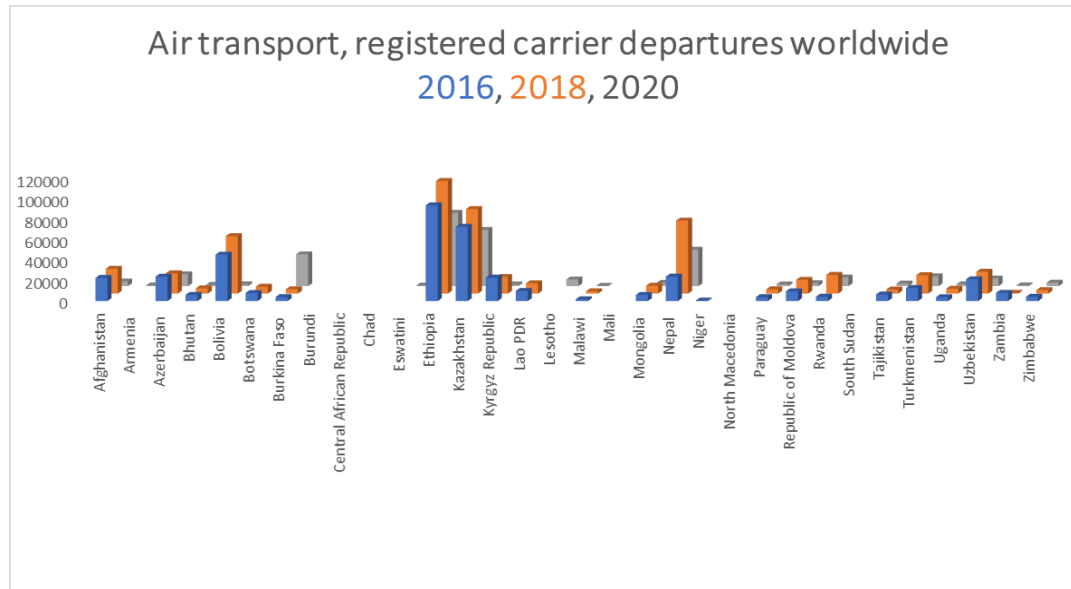
# 5. Transportation

Air Transport flow decreased during Covid-19:

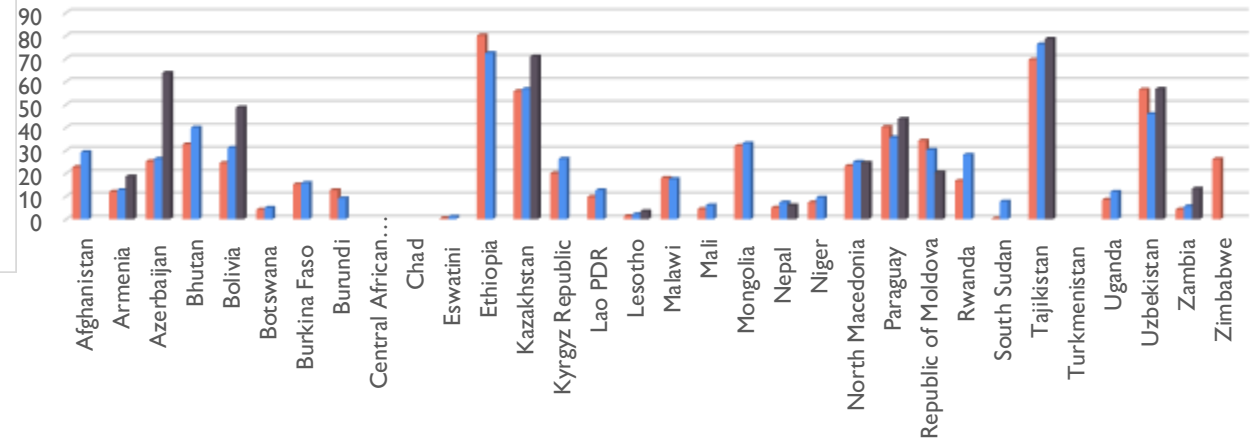
- Kyrgyz Republic
- Niger
- Botswana
- Lao PDR

Transport service exports became zero in some LLDCs in 2021. For example:

- Bhutan
- Burundi
- Niger
- Uganda



Transport service export, percentage  
2016, 2018, 2021



Source:  
[https://www.un.org/ohrrls/sites/www.un.org.ohrrls/files/statistical\\_annex\\_vpoa\\_2022.pdf#page=15](https://www.un.org/ohrrls/sites/www.un.org.ohrrls/files/statistical_annex_vpoa_2022.pdf#page=15)

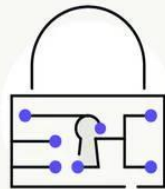
# 5. Further concern for transportation sector development

- Support electric transport
- Develop air transportation
- Trade with “High value, Low bulk products”

## The future of transportation hopes to:



Lessen greenhouse gas emissions



Secure technological advancements



Provide access for the disadvantaged



Curb fatalities



Reduce road congestion



Increase travel speed

The National workshop on mainstreaming the VPoA was organized by the ITLLDC in association with the Ministry of Foreign Affairs of Mongolia and UN Office of the High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing Countries (OHRLLS) in Ulaanbaatar on 27-28 April, 2016

Launching event of the study on “Bilateral Transit and Transportation Agreements of LLDCs: Benefits and Bottlenecks – Case India and Nepal” was successfully organized by the ITT for LLDCs at the Ministry of Foreign Affairs of Mongolia on June 12, 2017.

ITLLDCs, Mongolian Maritime Administration, GS1 Mongolia international organization, Federation of Mongolian Freight Forwarders, and Mongolian Logistics Association jointly organized a virtual seminar on “Current state of transportation and logistics, and opportunities for improvement in landlocked Mongolia” on March 5, 2021.

## 6. Climate Change in LLDCs

Climate change poses significant challenges for LLDCs, who are already grappling with issues such as poverty, food insecurity, and limited access to resources and markets. LLDCs are particularly vulnerable to the impacts of climate change, such as increased frequency and intensity of extreme weather events, changes in precipitation patterns, and rising temperatures.

- **Temperature increase:** According to the Intergovernmental Panel on Climate Change (IPCC), LLDCs are experiencing a faster temperature increase compared to the global average. From 1900 to 2016, the average temperature in LLDCs increased by 1.42°C, compared to the global average of 0.87°C.
- **Extreme weather events:** LLDCs are also experiencing more frequent and severe extreme weather events, such as droughts and floods. For example, in 2019, Cyclone Idai caused devastating floods in several LLDCs in southern Africa, affecting millions of people.

# 6. CLIMATE CHANGE MITIGATION

- **Agriculture:** LLDCs heavily rely on agriculture, which is highly vulnerable to climate change impacts. Changes in temperature and precipitation patterns, as well as extreme weather events, can lead to reduced crop yields, food insecurity, and poverty. About 70% of the population in LLDCs is engaged in agriculture, and the sector accounts for about 25% of their GDP.
- **Renewable energy:** Despite their vulnerability, LLDCs have significant potential for renewable energy, particularly solar and hydropower. In fact, some LLDCs have set ambitious targets for renewable energy development, which can help reduce their dependence on fossil fuels and contribute to global efforts to mitigate climate change.



# 6. CLIMATE CHANGE MITIGATION

- **Build climate resilience:** LLDCs should prioritize building resilience to the impacts of climate change by implementing adaptation measures such as improved water management, drought-resistant crops, and early warning systems for natural disasters. They should also invest in infrastructure that can withstand extreme weather events such as floods and landslides.
- **Promote sustainable land use practices:** Sustainable land use practices such as agroforestry, conservation agriculture, and sustainable forest management can help mitigate the impacts of climate change. LLDCs should promote these practices to reduce greenhouse gas emissions, increase carbon sequestration, and improve soil health.
- **Transition to cleaner energy sources:** LLDCs should transition to cleaner energy sources such as renewable energy to reduce their greenhouse gas emissions. They can also promote energy efficiency measures to reduce energy consumption.

## 6. CLIMATE CHANGE MITIGATION

- **Foster international cooperation:** International cooperation is critical for LLDCs to access the resources they need to address climate change. Developed countries and international organizations should provide financial and technical assistance to help LLDCs build their capacity to adapt to and mitigate the impacts of climate change.
- **Promote sustainable transportation:** LLDCs should promote sustainable transportation modes such as public transit, cycling, and walking to reduce greenhouse gas emissions from the transportation sector.
- **Empower local communities:** Empowering local communities to participate in climate change decision-making can help ensure that their needs and priorities are taken into account. LLDCs should engage with local communities and provide them with the resources and support they need to implement climate change solutions that are tailored to their specific needs.

## 6. CLIMATE CHANGE MITIGATION

- Overall, the climate change situation in LLDCs is challenging, but there are opportunities for adaptation and mitigation. However, LLDCs face significant barriers to accessing funding and technology transfer to support their efforts, which highlights the importance of international cooperation and support.
- Landlocked developing countries face unique challenges in achieving net zero and accessing carbon credits due to their geographical and economic constraints. LLDCs often have limited access to international markets and face higher transportation costs, which can make it more difficult for them to participate in global carbon trading schemes.
- All in all, achieving net zero and accessing carbon credits in LLDCs requires a combination of policy and institutional reforms, investment in renewable energy and carbon sequestration projects, and international cooperation and support.

# 6. CLIMATE CHANGE MITIGATION

18 LLDCs enacted NET ZERO TARGET into law 41 Proposed/ in discussion-10 from LLDCs

**46 Policy document- 3 from LLDCs**

- Armenia
- Nepal
- Laos

**14 Declaration/ pledge- 1 from LLDC**

- Kazakhstan

- Afghanistan
- Burkina Faso
- Burundi
- Central African Republic
- Chad
- Malawi
- Mali
- Niger
- Rwanda
- Zambia

# 6. CLIMATE CHANGE MITIGATION

- **Net Zero is impossible unless the world invests in developing countries (the World Economic Forum)**
- **770 million people worldwide without electricity**
- **The demand for electricity is expected to increase significantly in the future**
- **In the future, developing countries will account for the majority of CO2 emissions**
  
- By 2030, clean energy investment in developing nations need to reach 1 trillion USD annually
- 70 percent of funding will need to come from the private sector
- A 'just transition' away from fossil fuels is imperative



# THANK YOU!

