

# Guiding Principles of Green Economy: An Empirical Review

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## Abstract

This paper provided a critical discussion of guiding principles for green economy particularly as they shape the transformation towards a green economy in developing countries. Different green economy definitions were discussed. The approach chosen was qualitative and desktop-based content analysis and desk research, where a wide range of available secondary literature including journal articles, reports of international organizations such as the UN Division for Sustainable Development (UNDESA) were consulted. The paper showed there were eight published sets of green economy principles or characteristics before the Rio+20. Additional green economy principles extracted from the Rio+20 outcome documents were discussed. Paper conclusions affirmed that these principles could contribute to sustainable economic, social, and environmental development. Policy recommendations and future direction for the green national development agenda have been presented.

**Keywords:** Principles, green economy, social equity, economic growth.

## I. Introduction

Obviously, various countries around the world face various food and financial crises, climate change crisis, resource and environmental degradation issues. All this necessitates world leaders to come together at various forums to discuss the way forward for the world. The UN Conference on Environment and Development (UNCED) at Rio de Janeiro in 1992 is one such international gathering of world leaders in which the framework on sustainable development was formally adopted (Elonore et al., 2016). As a result, there was a call upon the governments to draw up the strategies of sustainable national development with policy responses provided by the Rio Declaration and the Agenda 21. Despite numerous initiatives from many governments worldwide to put such strategies into practice and the efforts of international collaboration to provide support for the implementation efforts of the national governments, it is observed by Kanianska (2017) that an increasing number of international stakeholders are in concern on the status of the global economic and environmental performance among most of the world's countries. To top it, global Scientists have frequently alerted against a risk on the part of the global society of trans-gressing a whole series of planets boundaries.

In the context of the aforementioned situation, national Governments today look for ways on how to tackle this interconnected environmental and economic crisis and steer the society out, taking into account the given ecologic bounds. It is because of this fact that the concept of 'green economy' was born and considered by numerous international Organizations as the strategy to achieve sustainability (Barbier, 2012). Thus, the concept gained remarkable global popularity since then, becoming perceived as an efficient method to answer the financial and climate change crisis and an imperative element for success in meeting the climate change mitigation target adopted in Paris. According to Cameron and Stuart (2012): "perhaps a key benefit of the emergence of the green economy concept has been that it has stimulated international attention and renewed global efforts to transform our current unsustainable economic model into one which better aligns with the overarching goals of sustainable development".

At the national level, a number of governments have recently developed green economy plans, strategies and programs. In Nigeria, for example, transition plan to green and low-carbon economy has been supported by The Climate Change Act 2021, which was developed as the framework for climate change action mainstreaming resilience and net-zero emission by 2060 (Hile, 2024). Many international organizations like, the United Nations Environment Programme (UNEP), the UN Department of Economic and Social Affairs (UNDESA), the United Nations Conference on Trade and Development (UNCTAD), the International Labour Organization (ILO), the World Bank, the Organisation for Economic Cooperation and Development (OECD), etc, now consider green economy concepts.

Therefore, for efficient implementation of the green economy, certain guiding principles and enabling conditions must be implemented (UNEP, 2011). In addition to that, the following paper reviews green economy guiding principles to provide clarity about the interpretation of this concept among international Organizations, as well as other interested stakeholders, to support practitioners, address risks and concerns related to green economy (Cameron, 2012).

## **II. Theoretical Framework**

This study is grounded on three interdependent theoretical dimensions because of the complex nature of the green economy concept; i.e., Ecological Economics Theory, Political Ecology Theory and Environmental Justice Theory. The ecological economics theory, which emerged in the late 1980s from the work of researchers like Herman, E. Daly and Robert Costanza, contradicts the traditional neoclassical economics paradigm that treats natural resources as infinite input into economic production processes, and rather sees the economy as a part of the finite ecological system of the earth, emphasizing ecological integrity as prerequisite for long run economy development (Daly, 1996; Costanza et al., 2015). Furthermore, Ecological economics theory advocates the necessity for economic activities to be conducted within natural planetary boundaries, especially given the increased environmental degradation and resource depletion that militates against the idea of sustainable development (Raworth, 2017).

Hence, this theory underlies some key principles of green economy such as; efficient resource utilization, diversity of species and ecosystems, and renewable resource based, closed-material loops, among other practices that correspond closely with the goals of green economy-to improve economic growth while reducing risks and eco-scarcity. Political ecology theory, which evolves from environmental and political economy, asserts that environmental destruction arises from issues related to differential access to resources, weak governance, an underdevelopment of institutions, and conflicts of interest between governments, communities, and corporations. Therefore, in this context, effective transition to green economy not only requires technological development, but must be backed by transparent governance, inclusive governance, equitable access to resources and equitable sharing of benefits, as well as effective stakeholder engagements. In this connection, political ecology is consistent with the principles of governance, stakeholder involvement, effective policymaking, accountability and equitable distribution.

According to Robbins (2020), policy interventions should go far beyond technological measures in to designing appropriate governance frameworks to improve governance for people in a marginalized area as protection mechanisms. Environmental Justice Theory emphasizes the ‘basic human right of every individual to live in health, clean and safe environment irrespective of socioeconomic status, gender, ethnicity or geographical context’ (Schlosberg, 2007). The theory argues that transition to the green economy should not entrench or intensify inequities; therefore, policy interventions must protect the vulnerable population by, for example, providing additional support for job creation, poverty alleviation, and cleaner access, among others to prevent inequalities. Environmental Justice theory addresses a variety of dimensions related to green economy such as equitable sharing of the benefits and burdens of green initiatives such as; equitable benefits from green economic initiatives to disadvantaged groups; promote fair implementation policies; social and inclusive policies, pro-poor policies and female policies to green economy initiatives in all stages. In this view, environmentally Just transition demands equitable outcomes. By and large these theoretical approaches demonstrate that the green economy needs an integration of the goals of economic wellbeing, ecological integrity, and social justice, just in accordance with the concept of the triple bottom line of sustainable development.

## **III. Materials and Method**

Using a Qualitative Content Analytic approach 3 we examine empirical evidence pertaining to the guiding principles of green economy. In this content analysis, a standard process of identifying, coding, organising and synthesizing relevant results from published work, policy papers, empirical

evidence was performed in search of common concepts, terms, patterns and relations (Krippendorff, 2019; Schreier, 2021; Mursid et al., 2024) following procedures below: 3.1 Search and selection of study. We performed a search for articles using reliable online databases such as Google Scholar, Scopus, Web of Science, Science Direct.com, Springer Nature Link and Research Gate that we know are popular for coverage of Peer Reviewed journal and their bibliometric information is strong (Khatib et al., 2021; Khatib et al., 2022). We focused primarily on peer reviewed journal papers, books, International Organisations (UNEP, OECD, UNDP, DESA, UNCTAD, UNCSD, World Bank) work and relevant other policy works written within years 2012-2026 in which the researchers are keenly interested on (Mo et al., 2024).

Search was conducted with the following search terms, “green economy” “green economy” + principle “green economy” + sustainable development “green economy” + just transition “green economy” + environmental justice “green economy” + low carbon “UNEP” AND “Green economy” “World Bank” AND “Green Economy”. Only articles in English were collected.

3.2 Selection criteria. For each of the included pieces, inclusion criteria, based on explicit reference and discussion of concepts and principles of the green economy were searched, such as; a range of publications during 2012-2026 as suggested (Table 1) and relevant and up-to-date articles as suggested. Criteria of inclusion consisted of is that the reference should be a paper, and should clearly address at some level concepts, and principles of green economy. Studies based entirely on opinion, or that lacked detailed data to support claims were deliberately excluded.

Process of Coding. In order to address and to consolidate issues into groups, descriptive codes were assigned to appropriate sections of the text related to a specific guiding principle of green economy, i.e. to include the terms that appeared frequently and referred to “environmental protection”, “resource efficiency”, “carbon free economy”, “inclusive economy”, “poverty reduction”, “green jobs”, “circular economy”, “climate Resilience”, “good governance”, “sustainable consumption and production”. This was followed by grouping those codes which were similar in order to make logical analysis of themes and also identifying key guiding principles for green economy and their interpretation based on findings on empirical studies with relevance given to role played by the guiding principle in overall economic and environmental protection, social equitability, climate mitigation, climate change prevention and SDGS achievement.

Process of Quality appraisal. In order to improve robustness and rigor to our data each article was systematically appraised and scored by one reviewer using an adapted tool from CASP guidelines criteria by referring to specific research goals and objectives, methodology employed, clarity of presentation of the results and whether policy options were addressed. At this stage, approximately 58.3 % (35 out of 60 reviewed) were of high quality, 33.3% (20 out of 60 reviewed) were of moderate quality and 8.3 % (5 out of 60 reviewed) were considered low quality (Miyan et al., 2026).

#### IV. Findings

The main findings from the qualitative and content analysis of the relevant sourced materials are discussed below:

##### A. Concept of Green Economy

The Green Economy, as explained by the Green Economy Coalition (GEC, 2020), is a process of transforming economic systems, thereby redefining policy priorities from scratch. It is a multidimensional concept and usually highlighted along three dimensions; low carbon emissions and pollution reduction, sustainable resource management, and social inclusion or equity (Lee et al., 2022; Mealy & Teytelboym, 2022). In attempting to define what a green economy refers to, it should be explicitly highlighted that not all of the organizations and institutions in existence – both national and European – share a common definition for such concept (Knianska, 2017; Kamila, 2020).

**Green Economy UNEP (2009):** It is a system of economic activities that produce well-being (through production, distribution and consumption of goods and the supplying of service, while not increasing risk of environmental degradation and relative to ecological scarcity”.

**UNEP (2011):** It is an economy raises human-being and social fairness, decreasing sharply environmental risks and ecological deficit, with low carbon emissions, efficient use of resources and socially inclusive.

**Green Economy UNCTAD (2011):** An economy that allows an improved wellbeing in terms of welfare of population and decreased inequity, without exposing to environmental risk, relative or ecological scarcity, of the generations to come and that, from short-term actions aimed to mitigate environmental risks, allows to have long-term benefits in terms of development for human society.

Green Economy Coalition [GEC] (2012) ...a resilient economy that provides a better quality of life for all within the ecological limits of the planets”.

**International Chamber of Commerce (ICC) (2012):** “...an economy in which economic growth and environmental responsibility work together in a mutually reinforcing fashion while sup-orting progress on social development”.

**European Environment Agency [EEA] (2013):** “an economy in which environmental policy, economic policy and social innovation enables efficient use of resources, enhancing human well-being in a more and inclusive manner, as it maintains all resources that have substance”.

Recently, green economy has been conceptualized as the integrated application of economic, environmental, and social priorities (Sustainable Development Goal indicators). Therefore, it has come to emphasize a multidimensional, inclusive, low-carbon, resource-efficient development strategy focused on creating a thriving, sustainable, and equitable society. Merino-Saum et al. (2020), in particular, find through analyzing more than 140 definitions “that there is not a singular definition; the concepts discussed exist under various theoretical frameworks but can be organized along four interconnected dimensions: natural capital, resource efficiency, economy and social well-being”. More recently, the green economy concept has evolved, from a nascent policy initiative into an interdisciplinary research field.

The most recent body of literature defines the green economy as “a pathway to overcome issues of ecological limitations and social insecurities by creating new opportunities through various approaches to environmental management and technological change aiming for an increased level of well-being and reduction of economic inequality (Dogaru, 2021). Dogaru (2021) states it “encompasses a systems of activities related to the production, distribution and consumption which correlated with the process of the elimination of the dysfunction generated by growth. It denotes type of economy which brings about well-being and social equality, correlating with the substantial decline of the deficit concerning the environment and ecology; type of low-carbon economy, conducive to environmental and social security, and to inclusive development as well. This is reflected in green growth.

Furthermore, Asongu & Odhiambo (2021) defined green economy in terms of its purpose as “an economy that addresses environmental risks and the issue of ecological scarcities, by aiming towards the preservation of the environmental”. As we had noticed, there is no fixed and uniform explanation to the concept of Green Economy. The different interpretations provided can either be viewed as complimentary or as contrasting with each other. However, based on recent scholarly perspectives and literature, we can make the concluding argument that the Green Economy is broadly defined as a dynamic, complex and integrated approach to economic development. Specifically, the green economy offers a model for reorienting and transforming socio-economic structures, policies, investment patterns, resource utilization and technologies to foster long-term economic growth and improved human well-being, while substantially reducing greenhouse gas emissions and environmental damage, promoting efficient use of resources, protecting the natural resource base, and enhancing social inclusion and equity.

In other words, it addresses and integrates the three pillars of sustainable development.

## **B. Green Economy Principles**

In attempting to “unpack” or “demystify” the green economy concept, Cameron (2012) in a document for UNDESA drew together several sets of green economy principles published in the lead-



up to Rio+20. While some organisations used the term “principles” some had “characteristics”. These organisations were the Green Economy Coalition, the International Chamber of Commerce (ICC) and the Stakeholder Forum and are reviewed below:

### **1. Green Economy Principles as published by the Green Economy Coalition, 2012**

Principles of the Green Economy as listed by the Green Economy Coalition, 2012

Under the cooperation of different institutions in early 2012 the Green Economy Coalition had set out nine (9) principles for a green economy, which are given below:

- i. It delivers sustainable development.
- ii. It delivers equity - The Justice Principle.
- iii. It creates genuine prosperity and well-being for all - The Dignity Principle.
- iv. It improves the natural world - The Earth Integrity, Planetary Boundaries and Precautionary Principle.
- v. It is inclusive and participatory in decision making - The Inclusion Principle.
- vi. It is accountable - The Governance Principle.
- vii. It builds economic, social and environmental resilience - The Resilience Principle.
- viii. It delivers sustainable consumption and production - The Efficiency Principle.
- ix. It invests for the future - The Intergenerational Principle.

In another document published in 2020 the Green Economy Coalition brought out five (5) key principles which draw on important established policies on international issues, and can be used for economic reforms in different circumstances. They are:

**The Wellbeing Principle:** A green economy enabling all people to create and enjoy prosperity.

In people, the Green Economy aims to bring forth authentic well-being. It invests and ensures access to green systems, infrastructure, jobs, knowledge, education and livelihoods to achieve this objective through personal efforts and collective action;

**The Justice Principle:** The Green Economy fosters equity within and between generations.

It encourages an inclusive non-discriminatory, fair distribution of wealth, jobs and opportunities between people and a fair level of benefits to nature as well as providing future citizens a prosperous economy, urgent efforts to eradicate current societal poverty and injustice, strengthen collective solidarity through human rights, workers' rights, right to sustainable development, human minorities' rights, right of indigenous people and women empowerment, empower MSMEs, social enterprises, sustainable livelihoods and ensuring smooth and fair transition leaving no person behind with adequate provision of social safety net;

**The Planetary Boundaries Principle:** The Green Economy safeguards, restores and invests in nature.

It advocates for the full range of values of nature's functions; ecological, cultural, functional values that are critical for the sustenance of economies, cultures, and all life, acknowledging that no substitutes are available, while avoiding critical loss of natural capitals through the adoption of precautionary principle;

**The Efficiency and Sufficiency Principle:** The Green Economy is aligned with sustainable consumption and production.

It promotes diverse, resource-saving, low-carbon and circular economic activities addressing issues related to developing true prosperity within the planet's boundaries; it recognizes the necessity to shift global consumption towards sustainable levels to avoid ecological collapse, acknowledges the essential minimum level of consumption that ensures basic goods and services for dignified living, 'peak' consumption beyond which is unsustainable, encourages polluter to bear the cost;

**The Good Governance Principle:** It is guided by resilient, accountable and integrated institutions.

Evidence-based norms and institutions, with sound science and economics applied alongside local knowledge, steer the Green Economy strategies, for which effective institutions with adequate capacity for coordinated and accountable governance across sectors at different levels are required with the participation of the public, informed consent of the people, freedom of any vested interests and transparent, collaborative, democratically accountable society based on social dialogue and

decentralization of power over management of nature, while maintaining strong central policies for ensuring national standards and providing a robust financial system for the environment..

## **2. Green Economy Principles as published by Stakeholder Forum, BioRegional & Earth Charter, 2012**

Hansah et al. (2012) have pointed out that, the Stakeholder Forum, BioRegional and the Earth Charter Initiative (ECI) have developed fifteen guiding principles which seek to encapsulate major commitments under existing key international agreements and innovative global initiatives to forge common ground on how to achieve a more sustainable and inclusive green economy. These fifteen guiding principles drew ideas from numerous international instruments and global networks, including the Stockholm Declaration, the Rio Declaration, the Johannesburg Declaration, the Earth Charter, the One Planet Living Principles, the Green Economy Coalition, the Trade Union Congress, the Just Transition framework, and the New Economics Foundation. These principles are considered to form a normative framework for the drive towards a green economy that supports sustainable development.

The fifteen guiding principles are:

- (i) fair and equitable distribution of wealth;
- (ii) economic justice based on the principles of common but differentiated responsibility (CBDR);
- (iii) inter-generational equity which protect the interests of future generations;
- (iv) application of the precautionary principle in the processes of decision-making,;
- (v) right to development must be exercised within the limits defined by current environmental and socio- economic sustainability standards;
- (vi) internalisation of external costs of environmental damage into market mechanisms;
- (vii) encouragement for effective international corporation;
- (viii) enhancement of international accountability and liability;
- (ix) ensuring transparency, access to information and inclusive decision making (accountability);
- (x) stimulation of sustainable consumption patterns and lifestyles;
- (xi) to implement strategies and policy coherence for an integrated approach to sustainable development, green economy, and poverty eradication;
- (xii) provide the basis for a just transition toward sustainability;
- (xiii) societal well-being must extend beyond its conception in terms of monetary wealth;
- (xiv) promote of gender equity; and (xv) preservation of biodiversity and prevention of pollution of land, water and the air,;

## **3. Green Economy Principles as published by the International Chamber of Commerce (ICC) 2011**

The International Chamber of Commerce (ICC), through its Commission on Environment and Energy Task Force on Green Economy (Task Force), developed a framework of ten key conditions to promote national transitions toward a green economy. The ten conditions can be classified under the following three areas-social innovation, environmental innovation, and economic innovation-with two cross-cutting components:

Social innovation:

- i. Promoting widespread awareness on global socio-economic and environmental challenges and opportunities
- ii. Strengthening education and capacity building activities, which form the bedrock for green economy action plans
- iii. Fostering decent and rewarding work opportunities.

Environmental innovation:

- iv. Driving resource efficiency, delinking economic activity from environmental impacts and degradation
- v. Encouraging application of life-cycle approach to production and consumption

Economic innovation:

- vi. Encouraging openness and a competitive market system
- vii. Defining alternative measurement and accounting system, going beyond the GDP to measure the outcomes for sustainability.
- viii. Developing finance and investment arrangements that encourage innovation both for private and public sectors.

Cross-cutting elements:

- ix. Integrating environmental, economic and social consideration in the policy formulation and decision-making processes.
- x. Strengthening governance structures, promoting partnerships and collaborative approaches (ICC, 2012).

#### **4. Green Economy Principles by ITUC**

In January 2012, the International Trade Union Confederation (ITUC) developed ten core principles, which state that any effective green economy must also be fair and create decent work. In a statement representing the global labour movement, this vision for an inclusive and equitable green transition was articulated by ITUC as follows:

- i. Securing fairness at both an international and intra-national level.
- ii. Championing public participation and inclusion for all, especially for youth, women, minority groups and low-skilled workers.
- iii. Transforming existing employment systems while actively creating new green jobs which are decent and socially just.
- iv. Respecting and defending human and workers rights, and trade union freedoms.
- v. Fulfilling long term social rights by providing adequate levels of services and goods including water, food, housing, energy, and health.
- vi. Efficient management of natural resources, particularly by promoting renewables and fully valuing externalities and environmental costs, towards zero emission and zero waste goals.
- vii. Improving labour productivity to the benefit of working people and not through measures that reduce labour costs.
- viii. Providing a just transition for workers and communities affected by the reform of environmental policies, supported by greater social security and opportunities to consult with public authorities and employers.
- x. Strengthening democratic governance.
- x. Grounding the economy in real assets not in speculative finance (ITUC, 2012).

#### **5. Green Economy Principles by ANPED (2012)**

Northern Alliance for Sustainability (ANPED), a network of northern-based environmental NGOs, adopted eight key principles of what constitutes a fair and responsible economy:

- i. Earth Integrity Principle: planet/its ecosystems have an inherent right to exist, thrive; our shared duty is to protect them.
- ii. Planetary Boundaries Principle: recognizes that our expansion as humans has its limits on our planet's health and therefore encourages actions within ecological boundaries that ensure well-being for all.
- iii. Dignity Principle: everybody has a right to a sustainable life now and in the future. No nation has the right to accumulate welfare at the expense of another country or future generation. It must enable access for everyone to the minimum to support a dignified life: no poverty is a must to build a fair green economy.
- iv. Justice Principle: addresses distribution, fairness, transparency in and across generations and borders; guarantees accountability and access to all sources both natural and social for all citizens.
- v. Precautionary Principle: prohibits any measure or innovation that may cause damage to the environment, including its living beings without full and solid guarantees and data; innovation implies full accountability for potential negative consequences of any new technology or product.

- vi. Resilience Principle: stresses the importance of diversity at the system level-including biological, economic, and governance level-and fosters systemic change through such diversity in order to guarantee the resilience of our future.
- vii. Governance Principle: emphasizes the necessity of participation in decision making processes, accountability and the principle of subsidiarity. Decisions are most effective and resilient where affected people have clear insight in and the right to vote.
- viii. Beyond-GDP Principle: discourages using the GDP alone as a measure of progress and promotes alternative measurement and indicators for societal development that combine economic, social and environmental performance (ANPED, 2012).

## **6. Equitable Green Economy Principles by the Danish 92 Group**

The Danish 92 Group (a group of Danish NGOs on development and environmental issues) drafted in 2012 “Building an Equitable Green Economy”, comprising five core principles of a green economy from a ‘Southern’ perspective in pursuit of ‘inclusive’ green development. The Green Economy as conceptualised by the Danish 92 group entails:

- i. Establishing enabling conditions, a policy-mix, conducive to a systemic change toward equity, and for putting the foundations of this systemic transformation on the ground;
- ii. Mobilise of sufficient (new) funding and resources (financial, technological, human resources) to implement the system’s transformation and ensure clear action and responsibilities;
- iii. Creating adequate and aligned structures and arrangements, both at national and international level with a clear definition of functions;
- iv. Ensure participation and accountability for all: make transparent structures for the powerful, protect citizens against powerful elites/ actors and foster the capacity of empowered actors and marginalised populations to become active subjects and partners.
- v. Sets clear, time bound, targets for the realisation of an Equitable Green Economy, define new indicators for measuring both human well-being and ecological health and introduce monitoring mechanisms thereof (Danish 92 Group Forum for Sustainable Development, 2012).

## **7. Characteristics of a Green Economy - UNEMG (2011)**

The United Nations Environment Management Group (UNEMG) outlines several distinct characteristics of a pro-poor Green Economy. In its System-wide Review (UNEMG, 2011), the UN system concluded that the Green Economy will be:

Sustainable, ensuring that economic growth is in line with the reduction of environmental impacts and employment creation for the most vulnerable groups;

Publicly and widely financed, generating adequate public revenues that can fund progressive social policies and basic service provision;

Biodiversity-centric, protecting biodiversity and maintaining natural capital and the services it supports on which the poorest rely;

Energy and resource efficient, improving the use of these inputs and providing greater access to sustainable energy for all;

Resilient, building capacity to absorb and respond to climate and socio-economic shocks.

## **8. Characteristics of the Green Economy – Global Sustainability Panel (2011)**

In *Resilient People, Resilient Planet: A Future Worth Choosing*, the UN Secretary-General’s High-Level Panel on Global Sustainability characterized the green economy as an economic model that supports sustainable growth and its core attributes include:

- i. Serves as a catalyst for economic growth and poverty reduction.
- ii. Supports the goal of a long term growth and resilient development path.
- iii. Employs indicators that expand beyond GDP as measures of growth.
- iv. Provides decent green jobs.



- v. Stimulates and encourages technological innovation, cross-sectoral cooperation and capacity sharing.
- vi. Internalises environmental and social costs in price formation and decision making.
- vii. Broadens the reach of clean and low carbon energies and enhances energy efficiency.
- viii. Manages and conserves natural resources and ecosystems so as to limit degraded lands.
- ix. Broadens stakeholders' involvement and partnership with a variety of actors in policy making, policy implementation and policy decisions (Global Sustainability Panel, 2011).

Considering the above, much consistency can be established among a number of published sources, whereby most of the principles are common among various definitions. A set of 11 principle were derived by Cameron (2012), when summarizing research conducted from multiple policy reports as “the overarching set of over-arching policy principles identified across >50% of reports”-the key principles listed by authors that had a consistent commonality across the collected reports include:

1. Green economy represents the ultimate pathway for sustainable development.
2. Create good environment–friendly jobs and employment.
3. Enable greater efficient resource use.
4. Operate within ecological boundaries.
5. Enable decision-making integrated across all spheres of decision-taking.
6. Develop indicators other than GDP which measure overall progress.
7. Ensure a fairer economy for present and future generations.
8. Protect biodiversity and natural systems.
9. Promote reduced poverty and human wellbeing.
10. Ensure better governance and accountability.
11. Internalize environmental and social costs.

Collectively these principles show that a green economy framework tackles the three pillars of sustainable development – economic, social and environment in a mutually dependent and proportionate manner that promotes the notion of cooperation and partnership across all aspects.

## **Recent Developments in Green Economy Discourse (Post-2020)**

### **1. The European Green Deal (EGD)**

The European Green Deal (EGD) is perhaps the most comprehensive set of policies geared towards translating the green economy concept into reality, presented by any single jurisdiction globally. It is ‘aimed at restructuring the EU towards a sustainable economic system in which industrial production is linked to, but not dependent on resource use, and in which climate neutrality is achieved and the economy decoupling its long-term economic growth from resource use’ (European Commission, 2021:2). So far significant progress has been registered in implementing The Green Deal as evidenced by developments on renewable energy deployment, sustainable finance, climate, the circular economy, and reducing EU GHG emissions (European Commission Joint Research Centre, 2025). As such the Green Deal reinforces the guiding principles of green economy, namely resource efficiency, low-carbon development, a clean energy transition, sustainable food, ecosystem restoration, a healthy climate and a just transition -which are fast becoming guiding principles of development worldwide.

### **2. Post-Pandemic Green Recovery Initiatives**

The COVID-19 pandemic brought to the fore global realization that in economic recovery, issues of development and environment need to be addressed together. Consequently, Many Governments have adopted ‘Green Recovery Plans’ which include investments for a green economic stimulus in the face of increasing public deficit as a strategy for recovering from the economic shock. In support of green economy principles, according to UNEP (2021), post-pandemic economic recovery needs to favour green policies on the one hand, and promote investments in sustainable infrastructure, renewable energies, the restoration of ecosystems, sustainable Agriculture, and green jobs on the other hand. Rather than re-introducing old patterns of inefficient economic growth, this investment approach

would generate income and employment, stimulate the transition towards low carbon development and also help build better human health and increase resistance to environmental disasters. The World Bank also argues for climate resilient development planning as a cornerstone of national recovery strategies, emphasizing climate resilience actions in recovery programmes, while stating that a shift towards investments in new technologies as well as renewable energy, sustainable agricultural sector and resilient infrastructure development are key elements required to facilitate rapid recovery and economic gains. (World Bank, 2022).

### 3. United Nations Perspectives on Green Economy and Sustainable Development Goals (SDGs)

The United Nations have actively encouraged the green economy as a model that may serve as a vehicle for delivering the 2030 Agenda for Sustainable Development, especially after the 2020 period. Combined effects of such trends as climate change impacts, biodiversity loss, conflict, economic volatility and food insecurity have significantly slowed down global progress on many SDGs, the latest report suggests (United Nations, 2023). To counteract this, greater investments in green economy sectors-including renewable energy, climate adaptation, and sustainable resource management-are called for.

UN (2024) findings also show an increased momentum towards better climate adaptation planning and climate change mitigations strategies with continued positive signs in renewable energy implementation.

However, many countries continue to fall off track on a broad range of SDGs related to climate action, biodiversity conservation and ecosystem protection, sustainable consumption and production, and sound environmental management and resource stewardship. More, it stresses that integrated and crosscutting green economy polices can accelerate progress across several major SDGs related to affordable and clean energy (SDG 7), decent work and economic growth (SDG 8), responsible consumption and production (SDG 12), climate action (SDG 13), life on land (SDG 15), and partnerships for the goals (SDG 17). This aligns with Mun et al., (2022) who identify a green economy as the development pattern that leads to low-carbon emitting economy, resource efficiency and environmental protection through the integrated of key aspects like economic development, decent jobs, reduced resource impacts, protection of ecosystems, and increased wellbeing. Moreover, they indicate that issues of equality, and governance are relevant elements for an integrated concept for a sustainable development approach to a green economy focusing on smart city development (SDG 11) and responsible consumption of production (SDG 12).

The recent UN(2025) SDGs Report noted increased, record highs in 2023 regarding GHG emissions, prompting urgency for accelerated climate action, strengthened adaptation measures, and improved country commitments (National Determined Contributions to meet the objectives of the Paris Agreement.

### 4. Green Economy Principles and the Three Pillars of Sustainable Development (Matrix)

This conceptual matrix offers an integrated view of major green economy principles, categorized across the economic, social and environmental pillar of sustainable development. The matrix integrates both the Green Economy Coalition's approach and the UNEP inclusive green economy principles, acknowledging that many principles span across more than one pillar..

**Table 1: Matrix mapping green economy principles to the three pillars of sustainable development**

| Pillars of Sustainable Development | Most directly associated Green Economy Principles                                                                                                         | Core Focus                                                                                                 |
|------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------|
| Economic Pillar                    | Well-being and prosperity; resource efficiency; sustainable consumption and production; circularity; low-carbon development; green innovation; resilience | Sustainable economic growth, employment, investment, productivity, innovation, and efficient resource use. |

|                                     |                                                                                                                                                |                                                                                                                                        |
|-------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------|
| Social Pillar                       | Justice and equity; well-being; inclusion and participation; resilience; intergenerational responsibility                                      | Poverty reduction, social inclusion, decent work, gender equality, human rights, participation, and equitable distribution of benefits |
| Environmental Pillar                | Low-carbon development; resource efficiency; circularity; precautionary principle; polluter pays; resilience; intergenerational responsibility | Climate mitigation, biodiversity conservation, pollution reduction, ecosystem protection, and sustainable natural resource management  |
| Cross-cutting/integrative dimension | Good governance and accountability; justice; inclusion; resilience; intergenerational responsibility                                           | Institutional coordination and policy integration across economic, social, and environmental objectives                                |

**Source:** Author's synthesis based primarily on UNEP's inclusive green economy framework and the Green Economy Coalition's Principles of well-being, justice, sustainable consumption and production, and good governance

The matrix itself also points out how green economy principles aren't exactly a one-to-one match to the three dimensions of sustainable development. Instead, think of them as principles that apply across the board – integrating economic, social and environmental aspects – as the Green Economy Coalition themselves put it: a green economy must encompass all three dimensions, and requires policy packages that seek to integrate them (Green Economy Coalition, 2012). Effectively, the big selling point of the green economy framework is trying to balance economic growth with both social justice and ecological sustainability.

In that respect, a green economy is a tool for sustainability, not the definition of it in itself. And the Green Economy Coalition is clear about that too - it's how we deliver sustainability, so we have to make sure the economic, social and environmental aspects of sustainability are properly built into it (GEC, 2012).

## 5. Tensions between Green Economy Principles

Let's be honest, with the best will in the world, applying green economy principles inevitably creates a whole load of conflicting scenarios or compromises that any policymakers have got to handle.

### 1. Economic Growth vs Planetary Boundaries

The premise of the green economy seems to be grown our way out of trouble, with some helpful clean technologies and renewable energy to carry us (OECD, 2011). But according to the planetary boundaries stuff from Rockström et al (2009), and updated by Steffen et al (2015), we can't just keep increasing GDP indefinitely and expect the Earth to cope – there are hard limits that once breached we're on a nasty slippery slope. This creates tension when a number of key industries, from energy and agriculture to housing and transport, clearly depend to some degree on continued economic activity. For example, while we're encouraged to switch to renewable energy technology, we still need a pile of stuff (minerals, land, and energy) to build and deploy those renewables. Same thing with the 'circular economy' – we need to minimise using new stuff, but sorting, recycling and reconstituting old materials isn't a magic free pass that eliminates all our material demands.

So, as you can see, it's a false assumption to think green tech magically removes ecological constraints, and that it may just shift the environmental pressures around. What we have to do is look at the entire life cycle of any particular investment or technology, rather than just focusing on the emissions that come out of your exhaust pipe (UNEP & IRP, 2024).

### 2. Economic Growth and Ecological Limits

Is it even possible to grow our economies on and on while decreasing pressure on the Earth's ecological limits? That's a major part of the green economy debate. The general answer from green economy advocates has always been yes, we can shift what economic growth looks like – making it greener, less resource-intensive, low-carbon and so on. But the debate is trickier once we start talking about absolute ecological limits, rather than just relative intensity gains. Our current economic system depends really heavily on extracting massive amounts of materials, fuel and other stuff as our

economies grow and we want to produce more and consume more. This inevitably clashes because we actually live inside the finite biophysical systems of the planet – and, alarmingly, the Global Resources Outlook 2024 report by UNEP and IRP (2024) suggests that the planet's resource extraction is just going up and up (60% rise projected between 2020 and 2060).

So, the fundamental question isn't really, "Can the economy get bigger and less polluting per unit?" but rather, "Can the economy get bigger and produce less pollution in total, and use fewer resources altogether?" Now, we're not necessarily still thinking that just 'efficiency improvements and new technology alone will magically make all this work any longer. There clearly needs to be a whole range of changes in what we buy, how we produce things, how we share our resources and how we provide economic incentives, alongside all the innovation (UNEP & IRP, 2024).

And another bit of the complication: it's not just the same question asked of everyone everywhere. We still have lots of countries, like many African economies (Nigeria in fact), trying to get basics right like infrastructure, jobs, basic healthcare, and good nutrition; and a big part of that is still about getting our economies growing a bit... so it probably doesn't make much sense to place identical limits on countries that didn't really contribute to our global mess until very recently, and actually still need economic growth to meet basic human needs. The UNEP 2024 assessment highlights that some countries use a whole lot more resources and contribute way more environmental pressure than others, so the debate about 'developmental space' and 'ecological justice' is therefore really important to the idea of a green economy (UNEP & IRP, 2024).

### **3. Social Equity vs Market Mechanisms**

The green economy is about helping everyone rise together; it aims to foster social inclusion and equity (UNEP, 2011). Often, the markets are seen as the main way to do this, ensuring our resources are used smartly. But free markets aren't always fair. If we're told to put a price on carbon for example, this might motivate business and consumers to reduce pollution, but what it actually tends to do is increase our electricity bills, or the cost of gas, or everyday consumer items too.

So here is a real conflict between making efficient economic arrangements and treating everyone fairly. You can make the economy better overall, but it doesn't necessarily mean everyone gets treated fairly. Which is why we've been hearing quite a bit recently about why it's crucial to understand how climate policies will affect different people and set up policies that people actually support (Hodok & Kozluk, 2024).

Ultimately, for the green economy to deliver in practice, we have to make sure things are fair. If people feel green policies are unjust or disadvantage them, they will resist them, and our green ambitions will likely be weakened. The fairer we are, then, the better chance these policies have of working in practice (GEC, 2012).

### **4. Efficiency vs Employment and Livelihood Security**

The shift towards a green economy also generates tensions between productive efficiency and employment security. Transitioning away from fossil fuels and environmentally damaging industries can create new employment opportunities in areas such as renewable energy, sustainable agriculture, ecological restoration, recycling, energy efficiency and green infrastructure. However, during the transition, existing jobs in coal mining, the oil and gas industries, traditional manufacturing and other carbon-intensive sectors may be destroyed or undermined. The central issue, therefore, is not just the number of jobs created, but also where they are created, who is capable of securing and keeping them and whether there are prospects for jobs in new sectors to successfully reabsorb displaced workers.

This has led to the principle of a just transition becoming a cornerstone of modern green economy policy, where efforts to realize environmental transformations are balanced with concerns for the protection of workers through social dialogue, reskilling and retraining, social protection and regional economic diversification. Recent scholarship posits that a true just transition must simultaneously respect both social and ecological ceilings – otherwise social concerns threaten to undermine ecological needs, and environmental policy jeopardizes social welfare.

Beyond those listed above, other trade-offs exist between green economy principles. They depend on the specific context, policy framework, national and international institutions,

socioeconomic conditions, etc (Moallemi et al., 2022 and Halsns et al., 2024). A significant trade-off is between environmental protection and poverty reduction: severe environmental regulations can often mean increased production costs impacting incomes and employment. Similarly, restricting logging or land conversions may adversely affect livelihoods reliant on natural resource exploitation in rural areas. Consequently, efforts in environmental conservation must be matched with programs for alternative livelihoods, social protection and community-led management of natural resources, green jobs and skills. Essentially, the principle needs to be "Protect the environment, but not at the expense of the poor".

Similar trade-offs are observable between carbon pricing and social equity. Carbon taxes and emissions trading are mechanisms for inducing the shift away from fossil fuels but the carbon pricing may raise electricity prices, transport costs and prices of goods requiring high energy inputs, resulting in potential conflict between this principle and that of social equity.

Again, a clash between the expanded use of renewable energy sources and the need to protect biodiversity and land has emerged, as infrastructure for wind, solar and hydropower and biomass systems can demand large amounts of land and negatively affect ecosystems. Recent work on sustainable bioeconomy transitions indicates potential conflicts over competing demands on land, the need for biodiversity conservation and food security, especially in the Global South (Rumi et al., 2025). Considering food security against environmental concerns, agricultural intensification can boost food production, but may be detrimental for soil quality, water ecosystems, biodiversity and global warming. Strict conservation measures restricting land use, conversely, will adversely impact agriculture where there is a link between farming and poverty.

Another set of trade-offs is between the interests of future generations and immediate developmental demands, with greens demanding that we preserve resources to protect future generations, while developing countries claim their immediate needs for food, jobs, poverty alleviation and infrastructure should not be sacrificed. The challenge is how to address current pressing development needs without threatening the environment that future generations will inherit, and sustainable methods of development that combine environmental protection and present economic growth are key-Sustainable agriculture, renewable electricity sources, and green infrastructure, among others, are suitable examples.

The trade-offs discussed above could be ameliorated through strategies such as:

- i. Integrated policy planning where authorities move away from compartmentalized sector-specific policies towards an integrated approach,
- ii. Just transition policies that ensure that workers displaced by the carbon intensive transition gain appropriate access to re-skilling and social protection and alternative employment opportunities,
- iii. Environmental and social impact assessment of all major green investments to ensure that social and environmental concerns are adequately taken into account before implementation of projects,
- iv. Participatory policy formulation and monitoring to allow all stakeholders particularly the marginalized communities, the chance to participate in all phases of the decision-making process to foster legitimacy and help to resolve local trade-offs not addressed by macro policy formulation.

## 5. The synergies between different Green Economy Principles

Apart from the various conflicts identified, there are a number of possible synergies between Green Economy Principles and the expected impact they may generate is presented concisely in Table 2.

**Table 2: Synergies among green economy principles**

| Green economy principles           | Potential synergy                          | Expected outcome                     |
|------------------------------------|--------------------------------------------|--------------------------------------|
| Renewable energy and energy access | Clean energy can expand electricity access | Improved welfare and lower emissions |



|                                                  |                                                        |                                                        |
|--------------------------------------------------|--------------------------------------------------------|--------------------------------------------------------|
| Resource efficiency and economic competitiveness | Lower material and energy costs                        | Higher productivity and reduced environmental pressure |
| Circular economy and employment                  | Recycling, repair and remanufacturing create jobs      | Green employment and resource conservation             |
| Sustainable agriculture and food security        | Soil conservation and efficient resource use           | Higher resilience and sustainable productivity         |
| Environmental protection and public health       | Reduced pollution improves health                      | Lower health costs and improved quality of life.       |
| Green infrastructure and climate resilience      | Eco-based solutions reduce climate risks               | Greater resilience to flood, heat and erosion.         |
| Green innovation and economic growth             | Clean technologies create new markets                  | Economic diversification                               |
| Good governance and environmental protection     | Transparency and accountability improve implementation | Better policy outcomes                                 |
| Social inclusion and green transition            | Inclusive policies improve participation               | Greater legitimacy and reduced resistance              |
| Education and green consumption                  | Awareness encourages sustainable lifestyles            | Reduced resource and ecological footprints             |

**Source:** Author's synthesis, 2026.

## 6. Major Barriers to the Implementation of Green Economy Principles

It has been discovered that a number of obstacles militate against the correct implementation of the green economy principles. Some of these barriers, as pointed out by Klein et al (2013) and supported by Adenikinju (2022) could be presented as follows:

1. Inadequate finance and high initial costs: Green transitions often come with hefty up-front investment in renewable energy infrastructure, energy efficiency services, clean vehicles, green food systems, circular industrial processes and restoration schemes, creating challenges for developing countries, given tight fiscal space, high borrowing costs, and alternative priorities for development.
2. Weak institutional capacity and governance: Green economy implementation requires robust institutions for policy formulation, inter-sectoral coordination, environmental regulation and monitoring performance. A lack of these institutions translates into poor implementation and a wide range of associated problems ranging from policy inconsistencies to policy corruption, lack of enforcement and fractured responsibilities of government ministries and agencies.
3. Limited human and technical capacity: Green economy policies call for specialized know-how in fields like renewables, environmental economics, accounting for carbon emissions, climate finance, ecosystem management and circular manufacturing and management. Weak institutions with these skills mean weak policy implementation. Lack of technical capacity can also interfere with efforts to monitor policy performance, especially given the challenge of discerning if the outcomes of green policies are truly what is desired.
4. Technological and infrastructural limitations: Access to appropriate technologies and infrastructure is essential for the green economy transition. Lack of relevant technology, poor electricity supply, weak transportation systems, weak solid waste management facilities and a lack of strong domestic research and development can significantly increase the cost of transformation.
5. Policy contradictions and inadequate policy coordination: The green economy necessarily cuts across agriculture, energy, transportation, industry, finance, trade, land use, and social protection. These different policy areas may sometimes have conflicting objectives that will then serve as a barrier against the green economy transition.

6. Poor public participation and stake holders engagement: The transition to a green economy affects a variety of players, including governments, corporations, individuals, farmers, workers and local communities. Exclusion of these entities from the policy-making process can cause opposition to such policies and also result in unanticipated outcomes.

7. Lack of appropriate data, indicators and monitoring systems: Without proper indicators, tracking green growth, resource efficiency, emissions reduction, biodiversity, social inclusion and well-being become nearly impossible. Insufficient environmental and socioeconomic data complicates the establishing of baselines, and/or the identification of intended and unintended policy consequences. This is particularly important for the empirical verification of green economy principles, because poor consistency of indicators brings about questions about the validity of implementation assessments.

## **7. Green Economy Principles' Implementation: Evidence from selected countries**

Between 2008 when the term green economy was revived and 2012 when the concept was adopted for the first time by the international community through the UN Conference on Sustainable Development (Rio+20), green economy scoping studies were published in twenty five countries under UNEP's Green Economy Initiative (Kanianska, 2017) owing to the fact that in the entire globe the business as usual economic system has failed to bring inclusive economic growth and social development and caused environmental damage and scarcity, as written by UNECA (2020). Consequently several countries launched national green economy strategies or roadmaps some of which were briefly reviewed as below:

1. EU's Green Deal: The European Green Deal is probably the most extensive efforts made by the EU region to embed green economy principles at the regional level. It combines climate policy with energy, transport, industry, agriculture, biodiversity and pollution control policy and with the aim of achieving climate neutrality by 2050, it set a target by 2030 that emissions of greenhouses gases should be reduced by at least 55% compared with levels in 1990 (Joint Research Centre, 2025). Nonetheless it is also evident that the EU experience is struggling to achieve success in practice, whereby its 2025 assessment revealed that only thirty-two among the one hundred and fifty-four examined targets are currently on track while sixty-four needed to be accelerated and fifteen stalled or failed to move in the right direction (JRC, 2025), implying that ambitious green economy policy does not automatically guarantee consistent implementation performance.

2. Costa Rica, green growth, decarbonisation and circular economy; An extremely important case in point for developing nations like Costa Rica as it tried to combine economic transformation with ecological conservation. The country's national Decarbonization plan of 2019 which aims at a zero carbon emissions goal by 2050 covers all ten pillars of economy sector namely energy, transport, industry, construction and agriculture. Its strategy also involves promoting circular production and making economic growth decoupled from emissions (OECD, 2025). Recently, Costa Rica unveiled its Circular Economy Strategy in 2023 which focuses on integration of new and existing plans whilst fostering new ideas, sustainable production and inclusive development of areas/regions of Costa Rica (Capacity4dev, 2024).

3. Rwanda's green growth, climate resilience and inclusive development; a vital African case study, green economy approach to Rwanda is inextricably linked to climate resilience, poverty alleviation, economic development and transformation. For instance its programme, Climate Adaptation and Enhanced Resilience Programme links land restoration with climate resilient infrastructure at urban level and sustainable development at the national level (SURGE, 2026). Social implications of green economy is illustrated by Rwanda's introduction of clean cook stoves (Research & Innovation, 2025).

4. Kenya's climate-smart agriculture and social equity; its climate-smart agriculture programme with Korean assistance is a guiding principle to applying green economy approach to agriculture whilst taking into account social inequality. The program is aimed at vulnerable groups (women and children) with focus on making progress using group empowerment and capacity building to uplift their living conditions with regard to their livelihoods, and also influencing policy and creating county-level budgeting for climate smart agriculture (OECD, 2024).

5. South Korea's green growth and technology-driven innovation; the experience of South Korea points to a strategy of green growth that is hinged upon technology and innovation. In this strategy governments play an indispensable role in promoting green technology and industry with policy measures like R&D tax incentives designed to promote private investment and technological advancement (Yanchao et al., 2024).

11. Implications of green economy principles to economic and national development:

As highlighted earlier, a green economy is an economy that is resource-efficient, low-carbon and socially inclusive and aimed at improving human well-being and social equity while significantly reducing environmental risks and ecological scarcity. To this effect, implications on economic and national development of developing economies such as Nigeria are wide-reaching as the following principles can be applied:

Resource efficiency, as a principle of green economy, necessitates the efficient use of all forms of resources (natural, financial and human), thus stimulating productivity and minimal waste generation, reducing the cost of production by utilizing recycling processes and circular economy, promoting international competitiveness and sustainable consumption patterns.

Low-carbon development is one of the important principles centered on reducing green-house gases by promoting renewable energy and the use of sustainable technologies, thereby leading to lower-carbon emissions in farming methods by farmers (Achoja, et al., 2025), decrease in dependence on imported fuels, enhancement of energy security and stable electricity power supply, and contributing to the global efforts towards mitigation of global warming.

An important principle centered on social inclusion and equity dictates that economic benefits must extend to all the members of the society in green economy models which translates to creation of jobs in the green economy sector such as renewable energy production, climate-smart agriculture, and waste management industries, elimination of poverty and improved livelihoods and greater equity across the nation particularly towards women, youths and the rural populace.

The principle for environmental sustainability in the green economy mandates that economic growth is achieved without degradation of the natural environment thereby significantly lowering the cost of environmental hazards and the health costs of pollution, conserving the natural resources including water bodies, forests and biodiversity, making natural resources last long for future generations, and minimizing the degree of natural degradation and climate risks.

A strong aspect of green economy principle is good governance and institutional strengthening which implies a decision-making process characterized by transparency, accountability and participation leading to effective implementation and enforcement of environmental regulations, increased public trust and enhanced policy coordination among the various sectors, thereby attracting local and foreign investment. In conclusion, all these principles that govern Green economy when properly utilized; promote sustainable and economic growth, enhance human livelihoods, conserve nature and simultaneously accelerate industrial development, resulting in increased national and international competitiveness of nations thus promoting national development at large.

## V. Conclusion and Recommendations

The paper has analytically critiqued the green economy principles documented by different International Organizations. There was a total of eleven (11) of the most frequently reported green economy principles documented within the review of eight (8) sets of commonly reported principle/characteristics for a green economy in the published papers. The conflict and trade-offs of these principles and resolutions were highlighted throughout the study. A matrix that maps these common green economy principles to the three pillars of sustainable development was formulated for the purpose of the study.

Some barriers of the implementation of the green economy principles were analysed and some synergies were identified. Implications of these principles on economic development of a nation was succinctly identified. The paper concludes that: the green economy principle presented a roadmap in moving towards sustainable economy, environmental conservation and equity. Some actionable

recommendations were made based on the study conclusion especially in developing countries such as;

1. Governments ought to put in place a legally grounded National Green Economy Implementation Framework that translate into sectoral green economy plans of energy, agriculture, industry, transport, waste, management, urban etc.
2. Make room for green budgetary systems and the utilization of green public financial. To this end, Ministries of Finance and Budget should institutionalize Green Budgetary Systems that assess the environmental and climate costs and benefits of all Government budgets, spending programmes and policies.
3. A Green Transition and Just Transition Fund. Governments ought to set up a dedicated Green Transition Fund that dedicated to the financing of various green and joint (environmental-social) investments. Portion of such Green Transition Fund should be set aside exclusively to address female entrepreneurs, small holder, and the low income people.
4. Establish a green jobs and skills development programme linked to actual labour demand.
5. Government establish a Sustainable Agricultural and green organic programme.
6. Adopting a pollution charge system and other environmentally sound measures. Governments must begin by gradually putting environmental negative externalities inside price through carefully created system of fiscal instruments, such as carbon tax rate, pollution load, trash charges, plastic waste tax, ecosystem restoration charges, etc., and make the usage of the income so collected fully and straightforwardly dedicated to the financial aid of clean transport, low-emission energy systems, as well as social protection measures and ecosystem security programs.

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