Skills Data Focus
Green Skills ACQF

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ACQF
African Continental Qualifications Framework

Celebrating ACQF 2024
20 December 2024
Together - Reporting on progress

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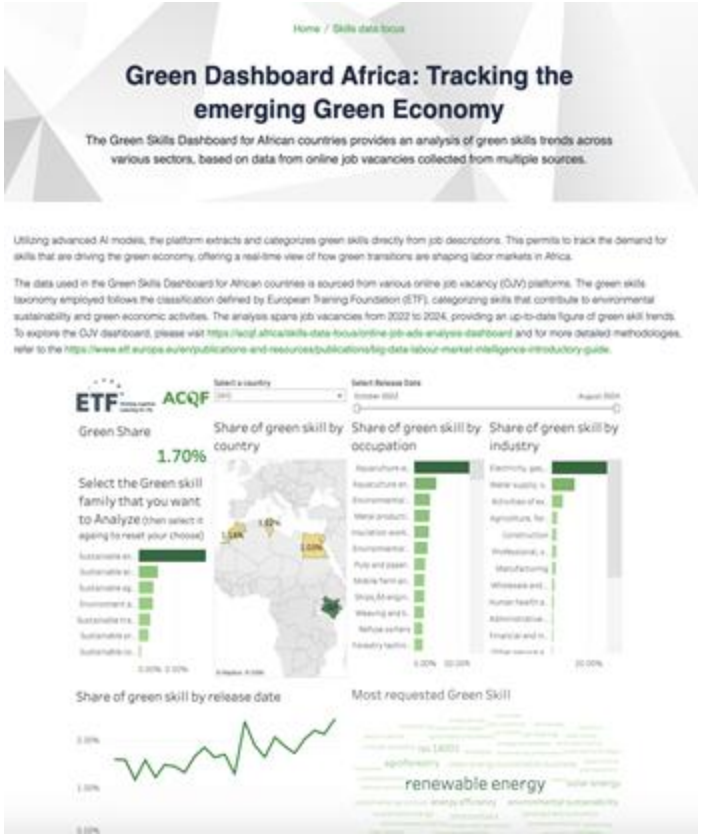
Green skills dashboard for African countries



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https://acqf.africa/skills-data-focus/big-data-lmi-green-dashboard-africa

Will it be green world? at least, when we reach 2050?

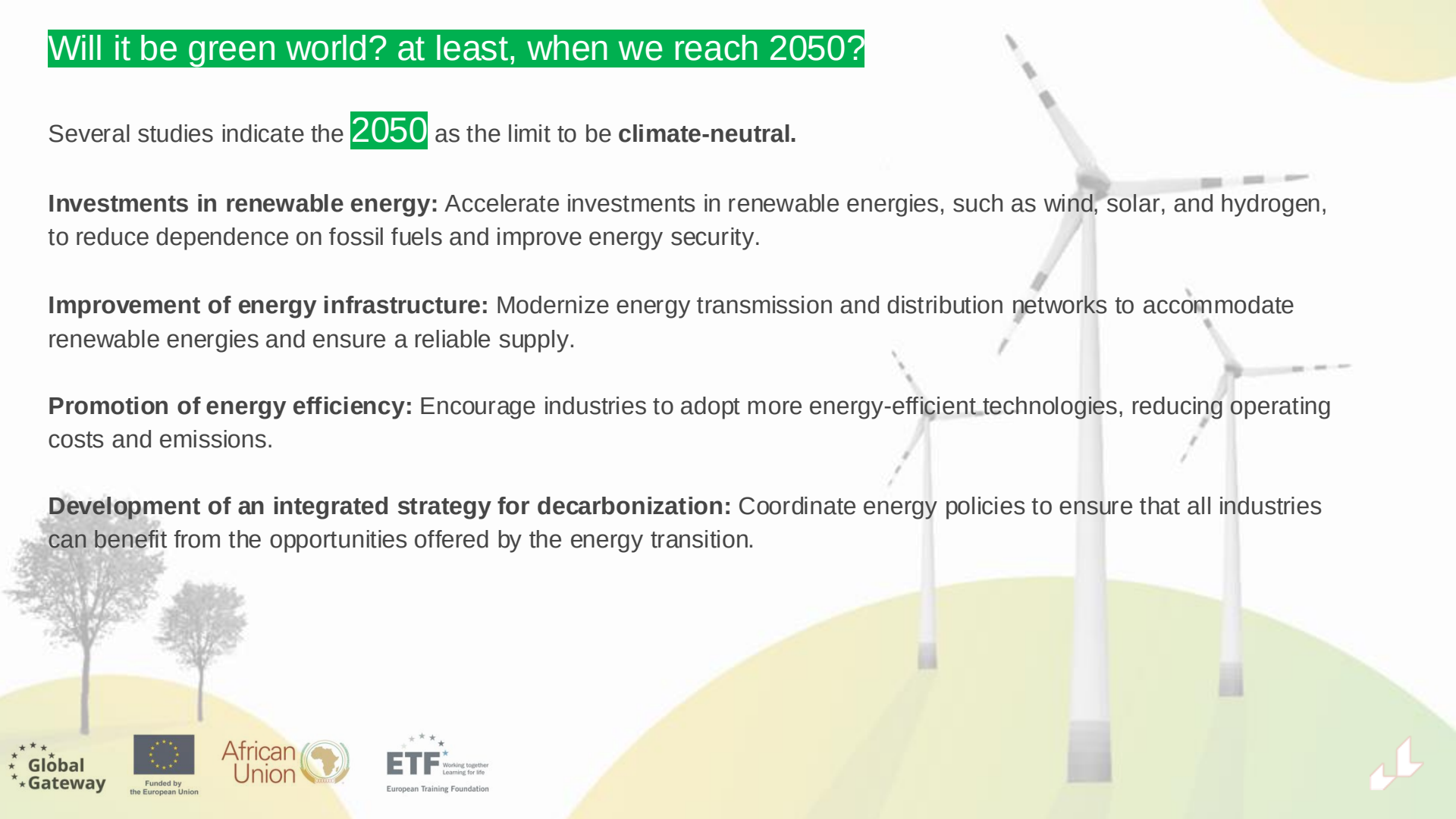
Several studies indicate the 2050 as the limit to be **climate-neutral.**

Investments in renewable energy: Accelerate investments in renewable energies, such as wind, solar, and hydrogen, to reduce dependence on fossil fuels and improve energy security.

Improvement of energy infrastructure: Modernize energy transmission and distribution networks to accommodate renewable energies and ensure a reliable supply.

Promotion of energy efficiency: Encourage industries to adopt more energy-efficient technologies, reducing operating costs and emissions.

Development of an integrated strategy for decarbonization: Coordinate energy policies to ensure that all industries can benefit from the opportunities offered by the energy transition.



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What do we need to prepare the green revolution?

Analyze the jobs and the skills for a green future

Create programs to disseminate green skills

Elaborate career paths and transition for new and old jobs

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A green jobs definition

Concept of green jobs based on Eurostat methodology as Environmental Goods and Services Sector (EGSS)

It is heterogeneous set of producers of technologies, goods and services that prevent or minimise pollution and minimise the use of natural resources

Green Skills clusters

Environment and Sustainable Tourism	This cluster encompasses skills related to managing natural ecosystems, such as forests and maritime areas, and includes competencies for promoting sustainable tourism.
Sustainable Agriculture	These skills focus on enhancing agricultural practices that are environmentally sustainable and beneficial for producers, consumers, and ecosystems.
Sustainable Construction	Skills under this cluster involve improving energy efficiency in buildings and aligning construction practices with the principles of a circular economy.
Sustainable Economy	This group refers to skills that support the broader concept of a circular economy, including resource efficiency and waste minimisation.
Sustainable Energy	Skills related to transforming energy production by integrating renewable sources, such as solar, wind, or hydro energy.
Sustainable Production	These skills are relevant for modifying existing production methods to reduce environmental impact and increase sustainability.
Sustainable Transport	This cluster involves competencies aimed at reducing emissions from transport, using alternative fuels and promoting mobility-sharing systems.

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Methodology – ETF Online job postings data

DATA SOURCES

- Online job postings data
- Milions of job postings scraped daily from thousands of online job boards, newspapers and employers sites
- Cleaned, deduplicated and categorised.

TIME FRAME

- Job postings data allows to capture almost-real time insights from the labor market
- The analysis presented in this presentation is based on 2022 to 2024 data

SAMPLE QUALITY

- Only captures job postings that have been published online.
- This works best for professional services jobs - less so for others, such as agriculture.
- Quality of the data is based on what employers mentioned in the postings. Some things may be taken for granted.

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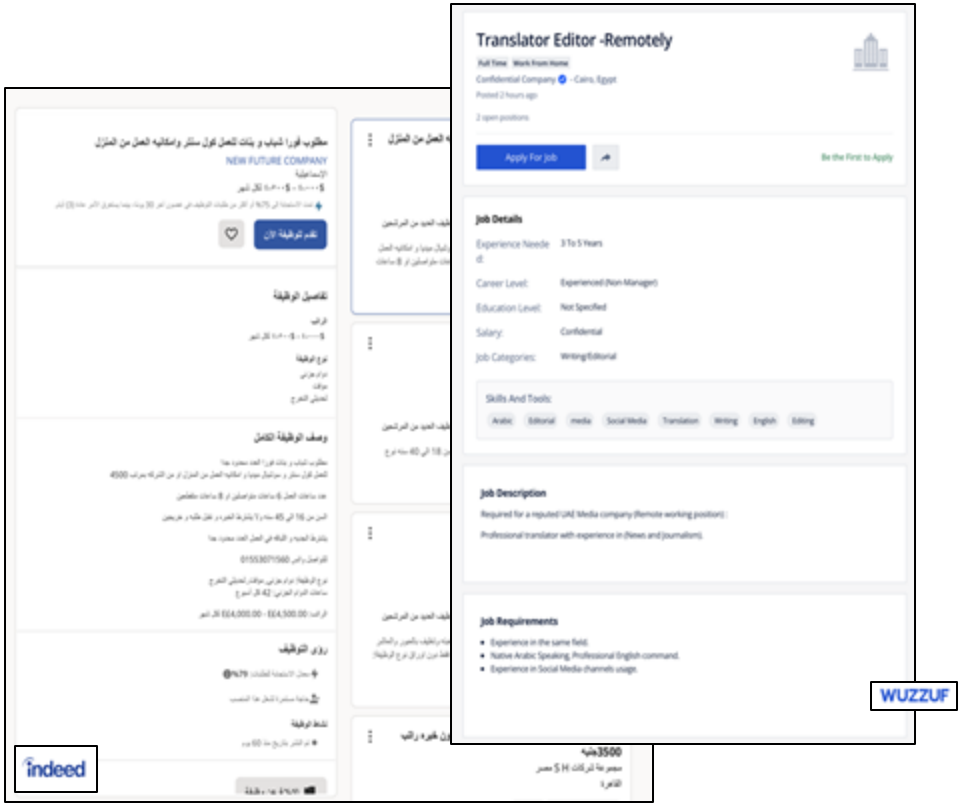
Online Job Postings

High interest: Observe micro-level labour demand (with some caveats)

Retrieval and analytics
- High volume
- **High frequency velocity**
- **Many formats variety**
- **No control over reference population veracity**

Isolate information from noise



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Global job postings snapshot

	Africa	Global	Europe	North America	Asia	South America	Oceania
2023	2,796,104	165,390,867	74,645,707	48,593,581	22,516,258	14,957,862	1,881,355
2024	1,558,614	101,011,679	45,455,335	31,699,694	11,797,977	9,482,465	1,017,594
	4,354,718	266,402,546	120,101,042	80,293,275	34,314,235	24,440,327	2,898,949
2023 vs 2024	-17.07%	-10.20%	-10.21%	-7.77%	-18.36%	-3.58%	-23.79%
% vs Global 2023	1.69%	100.00%	45.13%	29.38%	13.61%	9.04%	1.14%
% vs Global 2024	1.54%	100.00%	45.00%	31.38%	11.68%	9.39%	1.01%

The comparison of Online Job Postings is based on January-August 2023 vs. the same period of 2024

Source: ETF & Lightcast Global Job Postings

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Green Skills - 279 unique skills

Green Jobs are on the rise, **but magnitude is different in different countries**

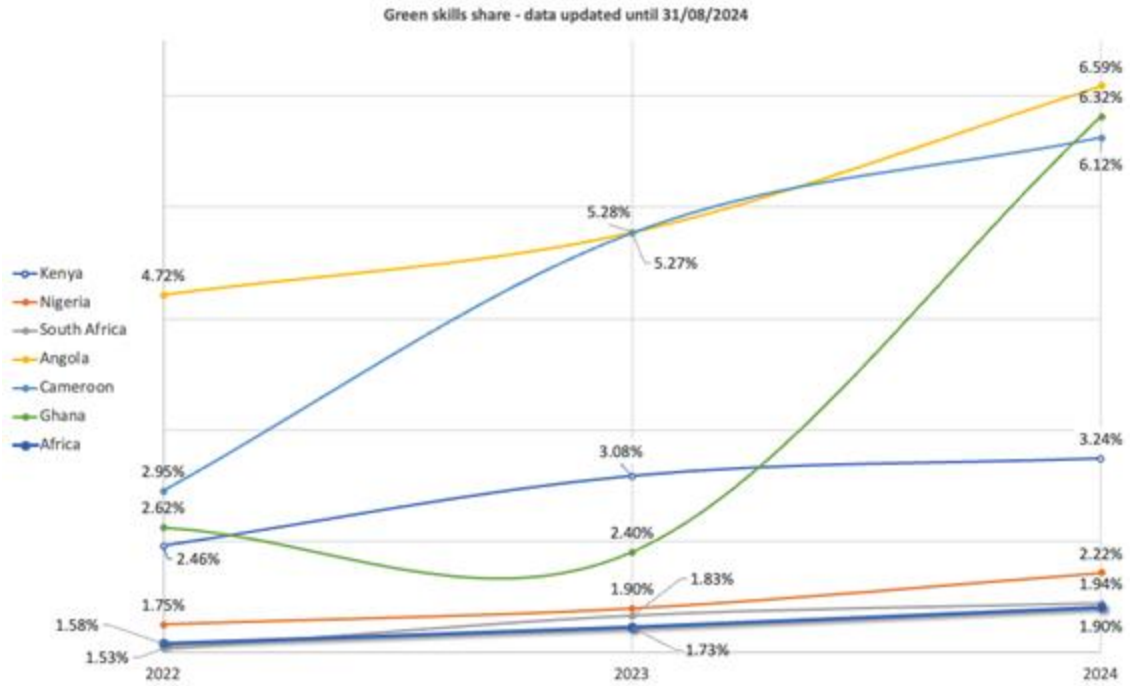
Green share is the share of OJAs containing at least one green skill on the total number of OJAs for a given occupation.

The green share in African countries shows a varied pace of growth. Angola, Cameroon, and Ghana led the growth trajectory, with notable increases by 2024, reflecting a significant focus on green initiatives.

Angola, for example, **moved from a mid-level share in 2022 to becoming a leader by 2024.**

Countries like Kenya, Nigeria, and South Africa exhibited slower growth, suggesting a need for enhanced green policy efforts to accelerate progress.

The overall green share for Africa rose only slightly, indicating **that broader continent-wide strategies are still required to support green transitions at scale**.



Source: ETF & Lightcast Global Job Postings

Demand for ‘green’ skills in Africa:
Rising demand for green skills reflects a shift towards sustainability

The data indicates a growing emphasis on green skills, with **Waste Management leading at over 10%**.

ISO 14000 standards and Renewable Energy skills also show strong demand, emphasizing the industry's move t**owards standardization and clean energy adoption**.

Climate-related skills, such as Climate Variability, Adaptation, and Photovoltaics, are gaining prominence, **showcasing a need for resilience in the face of climate change**.

These trends suggest that jobs across all sectors are increasingly incorporating green competencies, reflecting broader environmental awareness and a drive towards sustainability throughout the labor market.

Skills / skill set	%	Nº unique job postings
Waste Management	10.34%	20,494
ISO 14000 Series	8.90%	17,637
Renewable Energy	5.92%	11,743
Environmental Laws	5.30%	10,504
Environmental Protocols	5.08%	10,078
Climate Variability And Change	3.43%	6,807
Photovoltaics	2.40%	4,757
Energy Management	2.37%	4,696
Environmental Compliance	2.13%	4,220
Concentrix Solar	2.11%	4,189
Climate Change Adaptation	1.87%	3,716
Recycling	1.87%	3,704
Solar Systems	1.83%	3,623
Environmental Protection	1.78%	3,524
Energy Conservation	1.77%	3,514
Energy Consumption	1.48%	2,938
Environmentalism	1.30%	2,582
One-Line Diagram	1.27%	2,509
PVsyst	1.21%	2,397
Climate Resilience	1.15%	2,285

Source: ETF & Lightcast Global Job Postings

The leading green jobs in Africa reflect the continent's shift towards renewable energy and sustainability practices.

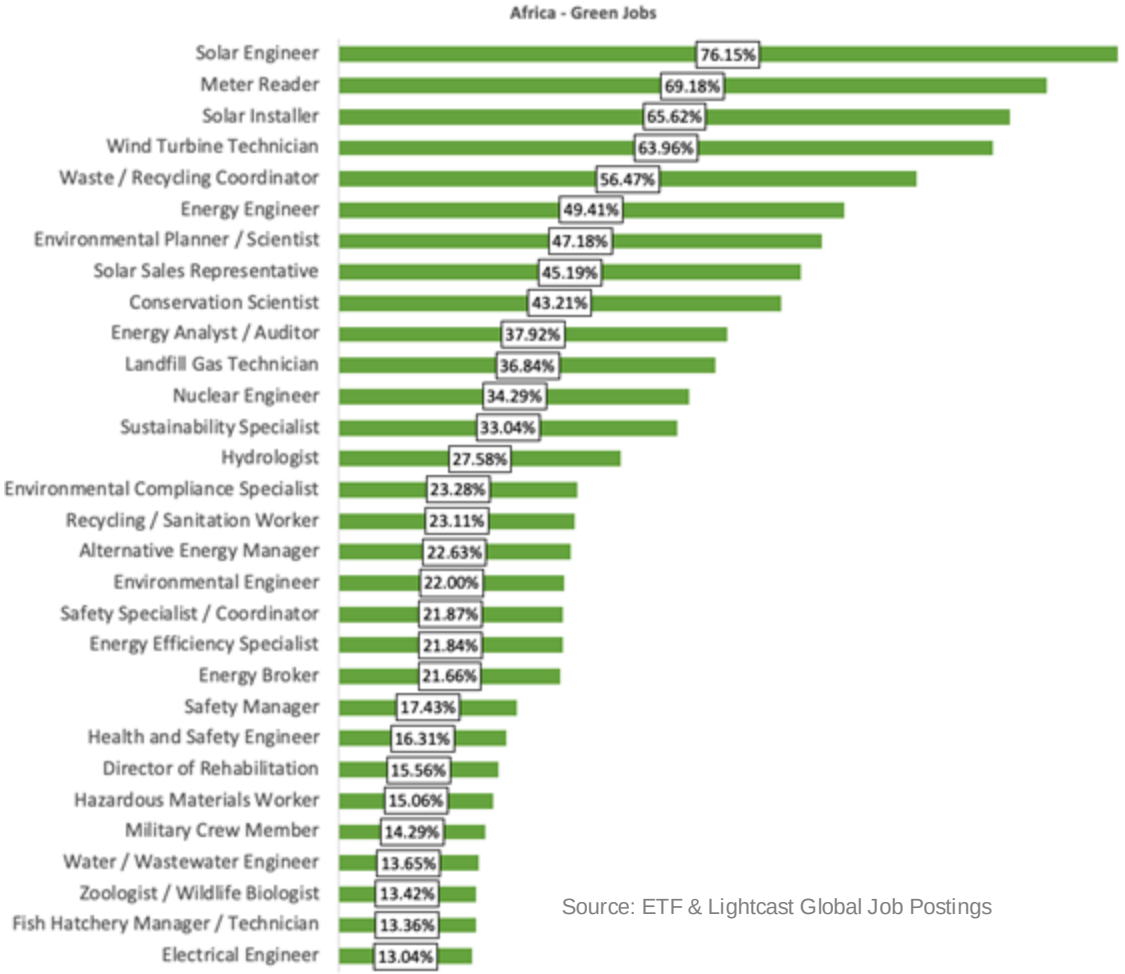
Solar Engineers have the highest green share at 76%, indicating significant demand for solar energy solutions.

Meter Readers, Solar Installers, and Wind Turbine Technicians also exhibit high green shares, ranging from 63% to 69%, emphasizing the f**ocus on energy transition**.

Waste/Recycling Coordinators and Energy Engineers show more than 45% green shares, suggesting a growing need for **waste management and energy efficiency**.

Environmental Planners and Conservation Scientists round out the top roles, indicating efforts to promote sustainable practices and environmental protection.

Top green jobs in Africa - Green Share



Source: ETF & Lightcast Global Job Postings

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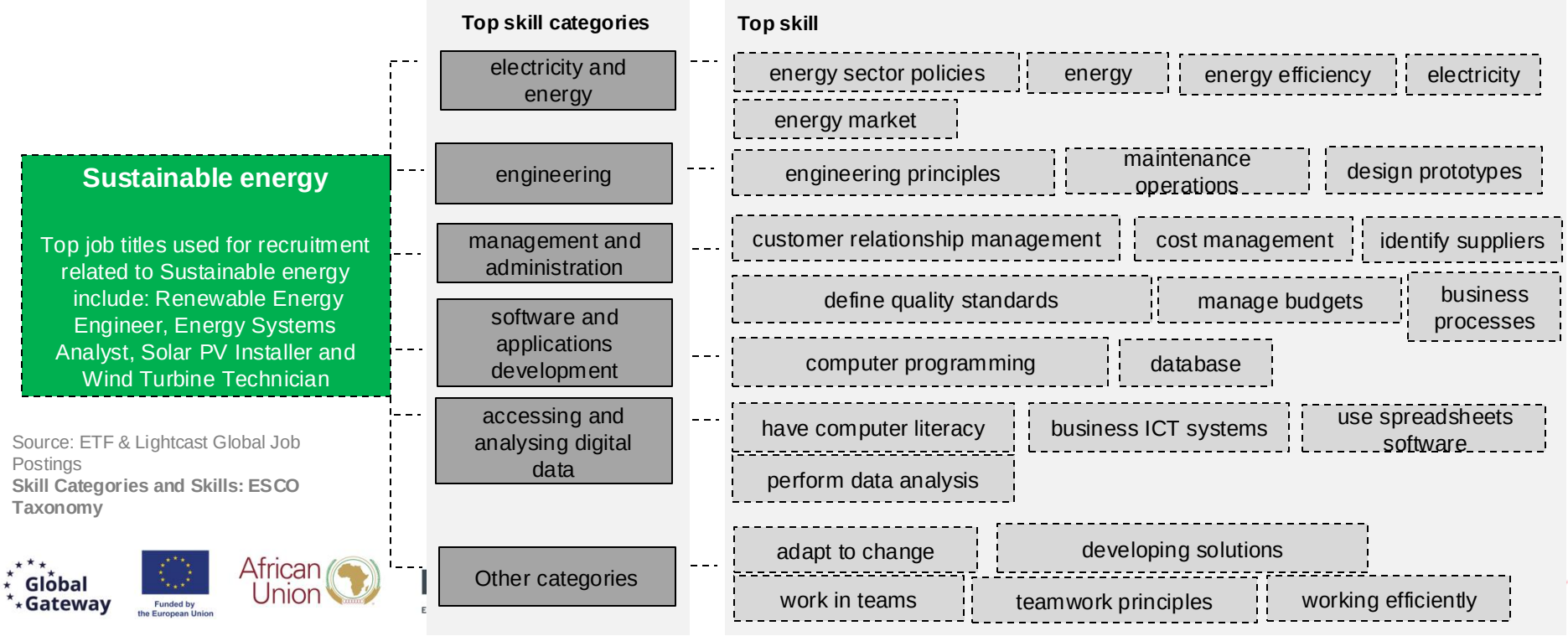
Defining skill sets: bridging green skills demand with training and policy.

A framework skill set is a combination of abilities, knowledge, and expertise needed for specific tasks or roles. It helps align workforce skills with job demands and training needs.

The sustainable energy framework highlights essential job roles and diverse skill categories, including technical knowledge (e.g., energy efficiency, engineering) and managerial skills (e.g., cost management, teamwork). It underscores the interdisciplinary nature of sustainable energy, combining technical expertise with digital and administrative competencies.



Source: ETF & Lightcast Global Job Postings
Skill Categories and Skills: ESCO Taxonomy

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Twin transition in Africa countries

For emerging professions, such as jobs in the field of artificial intelligence (AI) or sustainability (green), labour supply does not meet industry demand.

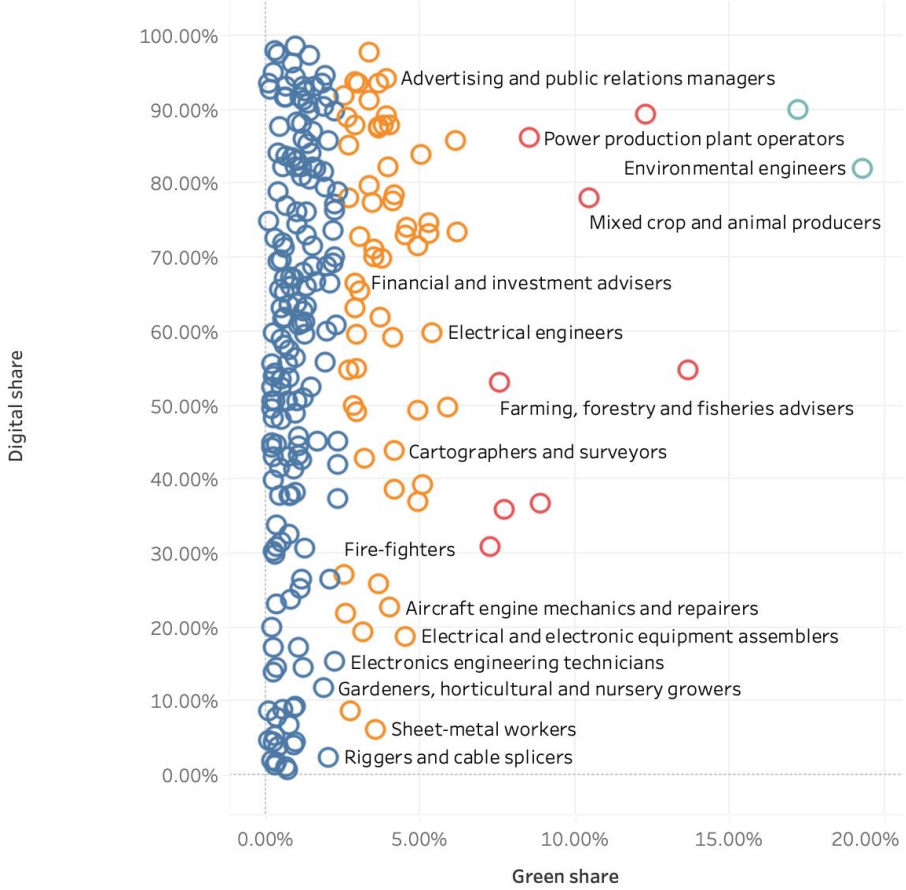
The *Digital Share* indicates the extent to which digital tools are integrated into the job. The *Green Share* representing the degree to which the occupations contribute to environmental sustainability. The graph is populated with the ISCO 4 occupations of jobs spread across different values of digital and green shares. The chart presents a broad view of where each occupation stands in terms of its digital and environmental dimensions.

Professions like 'Advertising and public relations managers' score high on the digital share but have a moderate green share.

In contrast, 'Mixed crop and animal producers' have a lower digital share but a higher green share, which might reflect the nature of agricultural work being less digital but more directly related to the environment.

There's a cluster of occupations with high digital shares but varying green shares, which suggests that even within digitally intensive professions, the extent of environmental impact varies.

Digital share and green share – *ETF database – African countries – Lightcast*



Source: ETF & Lightcast Global Job Postings

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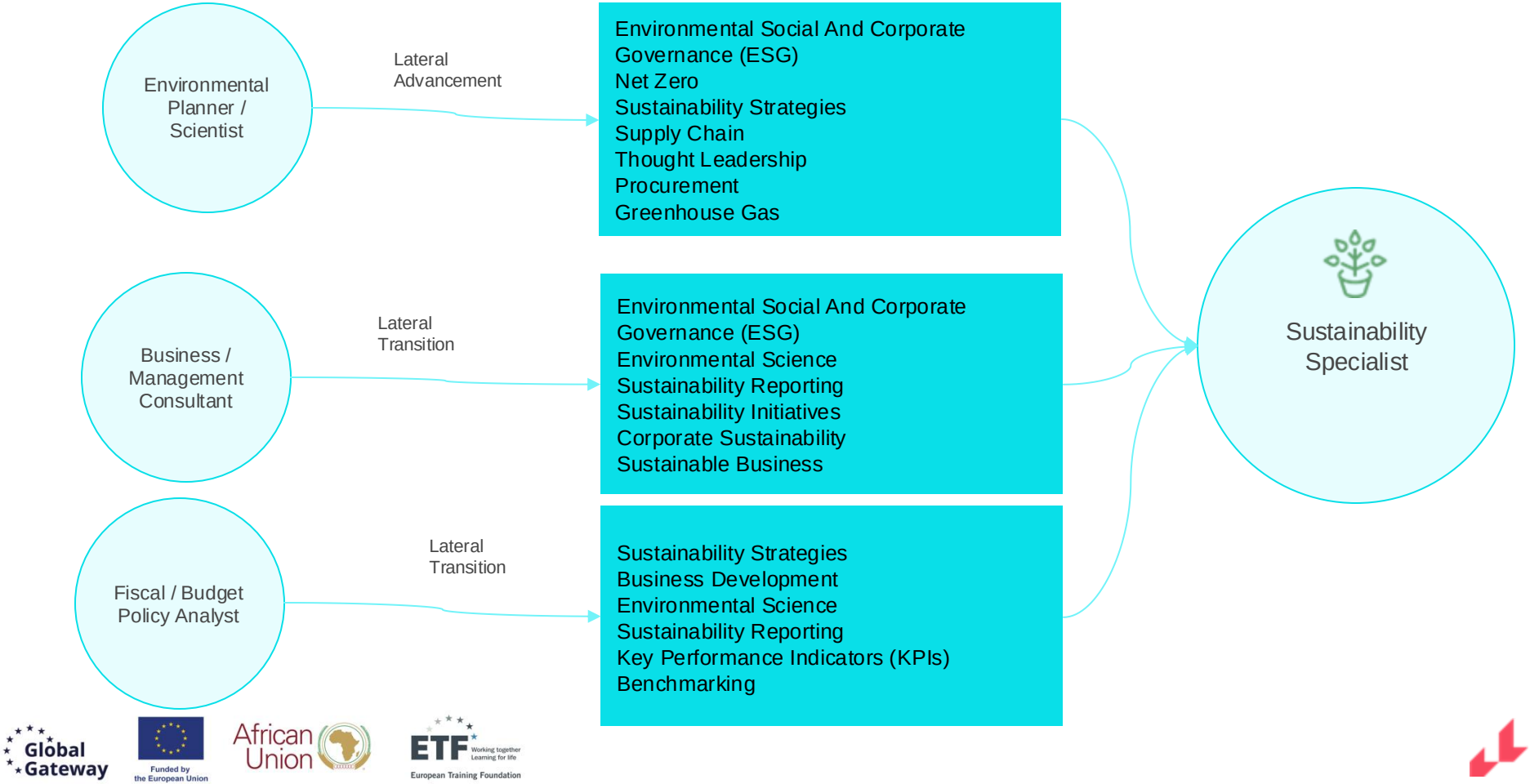
Career Pathways Analysis



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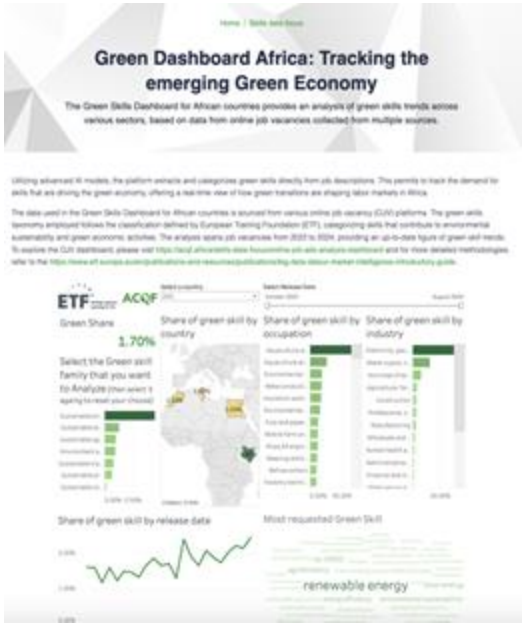

Thank you. Any questions?

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