



State of Africa's INFRASTRUCTURE REPORT

The Africa We Build: From Capital to Systems
Deploying Infrastructure for Industrialisation, Integration, and Resilience

2026

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Foreword by the President & CEO, Africa Finance Corporation

Capital is accumulating across Africa, but it is not creating jobs at scale. That is the disconnect we must fix.

Across the continent, domestic financial resources have expanded significantly – within banks, pension funds, insurance pools, and sovereign institutions – now exceeding US\$4 trillion. Yet this growing capital base has not translated into the level of industrialisation, infrastructure, or employment required to support sustained economic transformation.

The consequences are structural. Africa continues to export raw materials and import finished goods – exporting jobs embedded in value chains while importing inflation embedded in products. At the same time, a rapidly expanding working-age population is entering the labour market each year, with expectations that current economic structures are not yet equipped to meet.

This is not due to an absence of capital or resources. It is a failure of alignment.

Capital exists. Resources exist. Markets exist.

But they are not connected in ways that create productive capacity, industrial depth, and sustained employment.

The question, therefore, is no longer whether Africa can finance its development. It is whether Africa can organise its capital and put in place effective intermediation at the scale and speed required to build economies that generate jobs consistently.

The analysis presented in this report reinforces a clear conclusion: Africa's binding constraint has shifted from capital availability to capital allocation and intermediation at scale.

Financial systems across much of the continent continue to favour short-duration, low-risk assets, particularly sovereign instruments. As a result, long-term savings circulate within financial markets but do not sufficiently translate into productive investment. Capital is present – but it is not being deployed in ways that transform economies.

At the same time, the external financing environment has become less reliable. Concessional resources are constrained, access to international capital markets is increasingly episodic, and bilateral lending has slowed. These dynamics underscore a structural reality: Africa must increasingly rely on its own capital base, with external capital playing a complementary role.

Within this context, the structure of investment becomes decisive.

Infrastructure must be approached not as a series of discrete projects, but as integrated systems that link energy, transport, and industry to markets. The evidence from Africa's major transport corridors is clear. Across routes such as Abidjan-Lagos, Dakar-Bamako, and the North-South Corridor, the constraint is not the absence of infrastructure assets, but the fragmentation between them. Ports, railways, and roads exist, yet inefficiencies in connectivity, border processes, and corridor governance prevent these assets from functioning as seamless supply chains.

A similar pattern is evident in Africa's resource base. The continent holds a significant share of the world's strategic minerals, yet production, processing, and demand remain structurally disconnected. This has resulted in a persistent model in which raw materials are exported while higher-value processing and manufacturing take place elsewhere.



Africa is not resource-constrained. It is value-capture constrained.

Addressing this requires a deliberate shift from extraction to transformation. It requires aligning three critical elements: resources, infrastructure, and markets. When these elements are connected, infrastructure becomes the foundation of value chains, corridors become industrial platforms, and capital becomes a driver of job creation.

Sectors such as steel, fertiliser, refining, and aluminium illustrate this dynamic clearly. Despite strong resource endowments, domestic production remains limited where enabling infrastructure systems – reliable energy, efficient logistics, and proximity to demand – are absent. Conversely, where these systems are aligned, the opportunity to retain value, expand industrial capacity, and create jobs increases significantly.

Foreword by the President & CEO, Africa Finance Corporation *continued*

Delivering this transformation requires more than capital – it requires effective intermediation.

Long-term savings must be aggregated and channelled into investable opportunities at scale. Financial instruments must be structured to meet the requirements of institutional investors. Risk must be transferred from sovereign balance sheets through guarantees, credit enhancement mechanisms, and blended finance structures. Regulatory frameworks must evolve to facilitate cross-border capital flows, reflecting the inherently regional nature of infrastructure and industrial development.

Progress is evident. Regulatory reforms are expanding the scope for institutional investment. New platforms are emerging to intermediate capital. Guarantee mechanisms are improving project bankability. However, these efforts remain uneven, and the pace of capital deployment continues to lag the scale of available resources.

Time is a critical factor. Africa's demographic trajectory provides a window in which a growing workforce can drive savings, investment, and economic expansion. The ability to convert this demographic momentum into long-term capital formation and productive capacity will determine the continent's economic trajectory. As this window narrows over time, the cost of delayed action will increase materially.

Africa Finance Corporation was established to address precisely this challenge: to mobilise, allocate, and intermediate capital in ways that deliver tangible economic transformation.

Our approach is grounded in execution. We focus on developing infrastructure as integrated systems – linking resources to energy, transport, and markets – so that capital is deployed where it can generate long-term value. We build, de-risk, and scale investments that enable industrialisation, deepen regional integration, and support sustainable growth.

Across transport corridors, energy platforms, industrial ecosystems, and natural resource value chains, AFC has consistently demonstrated that disciplined execution can unlock both development impact and commercial returns. This pragmatic execution approach – combining financial discipline with a solutions-oriented mindset – has enabled us to mobilise capital at scale while delivering measurable outcomes.

The priority now is to extend this model more broadly, strengthening financial architecture, expanding investable pipelines, and enabling greater participation of domestic institutional capital. This will require coordinated action across governments, regulators, financial institutions, and development partners.

AFC will continue to play a catalytic role in this process – structuring transactions, mobilising capital, and building the systems required to translate Africa's potential into productive capacity.

Africa stands at a defining moment.

Its capital base is substantial. Its resource endowment is well established. Its demographic trajectory provides a time-bound opportunity to translate these strengths into sustained economic transformation.

The task now is clear: to ensure that capital does not simply pass through Africa, but is retained, deployed, and compounded within African economies to build industries, create jobs, and generate lasting prosperity.

For too long, value has left the continent in raw form, only to return at a premium. That cycle must be broken.

Capital must be anchored in production.

Infrastructure must enable value chains.

Growth must translate into jobs.

This is the foundation of resilient economies. This is the pathway to industrialisation. And this is how Africa will position itself as a central engine of global growth in the decades ahead.

The opportunity is real. The constraints are understood.

What is required now is disciplined execution – at scale, with urgency, and with purpose.

Samaila Zubairu

President and Chief Executive Officer
Africa Finance Corporation

Foreword by the African Union Commissioner for Infrastructure and Energy

Africa's development trajectory is entering a decisive phase – one in which the challenge is no longer simply to build infrastructure, but to ensure that it delivers transformation at scale. Across the continent, significant investments have been made in energy, transport, and digital systems. Yet the outcomes have not always matched the ambition. Trade remains constrained, industrialisation uneven, and exposure to external shocks persists.

This report arrives at a critical moment. With the African Continental Free Trade Area (AfCFTA) advancing implementation, the foundations for a more integrated and self-sustaining continental economy are increasingly within reach. However, realising this vision depends on whether infrastructure systems can move beyond fragmentation and begin to operate as coherent, connected platforms that support production, trade, and resilience.

From the perspective of the African Union, the priority is therefore clear: to align infrastructure development with continental integration. This requires not only continued investment, but stronger coordination – across countries, across sectors, and across policy frameworks – to ensure that infrastructure functions as a unified system rather than a collection of national assets.

This systems perspective is particularly evident in the analysis of transport and logistics. Many of Africa's major corridors already contain substantial infrastructure – ports, roads, and railways – yet these do not consistently operate as efficient supply chains. Bottlenecks in connectivity, border processes, and corridor governance continue to constrain throughput along key routes. The implication is clear: the next phase of development must focus not only on expanding assets, but on ensuring that they function as integrated trade corridors capable of moving goods reliably and at scale.

In this context, aviation represents one of the most immediate levers for advancing continental integration. Given Africa's geographic scale and fragmentation, air transport has a unique role in connecting markets, particularly for high-value and time-sensitive goods. Yet intra-African connectivity remains limited. Advancing the Single African Air Transport Market (SAATM) is therefore critical – not only to improving mobility, but to supporting trade, tourism, and investment flows under the AfCFTA. Greater liberalisation, improved infrastructure, and enhanced coordination across Member States will be essential to unlocking this potential.

Energy systems remain equally central to Africa's industrialisation agenda. While expanding access to electricity continues to be a priority, the more binding constraint for economic transformation is the availability of reliable, high-load, and cost-competitive power required for productive sectors. In many countries, energy systems remain fragmented, with limited transmission infrastructure and insufficient regional interconnection. This constrains production, raises costs, and limits the ability of economies to scale.

At the same time, dependence on imported fuels and refined products exposes many economies to external price and supply shocks. Strengthening energy resilience therefore requires a more integrated approach – encompassing generation, transmission, storage, and regional interconnection – alongside investments in refining capacity, gas infrastructure, and renewable energy systems aligned with industrial demand. For Africa, the energy transition must be approached pragmatically: not only as a pathway to decarbonisation, but as a foundation for industrialisation, job creation, and economic diversification.



Regional integration is critical in this regard. Power pools and cross-border transmission networks offer an avenue to optimise resources across countries, improve reliability, and reduce costs. Continental initiatives such as the African Single Electricity Market (AfSEM) and the Continental Power Systems Master Plan provide important frameworks for advancing this objective. Their success will depend on sustained implementation and alignment across Member States.

This report underscores the relationship between infrastructure and industrialisation, particularly in the context of Africa's resource base. The continent holds significant reserves of strategic minerals, yet production, processing, and demand remain geographically fragmented. As a result, raw materials are often exported with limited value addition, while higher-value processing and manufacturing take place elsewhere.

Foreword by the African Union Commissioner for Infrastructure and Energy *continued*

Addressing this imbalance requires infrastructure systems that enable value addition within the continent. Processing minerals into higher-value products depends on reliable energy, efficient transport corridors, and access to markets. Without these enabling systems, the potential of Africa's resource endowment to support industrialisation will remain constrained.

This is especially important in the context of the global energy transition. Africa's role should not be limited to supplying raw materials. The opportunity is to participate more fully in downstream value chains – including processing, manufacturing, and recycling – so that the continent captures a greater share of the economic benefits associated with its resources.

Digital infrastructure adds a further dimension to this systems approach. As economies become increasingly interconnected, digital networks are not only a means of communication, but a foundation for productivity, coordination, and service delivery. Strengthening digital infrastructure – and ensuring its integration with energy and transport systems – will be critical to supporting trade, innovation, and inclusive growth.

Taken together, these themes point to a common conclusion: Africa's infrastructure challenge is no longer primarily about building assets, but about ensuring that those assets function as part of integrated systems that support economic activity at scale.

There is also a clear time dimension to this task. Africa's demographic trajectory provides a window of opportunity in which a rapidly expanding working-age population can support growth, savings, and investment. Realising this potential depends on building the infrastructure and productive systems required to absorb this growth. As demographic pressures evolve over time, the opportunity to establish these systems will narrow, and the costs of delayed investment will increase.

In this context, infrastructure must be understood as a central component of Africa's economic strategy. It underpins industrialisation, enables trade integration, and strengthens resilience in the face of external shocks. The effectiveness of Africa's development efforts will depend on the extent to which infrastructure, policy, and capital are aligned in a coherent and coordinated manner.

The African Union's frameworks – including the Programme for Infrastructure Development in Africa (PIDA), the Single African Air Transport Market, and the African Single Electricity Market – provide a strong foundation for advancing this agenda. The priority now is implementation at scale, supported by sustained coordination across Member States and partners.

This report provides a timely and rigorous assessment of the steps required to strengthen Africa's infrastructure systems. Its emphasis on integration, coordination, and effective deployment offers a clear framework for the next phase of development.

The task ahead is therefore one of execution. The frameworks exist. The priorities are clear. What is required now is sustained alignment between infrastructure, policy, and capital to deliver results at scale. The African Union remains committed to advancing this agenda – working with Member States, development institutions, and partners to ensure that Africa's infrastructure systems support a more integrated, resilient, and prosperous continent.

H.E. Ms. Lerato D. Mataboge

Commissioner for Infrastructure and Energy (I&E)
African Union

State of Africa's Infrastructure 2026

The Africa We Build: From Capital to Systems Deploying Infrastructure for Industrialisation, Integration, and Resilience

After two years of establishing the State of Africa's Infrastructure Report as a credible, investor-focused reference, the 2026 edition marks a deliberate shift from analysing infrastructure as isolated asset classes to examining it as integrated ecosystems that drive economic transformation.

This shift is not theoretical. A new wave of global shocks – more severe and more unpredictable than those of the past decade, particularly across energy and supply chains – has reinforced a central reality: Africa's vulnerability lies in the fragmentation and underdevelopment of the systems required to translate resource abundance into resilient, stable and scalable growth. Infrastructure must therefore be treated as a system, not a collection of assets. Fragmentation across power, logistics, and industrial capacity is what quickly turns external shocks into domestic crises.

With a new ecosystem lens, this year's report reframes each sector: capital through the financial architecture required to mobilise savings and channel them into the real economy; energy through the rewiring of power systems beyond capacity toward flexibility, integration and storage; transport & logistics through trade corridors that maximise network value rather than standalone assets; industry & manufacturing through value-addition and resilient supply chains

in strategic sectors such as fertilisers, refining, metals and food systems; and digital infrastructure through ecosystems that enable productivity, innovation and digitally-driven growth.

Across sectors, a consistent set of themes emerges. First, Africa's constraint is not a shortage of capital, but the absence of effective intermediation to channel domestic savings into productive investment at scale. As external financing becomes more constrained, domestic capital must become the anchor of development, with external capital playing a complementary role. Second, infrastructure must shift from a focus on individual assets to integrated systems, as fragmentation across energy, logistics and industry is what transmits external shocks into domestic crises. Third, energy vulnerability is systemic – driven not by resource gaps but by dependence on imported fuels and weak integration across power, storage and distribution systems. Fourth, industrialisation – particularly in fuel, fertiliser, food and metals – is no longer optional but central to macroeconomic stability and resilience. Finally, Africa's next phase of growth will depend increasingly on productivity gains across firms and sectors, requiring the development of full-stack digital ecosystems rather than connectivity alone.



Capital

External financing into Africa is declining in both scale and reliability, strengthening the case for a domestic capital-led development model. Official development assistance has already begun to reverse from its peak of US\$83.8 billion in 2020 and is projected to decline by 16–28% in Sub-Saharan Africa from 2025 onwards. Access to international bond markets has also become more episodic, with recent stress periods demonstrating how quickly African issuers can be priced out – issuance falling from over US\$29 billion in 2018 to just US\$4–6 billion annually during 2022–2023. At the same time, foreign direct investment – while relatively stable at US\$45–55 billion per year – remains concentrated and insufficiently scaled to meet the continent’s broad investment needs.

By contrast, Africa’s domestic capital base has reached meaningful scale. An update of our database shows institutional capital pools now exceed US\$2 trillion, including over US\$1 trillion in pension and insurance assets, approximately US\$275 billion in public development banks, US\$164 billion in sovereign wealth funds, and US\$530 billion in central bank reserves – supported in part by rising gold holdings and prices. However, these resources remain concentrated geographically and largely disconnected from productive sectors, with allocations still skewed toward short-term government securities.

Regulatory reforms are moving in the right direction – but require structured intermediation. Across the continent, there is growing consensus on the role of domestic savings in financing development. This is reflected in two complementary reform paths: in larger and more diversified markets (South Africa, Kenya, Nigeria, Ghana), regulators are expanding asset allocation frameworks to enable greater investment into infrastructure and private assets; while in smaller, capital-exporting economies (notably

Botswana and Namibia), reforms are focused on geographical rebalancing, introducing limits on offshore allocations to retain a greater share of savings within domestic and regional economies.

Yet actual allocations remain well below regulatory limits, indicating that regulation is not the binding constraint. The core gap lies in intermediation – specifically the absence of risk-sharing, guarantee and credit enhancement mechanisms required to convert savings into bankable investments. Regional development finance institutions therefore play a critical role in mobilising both public and private capital while providing the instruments needed to bridge risk and unlock deployment at scale.

The report identifies a group of “intermediation-ready” markets – including Nigeria, Kenya, Namibia, Botswana, Ghana and Tanzania (with Uganda approaching similar scale) – where pension and insurance assets of US\$10–25 billion, relatively concentrated fund structures and an established PPP track record provide a credible foundation to scale institutional investment.

The next frontier is not financial inclusion alone, but economic formalisation to expand the savings base. While digital financial inclusion has advanced rapidly, it is reaching structural limits where underlying incomes remain informal or low. The report therefore shifts the focus toward formalising high-value economic activity as a pathway to materially increase savings and foreign exchange accumulation. In this context, artisanal and small-scale gold mining represents a clear opportunity. Ghana’s experience – centralising gold purchases and integrating informal production – has contributed to a doubling of FX reserves, strengthening currency stability and macroeconomic resilience.

Transport and Logistics

Africa’s transport and logistics sector continues to record tangible progress across core physical assets, building on the momentum highlighted in previous editions. New port concession agreements were signed in 2025 at Durban (South Africa), Dakar (Senegal), Douala (Cameroon), Abidjan (Côte d’Ivoire) and Dekheila (Egypt). At the same time, rail development continues to gain traction, with the construction of new lines launched last year in Morocco (Kenitra–Marrakech HSR), Tanzania (Uvinza–Musongati) and Kenya (Naivasha–Kisumu).

While continued investment in ports, rail and roads remains essential, the central challenge is how these systems are connected, governed and utilised to move goods efficiently across borders. This places renewed emphasis on corridor governance and institutionalisation as critical infrastructure in its own right. Well-functioning corridor authorities in East and Southern Africa have demonstrated the value of coordinated planning, private sector engagement and performance monitoring. By contrast, most corridors in West and Central Africa remain weakly institutionalised, lacking the capacity to convene stakeholders, align priorities and drive execution – resulting in persistent inefficiencies.

AFC’s African Transport Corridors Map released alongside this report provides a system-wide view of the continent’s logistics backbone. Building on the railway map in the 2025 State of Africa’s Infrastructure Report, this map provides a system-wide view of the continent’s logistics backbone – integrating railways, ports, dry ports, airports and highways with key trade facilitation nodes. By mapping border crossings and existing or planned one-stop border posts, it highlights where soft infrastructure gaps continue to constrain trade flows along major corridors. The analysis underscores persistent bottlenecks across critical routes, including road gaps along the Lagos–Abidjan corridor and rail rehabilitation or extension requirements across the Northern, Central, North–South and Dakar–Bamako corridors.



Energy

Aviation emerges as the most immediate and scalable lever for integration.

While rail and road corridors will take time to fully materialise, air transport can connect markets, firms and consumers today – particularly for high-value, time-sensitive sectors such as horticulture, fresh produce, pharmaceuticals, electronics and e-commerce. AfCFTA-driven trade ambitions are already generating demand for faster, more reliable logistics solutions, yet aviation remains underdeveloped and fragmented, representing clear low-hanging fruit for advancing the African single market.

Unlocking this potential requires both liberalisation and infrastructure expansion.

Full implementation of Single African Air Transport Market (SAATM) would unlock 15.9 million additional passenger trips, US\$1.46 billion in annual fare savings and over 96,000 direct jobs, demonstrating the immediate economic gains from liberalisation. Demand for aviation is accelerating, but systems are not keeping pace. Despite progress, restrictive bilateral agreements, limited competition and protectionist policies continue to constrain route development and keep costs high. Cargo and passenger flows remain highly concentrated around a small number of hubs – Addis Ababa, Nairobi, Johannesburg, Lagos, Casablanca and Cairo – leaving many countries weakly connected and facing elevated logistics costs.

Where aviation ecosystems are developed, the gains are substantial.

Kenya and Rwanda illustrate what is achievable when aviation is embedded within a broader economic strategy – combining liberalisation, visa openness, infrastructure investment and effective national carriers to drive tourism, trade and connectivity. Together with Ethiopia, these models demonstrate the scale of impact, with aviation contributing a combined US\$5.5 billion to GDP and supporting around one million jobs. East Africa also shows how integrated cargo systems – linking infrastructure, national carriers and dedicated freighter capacity – can materially reduce costs and improve efficiency. Air freight between Nairobi and Kigali is significantly cheaper than between Lagos and Abidjan, despite comparable distances, and can even undercut some intra-European routes. By contrast, in the absence of direct connectivity and cargo capacity, shipments between West African cities are often routed via Europe, dramatically increasing both costs and transit times.

Over the past two editions, this report emphasised the scale of generation required to meet Africa's growing demand. This year, the lens broadens to the systems that make that capacity work – highlighting the need to rewire power systems for flexibility, resilience and integration.

The urgency of this transition is being reinforced by the current global energy shock, which has exposed a structural asymmetry in Africa's energy systems. While the continent remains a net exporter of crude oil and gas, it is heavily dependent on imported refined products, with over 70% of fuel consumption sourced externally and a significant share routed through the Gulf. Disruptions in the Strait of Hormuz and broader Middle East supply chains therefore transmit directly into African economies – not only through higher prices, but through the risk of physical shortages, FX pressure and inflation. Africa's vulnerability is therefore not upstream, but system-wide – spanning power, fuels and logistics – where limited refining capacity, weak storage and fragmented distribution networks prevent the system from absorbing shocks. Building resilience requires moving beyond capacity expansion toward integrated energy systems capable of diversifying supply, strengthening buffers and sustaining industrial activity under stress.

Much of Africa's grid infrastructure was designed for a different era: fragmented networks built around mining enclaves, single hydropower schemes and isolated urban centres. Today's economies – more urban, industrial and interconnected – require energy systems that can move power efficiently across regions, integrate renewables and respond dynamically to demand.

Africa continues to add generation below the pace required for modern economic growth, reinforcing the need for sustained investment in new capacity. The report identifies brownfield hydropower rehabilitation as the lowest-hanging fruit – with costs of US\$400–500/kW, up to five times cheaper than new build alternatives, and the ability to unlock stranded capacity from ageing assets. Across the continent, a large share of installed hydro capacity

is underperforming, and targeted rehabilitation can rapidly deliver reliable baseload power – particularly critical for West and Southern African power systems.

Rewiring Africa's energy systems requires a new transmission and distribution model anchored in private participation. Private capital has so far been almost entirely absent from the segment, accounting for just 1% of electricity investment over the past two decades. However, recent project activity reveals a turning point, with private-led transmission models emerging as a new asset class on the continent. Particularly suited to industrial and urban corridors where demand is concentrated and bankable, these models offer a scalable pathway to accelerate grid expansion while reducing investment and fiscal pressure on utilities.

Flexibility and storage are becoming central to system reliability as Africa's energy mix evolves. As renewable capacity scales, managing intermittency becomes a defining challenge for grid stability. Battery storage is therefore a core component of modern energy systems – enabling peak shifting, reducing curtailment and improving overall system efficiency. With storage capacity growing rapidly from a low base and costs declining, the report positions storage as a critical enabler of both renewable integration and industrial reliability.

Regional integration through power pools remains Africa's most immediate opportunity to optimise supply. The continent's power pools – particularly SAPP and EAPP – offer a clear pathway to optimise generation across borders and reduce system-wide costs. Significant imbalances persist, with major deficits concentrated in South Africa, southern DRC, Sudan and Zambia, while large surplus capacity exists in Angola, Ethiopia and Uganda. In that context, Angola has emerged as the single most critical transmission priority on the continent with over 2 GW of low-cost hydropower capacity currently stranded outside regional grids.

Industry and Value Addition

Macroeconomic stability and supply-chain resilience have become the most urgent driver of value addition. The compression of global crises – from COVID to the 2026 conflict across the Persian Gulf – has exposed the fragility of external dependencies. The continent still imports over 70% of its refined fuel, remains structurally dependent on imported fertilisers despite vast resource endowments, and faces a US\$92 billion annual food import bill. Each disruption translates directly into higher import costs, pressure on foreign currency reserves and macroeconomic instability, making domestic processing capacity a core economic buffer.

Clear progress is emerging in refining and fertilisers, replicating the successful cement model. Cement offers the clearest precedent, having moved from import dependence to largely self-sufficient regional production across major markets. This model – anchored in strong demand, resource proximity and integrated infrastructure – has been replicated in fertilisers, where Morocco's OCP and Nigeria's Dangote Fertiliser are building globally competitive platforms, and increasingly in refining, where new capacity such as the Dangote refinery is beginning to structurally reduce fuel import dependence. These sectors show that value addition scales when infrastructure, policy and industrial capacity are developed together.

In contrast, metals and minerals value chains remain largely stalled despite Africa's resource dominance. Across steel, aluminium, copper and ferro-alloys, the continent continues to export raw materials while importing finished products, capturing only a fraction of the value chain. The constraint is not resource availability or demand, but the absence of enabling ecosystems – particularly affordable and reliable power, transport corridors and coherent industrial policy. In some cases, existing capacity is even under pressure, highlighting that sustaining industrial capability is as critical as building new capacity. Scaling value addition requires moving from national strategies to coordinated regional ecosystems. Many value chains are not competitive within the confines of individual national markets, but become viable when resources, infrastructure and demand are aggregated across borders. Aligning gas, minerals and agricultural endowments with regional power, rail and port corridors – and linking these to industrial demand – will be critical to building competitive value chains at scale.

Digital infrastructure

Africa's development model is being reshaped by a structural shift in the global economy: technology is compressing traditional industrialisation pathways and reducing the job intensity of manufacturing. As a result, future growth will depend increasingly on raising productivity across services and small firms that already employ the majority of the labour force. This fundamentally changes the role of digital infrastructure – from a connectivity agenda to a core economic strategy centred on enabling productivity, job quality and competitiveness.

Digital infrastructure must therefore be understood not as connectivity alone, but as an ecosystem that enables productivity. Africa has made significant progress in building the foundations of connectivity, with expanding fibre networks, new subsea cable capacity and growing data centre investments. Yet access and usage remain far below potential, with a persistent 64% usage gap and infrastructure that is often underutilised. The constraint is no longer just physical access, but the absence of the “missing middle” – the platforms, services, skills and institutions that translate connectivity into productive economic use.

The next phase of growth will be driven by productivity gains in SMEs and the informal economy, which can account for up to 60% of economic activity. Across Africa, smaller firms – many operating informally – employ the bulk of the workforce but remain structurally low-productivity. As seen in economies such as India, economy-wide growth increasingly depends on raising productivity within these firms rather than relying solely on large-scale industrial expansion. Digital tools – payments, e-commerce, cloud services, AI-enabled applications – offer a pathway to scale productivity, formalise activity and improve access to markets and finance.

Bridging the “missing middle” is now the central challenge for digital transformation.

Between physical infrastructure and end users lies a thin layer of platforms, digital public infrastructure and enterprise solutions that remains underdeveloped. Digital identity, interoperable payments and data exchange systems are critical to enabling participation in the digital economy at scale. Where these systems are in place, they unlock financial inclusion, business formalisation and service delivery – turning connectivity into measurable economic outcomes.

The priority is to build full-stack digital ecosystems that connect infrastructure to economic use. This requires coordinated investment across connectivity, platforms, digital public infrastructure, skills and innovation ecosystems. Without this integration, infrastructure will remain underutilised and economic returns limited. With it, digital infrastructure becomes a catalyst for broad-based productivity growth, job creation and long-term competitiveness.

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Capital

From Capital Pools to Investment Systems

- External capital is retreating, while domestic capital has reached comparable scale. Official Development Assistance declined by a further 23.1% in 2025, the largest contraction on record. For context, cumulative external flows to Africa over 2014–2024 totalled approximately US\$1.7 trillion. This is now broadly matched by domestic capital pools, comprising around US\$1.5 trillion in non-bank financial assets (rising to US\$2 trillion including central bank reserves), alongside a further US\$2.1 trillion in banking sector assets. The implication is clear: Africa's own capital base has the scale to offset declining external financing – provided it is effectively intermediated and channelled into infrastructure and industrial development.
- Domestic debt markets have expanded but remain structurally shallow. Issuance has increased significantly over the past decade, driven predominantly by short-term instruments, resulting in elevated nominal yields but often negative real returns in high-inflation environments – underscoring the need to deepen yield curves, extend maturities, and channel capital toward productive investment.
- Regulatory frameworks for pension investments are evolving, but capital remains underdeployed. While diversification limits are gradually being relaxed, actual allocations to infrastructure and alternative assets remains low – highlighting the need for stronger intermediation, alongside credit enhancement and risk-sharing mechanisms to crowd in both domestic and international institutional capital.
- Intermediation platforms are expanding but capacity constraints persist. The emergence of sovereign wealth funds and *Caisse des Dépôts et Consignations* (Caisses) reflects increasing political commitment to strengthening the savings-investment nexus; however, scaling impact will depend on institutional depth, execution capability and greater regional coordination.
- Africa's demographic window presents a time-bound opportunity. With over 40% of global working-age population growth projected through 2050 and relatively limited aging pressures until mid-century, the priority is to translate economic activity into greater formal savings – leveraging digital public infrastructure and mobile money to build scalable, long-term domestic capital pools.

i From Mobilisation to Deployment – Anchoring Africa’s Development in African Capital

Africa’s Constraint has Shifted: From Capital Mobilisation to Capital Deployment

Africa’s constraint is no longer capital mobilisation, but capital deployment.

The continent holds over US\$4 trillion in domestic capital across banks, pension funds, insurance companies, development banks, sovereign wealth funds, and reserves. Yet investment in infrastructure and productive sectors remains persistently below required levels.

The *State of Africa’s Infrastructure Report 2025* established a central conclusion: Africa is not capital-scarce. This year’s report advances that insight. If 2025 demonstrated that capital exists, 2026 focuses on the systems required to deploy it at scale.

In practice, domestic capital remains concentrated in short-term, low-risk assets, particularly government securities. This reflects regulatory incentives, limited investable pipelines, and insufficient risk mitigation mechanisms. The result is a structural disconnect between the scale of available capital and the financing of long-term development.

What is missing is a coherent ecosystem of institutions, credit enhancement instruments, origination platforms, market structures – and critically, policy frameworks – that can intermediate African capital by channelling savings into productive investment.

The implication is clear: **Africa’s development challenge is no longer financial, it is institutional.**

External Financing is Becoming Structurally Less Reliable

Africa's development financing model is undergoing a structural recalibration. Traditional external sources are becoming more constrained, more volatile, and increasingly insufficient to meet the continent's investment needs.

Three dynamics define this shift.

First, official development assistance (ODA) is declining.

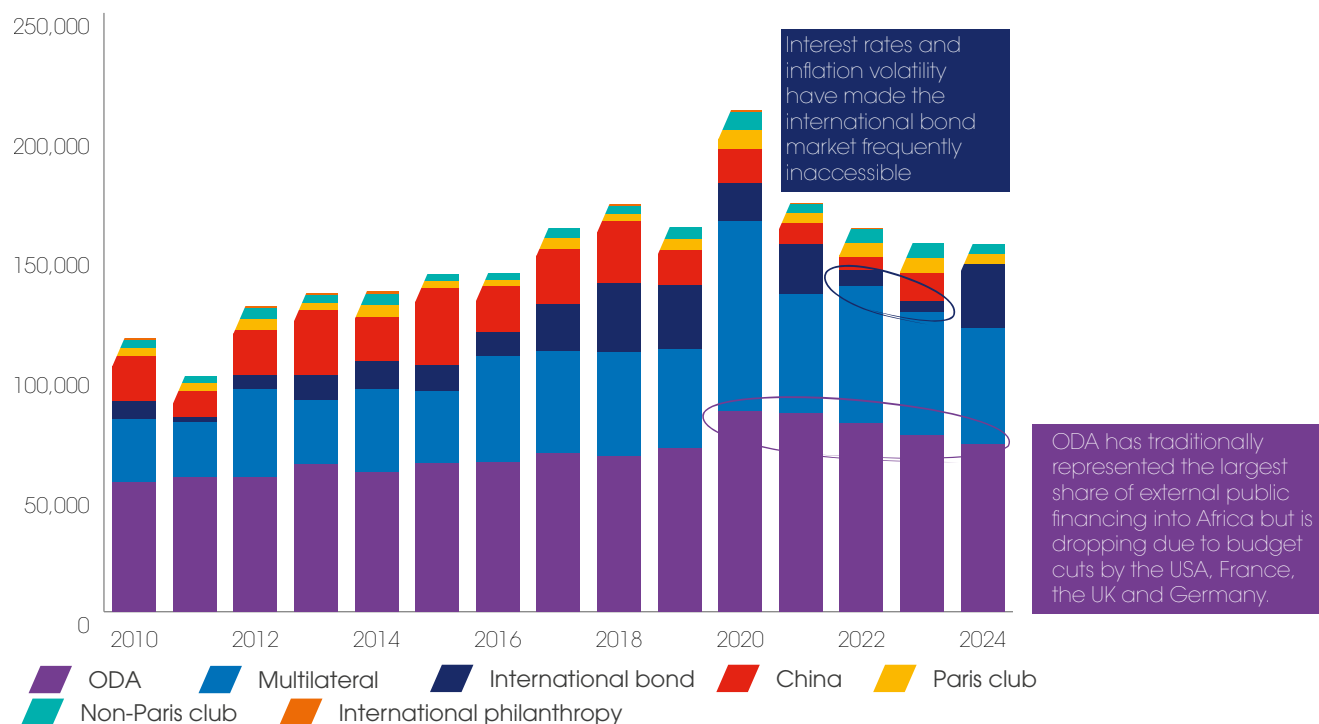
ODA, historically a major source of concessional financing, fell from its peak of US\$83.8 billion in 2020 (Figure 1) to US\$73.5 billion in 2023 and is expected to fall by up to 20% from 2025, with sub-Saharan Africa likely to witness cuts of up to 28%.¹ This directly constrains the availability of grants, concessional loans, and budget support that have historically supported public investment.

On the other side, the latest data from the Organisation for Economic Co-operation and Development (OECD) points to a recent growth of philanthropic flows, from US\$4 billion in 2020 to US\$4.8 billion in 2023.² But these are largely coming from a few global philanthropies (Gates Foundation, Mastercard Foundation) and are largely concentrated in health and education.³

Second, international capital markets have become more volatile and episodic. Elevated global interest rates, persistent inflation and geopolitical shocks have raised borrowing costs and intermittently closed market access. Sovereign issuance declined sharply, from over US\$29 billion in 2018 to just US\$4-6 billion annually in 2022-2023⁴ (Figure 1), highlighting pricing pressures and periods of exclusion.

Figure 1: External financing into Africa is declining in scale and reliability, strengthening the case for a domestic capital-led development model

Africa's external debt by instrument type, in US\$ million



Source: AFC staff calculations based on Manger, M. S., D. Mihalyi, U. Panizza, N. Rescia, C. Trebesch, and K. L. Wong (2025). Africa's domestic debt boom: Evidence from the African debt database. CEPR Discussion Paper 20747, Centre for Economic Policy Research (CEPR). See /paper for BibTex. Data on China loans is based on the Chinese Loans to Africa (CLA) Database of Boston University.

¹ https://www.oecd.org/en/publications/cuts-in-official-development-assistance_8c530629-en/full-report.html

² https://www.oecd.org/en/publications/private-philanthropy-for-development-third-edition_98e676c0-en.html

³ AFC staff analysed the OECD database covering philanthropic disbursements from 27 global philanthropies in 2024. They found that over half of disbursements went to healthcare and only 7% to economic infrastructure and services, particularly transport.

⁴ Manger, M. S., D. Mihalyi, U. Panizza, N. Rescia, C. Trebesch, and K. L. Wong (2025). Africa's domestic debt boom: Evidence from the African debt database. CEPR Discussion Paper 20747, Centre for Economic Policy Research (CEPR). See /paper for BibTex.

Part of this tightening reflects a deterioration in credit profiles for some African sovereigns, in many cases linked to debt accumulation during earlier investment cycles, including infrastructure expansion. However, this dynamic also underscores a deeper structural fragility: a development financing model that relies heavily on sovereign balance sheets risks becoming pro-cyclical, withdrawing access precisely when investment needs are most acute.

This creates a critical constraint. Africa's development trajectory cannot be contingent on intermittent access to external sovereign financing. The continent faces accelerating structural pressures, including rapid population growth, urbanisation, rising infrastructure deficits, and increasing climate vulnerability. These require sustained and predictable investment flows. Allowing sovereign stress to translate into investment pauses risks entrenching infrastructure gaps and delaying growth.

Third, foreign direct investment remains concentrated and uncertain, limiting its ability to meet Africa's broad investment needs. While aggregate flows have stabilised in the US\$45-55 billion range annually,⁵ they are heavily skewed toward North Africa and a small number of sub-Saharan economies. At the same time, bilateral official lending, notably from China – historically an important source of infrastructure financing – has declined significantly from its peak in the 2010s.⁶

Collectively, these developments point to a clear conclusion: External financing can no longer serve as a dependable foundation for Africa's development model; it can only play a complementary role.



⁵ UN Trade and Development (UNCTAD). *World Investment Report 2025*. <https://unctad.org/topic/investment/world-investment-report>

⁶ Boston University Global Development Policy Center, *Chinese Loans to Africa Database*. <https://www.bu.edu/gdp/chinese-loans-to-africa-database/>

2 From Sovereign Concentration to Productive Allocation

Africa's domestic capital base continues to deepen and broaden in scope. Non-banking assets alone reached an estimated US\$2 trillion by end-2025, according to AFC's latest Domestic Capital Pools Dataset (Figure 2). Expansion has been recorded across all major segments, reinforcing the capacity of domestic pools to rebalance investment flows and increasingly anchor financing for the continent's development.

Pension and insurance assets crossed the US\$1 trillion threshold in 2025, supported by investment returns, currency appreciation and sustained contribution flows despite persistent concentration. Growth has been underpinned by strong performance in key markets between 2023 and 2025 – including South Africa, Botswana, Kenya, Malawi, and Namibia – as well as currency appreciation against the US dollar in Ghana and Nigeria. However, concentration remains pronounced: South Africa accounts for 73% of pension assets and 80% of insurance assets, highlighting both the scale achieved and the uneven distribution across the continent. South Africa's insurance and retirement assets gained a combined ZAR1.8 trillion (US\$ 112 billion) between December 2024 and December 2025,⁷ heavily influencing the continent's overall growth in institutional assets since our last report.

Public development banks have expanded but remain structurally concentrated and unevenly capitalised. Total assets have reached US\$276 billion, with more than half held by a small group of institutions, including the African Development Bank Group (AfDB), Afreximbank, AFC, Trade and Development Bank (TDB), and Banque Ouest Africaine de Développement (BOAD). By contrast, most national development banks remain under-capitalised and face persistent constraints in accessing long-term funding, limiting their ability to play a catalytic role in domestic investment ecosystems.

Sovereign wealth funds are expanding in number and strategic relevance, albeit with more modest asset growth. Total assets stand at approximately US\$164 billion, with recent expansion reflecting new inflows and institutional expansion. Funds in Senegal and Mozambique have begun receiving revenues from newly commissioned hydrocarbon projects, while several countries – including Botswana, the Democratic Republic of the Congo (D.R. Congo), Kenya, and Zambia – launched or announced new funds in 2025. This points to a growing policy shift toward formalising and managing public savings more strategically.

⁷ South African Reserve Bank. Quarterly Bulletin.

⁸ International Monetary Fund (IMF) International Financial Statistics (IFS), respective central banks, World Gold Council.

Central bank reserves have strengthened, supported by commodity dynamics and a historic rally in gold prices. Total African central bank reserves increased by US\$50 billion, from US\$480 billion in 2024 to US\$530 billion in 2025. This was supported by stronger commodity prices and increased gold accumulation, notably active gold purchasing programmes in countries such as Egypt, Ghana, Tanzania, and Zimbabwe. Gold now represents approximately 17% of total reserves, up from less than 10% in 2022-2023, with physical holdings rising from 663 tonnes in 2022 to an estimated 738 tonnes in 2025.⁸ While valuation effects from higher gold prices contributed to this increase, the accumulation of physical stocks reflects a deliberate shift in reserve management strategies across several economies.

Despite this expansion, asset allocation patterns remain a binding constraint. Portfolios across African institutional investors are still heavily skewed toward short-duration, low-risk instruments (Figure 3), with a dominant allocation to government securities – particularly short-term Treasury bills – alongside significant holdings in money market instruments such as deposits and cash. Real estate exposure is also material but often concentrated in public or quasi-public assets, including government buildings and long-lease properties, rather than commercially driven portfolios.

By contrast, allocations to the real economy remain limited. Exposure to listed and unlisted equities (including private equity), corporate debt, collective investment schemes, and alternative instruments such as infrastructure is comparatively shallow. Where diversification is more advanced, notably in South Africa, it is underpinned by deeper capital markets, although in some cases a meaningful share of equity exposure is directed offshore (e.g., Botswana and Malawi).

Insurance portfolios exhibit an even stronger bias toward liquidity and capital preservation (Figure 4). Across the sector, allocations are heavily concentrated in money market instruments and real estate, reflecting shorter liability horizons, regulatory constraints, and a generally more conservative risk profile.

A more differentiated picture emerges within life insurance. Given this sector's longer-term liability structure, life insurers are better positioned to allocate toward duration-matching assets, including government bonds, listed and unlisted equities, and corporate instruments. This positions life insurance as a critical channel for mobilising domestic capital for long-term investment. The relevance of this channel is particularly evident in markets where life insurance represents a significant share of total insurance assets, highlighting its strategic role in strengthening domestic intermediation. Such markets include Botswana, Côte d'Ivoire, Eswatini, Kenya, Namibia, South Africa, Zimbabwe, Uganda, and Morocco.

Figure 2: The US\$4.5 trillion opportunity
Breakdown of African domestic capital pools as of 2025*

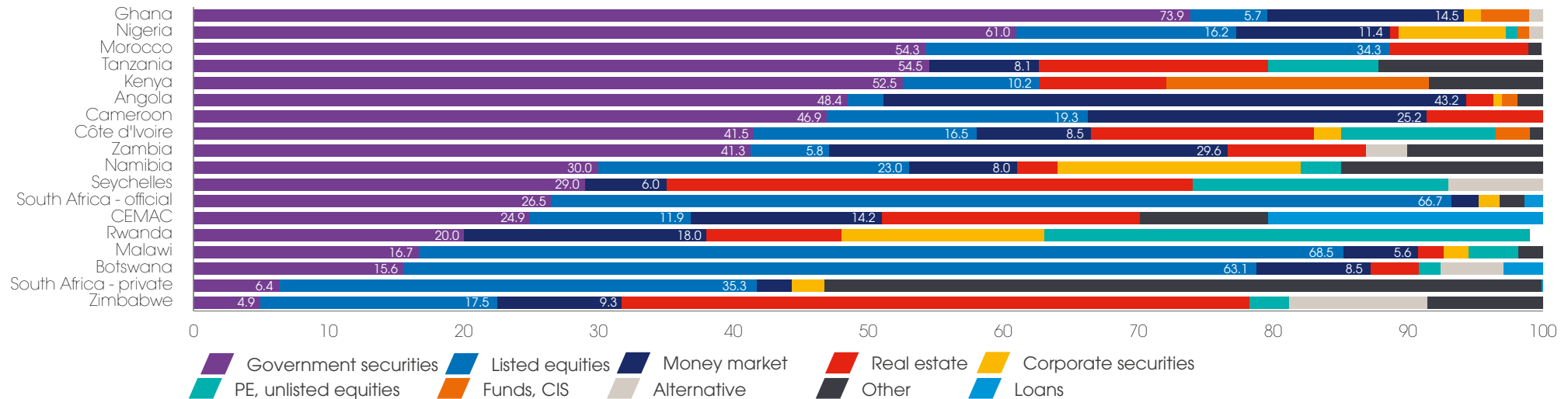


* The estimate of commercial bank assets has been revised from US\$2.5 trillion in the previous edition to US\$2.1 trillion in this report. This adjustment reflects the application of a harmonised bottom-up methodology across all asset classes, based on country-level aggregation of domestic and regional banking institutions. The prior estimate was derived from a third-party dataset (Intelligence Africa, S&P Global) which includes the assets of foreign-owned banks operating on the continent and has since been updated to approximately US\$3.2 trillion. The revised figure therefore ensures greater methodological consistency across the capital pools framework.

Note(s): Data reflect end-2025 estimates, compiled using the latest available data for each market, which may correspond to 2024 reporting periods or earlier. Size of informality is conservatively assumed by applying a 20% savings rate on 35% of Africa's GDP. Refer to Statistical Annex for country breakdown.

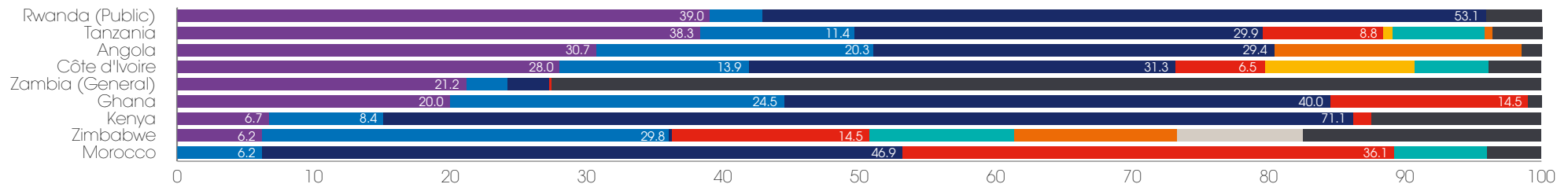
Source(s): AFC Research estimates. Data for commercial banks, pensions and insurance is aggregated from a range of national and regional sources (central banks, national/regional regulatory agencies, and industry associations); data for public development banks is sourced from the DFI Database of the Institute of New Structural Economics at Peking University and the French Development Agency, and updated where possible by AFC Research; and data for external reserves is sourced from the IMF.

Figure 3: African pension assets are largely allocated to low-risk, short-term instruments
Pension assets allocation in % over 2022-24 (latest year available)

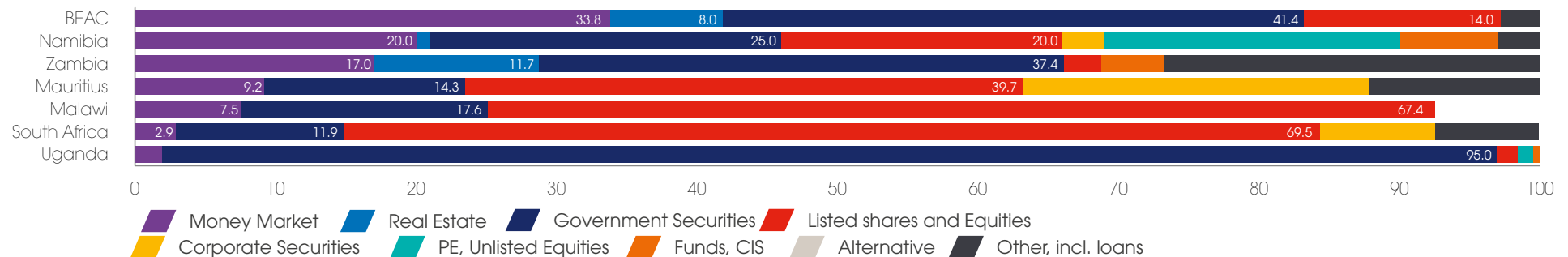


Source(s): AFC Research based on central banks' and regulatory agencies' data along with individual funds' disclosures.

Figure 4: Insurance portfolios allocations also reflect short-term, liquidity-driven allocation...
Insurance assets allocation in % over 2022-24 (latest year available)



... although life insurers' allocations are supported by longer-term liabilities
Life-insurance assets allocation in % over 2022-24 (latest year available)

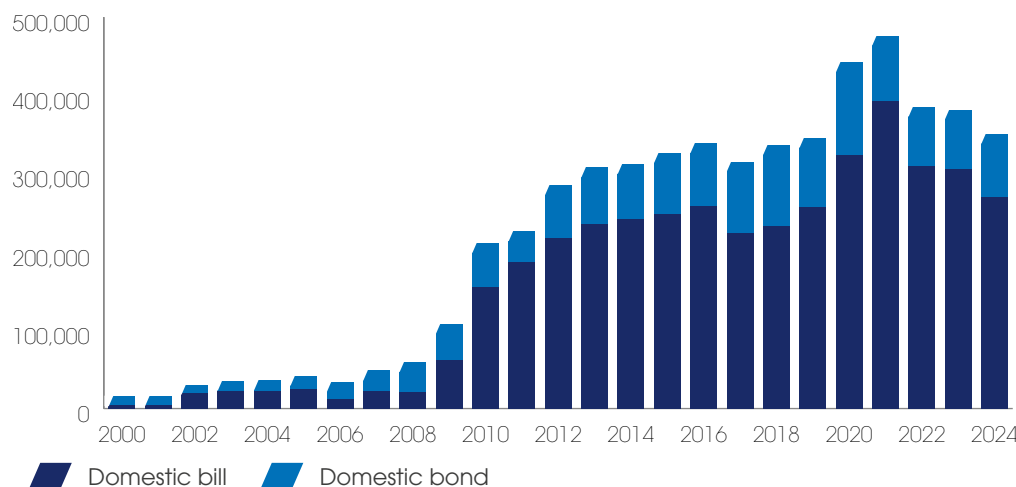


Source(s): AFC Research based on central banks' and regulatory agencies' data along with individual funds' disclosures.

This allocation pattern reflects broader structural dynamics, notably the rapid expansion of domestic debt markets across the continent. Over the past 15 years, domestic debt issuance has surged, reaching US\$150 billion in 2010 and doubling again by 2020 (Figure 5). This growth has been driven primarily by the proliferation of short-term instruments, particularly Treasury bills, which offer governments a flexible financing source while providing institutional investors with liquid, low-risk assets. As a result, domestic capital mobilisation in Africa is not absent – on the contrary, it is significant – but it remains overwhelmingly intermediated through short-duration government paper.

While this expansion has supported the development of local debt capital markets and reduced reliance on external financing, it has also constrained these markets' depth and effectiveness. The dominance of short-term issuance limits yield curve formation, restricts duration, and reinforces portfolio concentration of institutional portfolios in liquid assets. By contrast, the gradual expansion of domestic bond markets in countries such as Ghana and Tanzania illustrates the potential for longer-dated instruments to deepen markets, improve price discovery, and broaden the universe of investable assets.⁹

Figure 5: Growth in domestic debt is concentrated in short-term bill issuance
Africa's domestic debt issuance: domestic bills vs. domestic bonds, in US\$ million



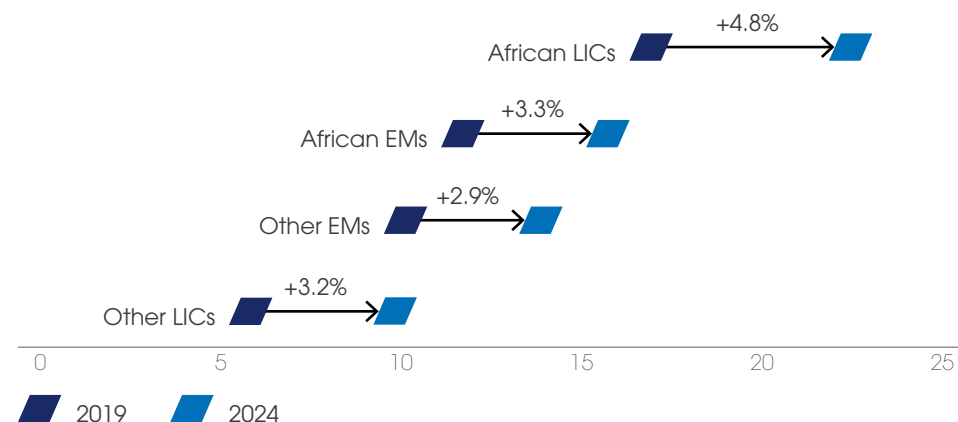
Source: Manger, M. S., D. Mihalyi, U. Panizza, N. Rescia, C. Trebesch, and K. L. Wong (2025). Africa's domestic debt boom: Evidence from the African debt database. CEPR Discussion Paper 20747, Centre for Economic Policy Research (CEPR). See /paper for BibTex.

Domestic borrowing, however, remains costly. Nominal yields frequently exceed 12%, while real returns are often negative in high-inflation environments. This creates a structurally inefficient equilibrium: governments face elevated borrowing costs, while domestic investors, despite heavy allocations, struggle to preserve real value. Deepening

domestic debt markets by extending maturities, diversifying instruments, and strengthening bond market ecosystems, will be critical to redirecting capital toward long-term, productive uses.

At the same time, this structure reinforces a tight sovereign-bank nexus across many African economies (Figure 6). Commercial banks – often the dominant intermediaries – allocate a significant share of their balance sheets to government securities, driven by liquidity needs, regulatory treatment, and attractive risk-adjusted returns relative to private lending. This creates a mutually reinforcing dependence: sovereigns rely on banks as a stable source of financing, while banks rely on sovereign exposure as a core asset class.

Figure 6: Government debt is taking a growing share of bank balance sheets and deepening the sovereign-bank nexus
Public debt in percent of bank assets



EMs = emerging market economies; LICs = low-income countries.

Source(s): Barrail, Dehmej, and Wezel, forthcoming; and IMF staff calculations. Re-adapted from Sy, Amadou and Laws, Athene (March 2026). *The New Face of African Debt*.

In periods of fiscal stress, this interdependence can amplify systemic risk. Deterioration in sovereign credit worthiness weakens bank balance sheets, while tighter liquidity and capital constraints reduce banks' ability to extend credit to the real economy. This dynamic has been evident in several African markets in recent years, where fiscal pressures have coincided with tightening domestic credit conditions.

In this context, diversification should be understood not as a departure from prudence, but as a necessary form of risk management. Infrastructure and private sector assets offer long-duration, often inflation-linked cash flows that are better aligned with the liabilities of pension and insurance funds. They also support the development of local currency financing ecosystems, reducing systemic concentration in sovereign risk.

⁹ Manger, M. S., D. Mihalyi, U. Panizza, N. Rescia, C. Trebesch, and K. L. Wong (2025). Africa's domestic debt boom: Evidence from the African debt database. CEPR Discussion Paper 20747, Centre for Economic Policy Research (CEPR). See /paper for BibTex.

Global experience demonstrates that such reallocation is achievable. India, for example, has successfully leveraged life insurance as a cornerstone of infrastructure financing, supported by tailored investment vehicles, such as infrastructure debt funds (IDFs), infrastructure investment trusts (InvITs), and real estate investment trusts (REITs) designed to match insurers' long-term liabilities. Supported by targeted regulatory reforms, including relaxed investment norms and higher allocation limits, these instruments provide scalable and investable channels into infrastructure. As a result, life insurance funds in India allocate over 11% of assets to infrastructure – among the highest globally. This demonstrates how appropriately structured products and intermediation frameworks can effectively channel long-term savings into productive investment.

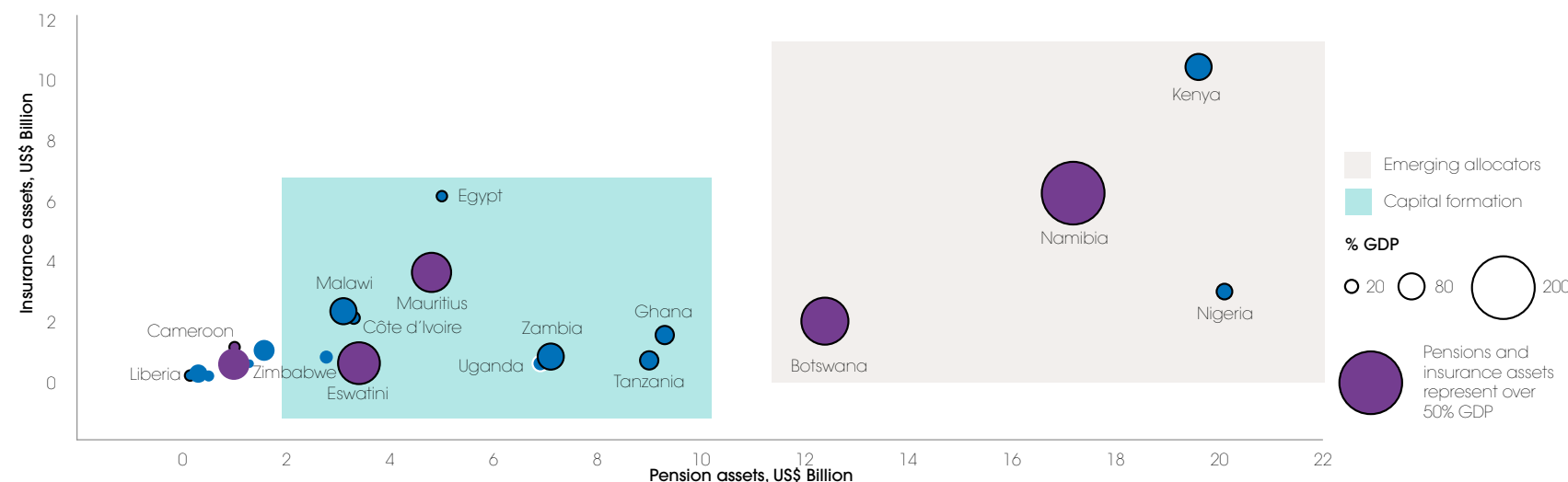
More broadly, Asia illustrates how structured intermediation can mobilise both domestic and global capital at scale. Across the region, sovereign investment platforms have played a central role in mobilising domestic capital and crowding in global investors. These vehicles are designed to aggregate capital, de-risk projects, and create investable pipelines across greenfield and brownfield assets.

- In India, the creation of the National Investment and Infrastructure Fund (NIIF) in 2015 has established efficient channels to deploy long-term savings into infrastructure. Anchored by the Government of India, the NIIF combines public capital with domestic and international institutional investors, managing over US\$4.9 billion across sectors including digital infrastructure, transport, and renewable energy.
- In Indonesia, the Indonesia Investment Authority was established in 2021 with an initial US\$2 billion state capital injection and now manages around US\$9 billion. It operates as a co-investment platform, partnering with international institutional investors across sectors including transport, energy, digital infrastructure, and manufacturing.
- In Malaysia, Khazanah Nasional (US\$38 billion in assets under management (AUM)) illustrates the long-term role of state-backed capital in building investment ecosystems. Since 2004, it has anchored strategic sectors such as transport, energy, and telecommunications, demonstrating how well-structured public investment vehicles can deploy domestic savings and catalyse broader private sector participation.

China provides a further example of scale through a different model, relying on state-owned banks and policy institutions to channel domestic savings into infrastructure investment.¹⁰ While institutional investor participation is more limited, the underlying lesson is consistent: large domestic savings pools can be effectively directed toward infrastructure where strong coordinating institutions and policy frameworks are in place. Notably, China's domestic credit to the private sector reached around 190% of GDP in 2024 (matched only by Japan and the United States), compared to approximately 30% across Africa.¹¹

The implication across these experiences is clear: scaling infrastructure investment is not primarily a function of capital availability, but of the systems that intermediate savings into investable assets. It requires a combination of credible pipelines, appropriate vehicles, and effective risk-sharing mechanisms. Several African markets – including Nigeria, Kenya, Namibia, Botswana, Ghana, and Tanzania – already exhibit many of the foundational conditions required to move in this direction, including sufficiently large asset bases (US\$10-30 billion), relatively concentrated institutional structures, and an emerging track record in infrastructure delivery.

Figure 7: Institutional capital pools grow and can turn into meaningful investment – if intermediation exists
Pension and insurance assets in selected African markets (excl. South Africa and Morocco)



Source: AFC Capital Pools Dataset

¹⁰ Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.

¹¹ International Financial Statistics database, IMF; World Development Indicators Database, World Bank; National Accounts data files, OECD.

3 Unlocking Africa's Domestic Capital Pools: the Role of Policy

Regulatory reforms across Africa are increasingly aligned with the goal of diversifying domestic institutional capital. A full regulatory mapping is provided in Table 1, drawing on the OECD's 2025 Annual Survey of Investment Regulation of Pension Providers and updated by AFC Research.

Recent years point to two distinct regulatory trends. In smaller and more open economies, such as Namibia and Botswana, policy efforts have focused on retaining capital domestically, reversing historically high offshore allocations through measures such as foreign investment caps and domestic asset requirements.

- In Namibia, a 2017 regulation mandates pension and insurance funds to allocate at least 1.75% (and up to 3.5%) of their portfolios to unlisted Namibian companies, facilitating the creation of an ecosystem of unlisted investment managers (UIMs) and special purpose vehicles (SPVs) to channel institutional capital into domestic private enterprises. Since 2017, Namibia has licensed 31 UIMs and regulated 21 SPVs that have raised \$180 million locally and represented 1.4% of AUM in 2024.¹²
- In Botswana, a 2022 regulatory amendment requires pension funds to increase their domestic investment from 33% to 50%, representing a repatriation of some BWP\$18 billion (~US\$1.7 billion) at the time. As a result, domestic allocations have grown to 44% as at end-2025.

In larger and more diversified markets – including South Africa, Nigeria, and Ghana – the emphasis has shifted toward expanding permissible asset classes, enabling pension and insurance funds to invest in infrastructure, private equity, and other alternative assets.

- In 2021, Ghana amended its investment guidelines¹³ to increase the allowed limit for alternative investments from 15% to 25% and expand the list of these investments to include private debt funds and infrastructure bonds or funds. In 2025, the government issued a new directive mandating pension funds and insurance companies to allocate at least 5% of their assets to private equity and venture capital by 2026.
- In 2022, South Africa amended Regulation 28 of its Pension Funds Act¹⁴ to allow up to 45% of assets in infrastructure-related investments, even though infrastructure is not formally designated as an asset class on its own.
- In 2025, Nigeria's regulator, PenCom, issued revised regulations allowing pension funds to invest in exchange-traded derivatives, gold-backed instruments, agriculture-linked funds, and commodity-backed assets.¹⁵

¹² Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.

¹³ Ghana Gazette (September 2021). *Guidelines on Investment of Tiers 2 and 3 Pension Scheme Funds*. <https://npra.gov.gh/assets/documents/New-investment-Guidelines-Extra-O-GAZETTE-NO-127-14-09-2021.pdf>

¹⁴ South Africa's Government Gazette (July 2022). *Amendments to Regulation 28 in Terms of the Pension Funds Act, 1956*. https://www.treasury.gov.za/comm_media/press/2022/2022070501%20Published%20Amendments%20to%20Reg%2028.pdf

¹⁵ PenCom (September 2025). *Revised Regulation on Investment of Pension Fund Assets*. <https://www.pencom.gov.ng/wp-content/uploads/2025/09/The-Revised-Regulation-on-Investment-of-Pension-Fund-Assets.pdf>



**Table 1: Pension investment rules are becoming more flexible, but limits remain restrictive**

Jurisdiction	Equity	Real estate	Bills and bonds (public sector)	Private sector bonds	Retail investment funds	Private investment funds	Loans	Bank deposits
Angola	n/a	40%	70%	60%		30%	40% (to members)	30%
Botswana	70% (listed) 20% (unlisted) 10% (paid-up shares in building society)	25% (local) 10% (offshore property)	100%	40% (statutory) 50% (foreign)	n/a	5% (offshore PE) 5% (local infra. fund) 10% (local PE)	0%	25% (local) 30% (foreign)
CIPRES	30%	30%	40%		OPCVM (40%) OPC (10%)		10% (loans to the State)	40%
Egypt	15% (direct)	10% (direct)	15-75% (direct)	20% (direct)	40% (money market investment funds)	5-20% (listed equity investment funds)	25% (indirect)	35% (direct)
Eswatini	75% (domestic and foreign)	30% (domestic)	100% (domestic and foreign)	0%	30% (domestic) 25% (foreign)	2% (domestic and foreign)	60% (loans to members for erecting or purchasing a dwelling place)	50% (domestic and foreign)
Ghana	20%	10%	75% (incl. 60% government and 15% local government)	35%	15% (CIS incl. mutual funds and ETFs)	15% (CIS incl. mutual funds and ETFs)		35%
Kenya	70% EAC (incl. CIS and ETFs) 5% (unlisted)	30% (incl. REITs) Kenya only	90% EAC Government Securities and infrastructure bonds issued by public institutions	20% (listed, incl. CIS) 10% (unlisted with investment grade credit rating, incl. commercial paper)	100% (guaranteed funds)	10% (PE/VC) 10% (debt instruments for infrastructure and affordable housing approved under PPP Act)	not allowed	30% 5% (cash and demand deposits)
Lesotho	75% (listed) 10% (unlisted)	25%	100% (domestic) 75% (foreign)	50%	100% (CIS)	100%	100% (domestic) 75% (foreign)	100%
Malawi	75% (listed) 10% (unlisted) 5% (insurers with less than 3y of operations in Malawi)	10% (real estate) 20% (REIT)	80% 30% for 1y term or lower	75% (listed) 10% (unlisted) 5% (insurers with less than 3y of operations in Malawi)	100% (direct)	100% (direct)	100% (direct)	30% (direct)
Mauritius	no specific limit	no specific limit	no specific limit	no specific limit	no specific limit	no specific limit	55%	no specific limit
Morocco CIMR	25%	15%	no limit	65%			5%	65%
Mozambique	40%	50%	100%	60%	n/a	50%	50%	35%
Namibia	75% (direct)	25% (direct)	95% (Government) 50% (statutory body and local authority)	50% (domestic) 50% (foreign)	100% (direct)	1.75-3.5% (unlisted debt or equity exposure)	25% (direct)	95%
Nigeria DCPS II	25% 5% (unlisted)	not allowed	50% (FGN, CBN) Up to 60% if backed by Infrastructure Assets 15% (States)	40% (30% if infrastructure bonds)	20%	5% (Agriculture investment funds) 10% (PE Funds) 20% (Infrastructure Funds) 20% (open, close-end, hybrid incl. REITs and ETFs)	not allowed	30% (money market)

Jurisdiction	Equity	Real estate	Bills and bonds (public sector)	Private sector bonds	Retail investment funds	Private investment funds	Loans	Bank deposits
Nigeria DCPS III	10%	not allowed	70% (FGN, CBN) Up to 80% if backed by Infrastructure Assets 20% (States)	45% (25% if infrastructure bonds)	10%	0% (Infrastructure Funds) 0% (PE Funds) 0% (Agriculture investment funds) 10% (open, close-end, hybrid incl. REITs and ETFs)	not allowed	35% (money market)
Rwanda	70% (listed) 15% (unlisted)	30% (listed REITs incorporated in Rwanda and approved by CMA)	100%	20% (listed) 10% (unlisted)				100%
Seychelles	55% (overall) 25% (domestic) 30% (international)	50%	35% (domestic and foreign fixed income)	35% (domestic and foreign fixed income)	2% (alternative investments)	2% (alternative investments incl. PE)	not allowed	35% (domestic and foreign fixed income incl. fixed term deposits)
South Africa	75% (listed) 10% (unlisted) excl. shares in property companies	25% (listed) 15% (unlisted)	100% (SA)	75% (overall) 25% (unlisted)	no limit	10% (hedge funds) 15% (PE funds)	5% (up to 10% with approval of FSCA)	100%
Tanzania	20% (direct) of which unquoted equity is 5%	30% (direct) of which non-income earning properties is 5%	20-70% (direct)	20% (direct) of which unlisted is 5%	not stated	5% (unquoted equity)	10% (direct loans to government) 10% (loans to corporates and cooperative societies) 20% (direct)	35% (direct)
Uganda	70% (direct) East African stock exchange and CIS approved by CMA or regional institution	30% (direct) Uganda only	80% (direct) East Africa only	30% (direct) East Africa only		15% (unlisted PE) East Africa only	prohibited	30% (direct)
Zambia private	5-70% (listed)	40% Zambia only	2.5% minimum	10%	0%	15% (PE)	need Authority's approval	2.5-20%
Zimbabwe private	60% (listed)	40% (incl. REITs) all asset classes related to property should not exceed 75%		40% (public and private bonds)	n/a	15% (unquoted)		20%

Source: OECD (2025). Annual Survey of Investment Regulation of Pension Providers. Updated where relevant by AFC Research.

Note(s): In Botswana, investments allowed in commodities (10%), alternative (25%), offshore equity (50% listed, 5% unlisted); but not more than 50% of the total fair value of the portfolio may be invested abroad. Private equity and infrastructure funds investment are allowed if registered by the regulator and/or the instrument is listed on the BSE. Eswatini and Namibia have mandatory domestic allocations of 30% and 45%, respectively. In Ghana, investments allowed in alternative (25% including infrastructure bonds/funds) and foreign investments permitted up to 5%. Kenya allows exchange trade derivative (5%), debt instruments for infrastructure and affordable housing (10%), and other assets (10% pending regulator's approval). Offshore investment outside EAC are capped at 15% but only in selected assets. In Mauritius, foreign investments are allowed up to 70%. South Africa permits investments in commodities (10%) and infrastructure-related assets (45%). In both Tanzania and Uganda, other investments are allowed subject to the Central Bank and the regulator's approval, respectively.



However, despite this increased flexibility, actual allocations remain well below regulatory ceilings. This reflects structural constraints beyond regulation, including limited pipelines of bankable projects, insufficient standardisation of investment vehicles, and gaps in institutional capacity – both on the investor side and among project sponsors.

Addressing these constraints requires targeted de-risking mechanisms that can bridge the gap between investor requirements and project realities. Guarantees, first-loss capital, and blended finance structures are particularly effective in this regard, as they reshape risk-return profiles and make infrastructure assets investable for domestic institutional investors.

Development finance institutions play a central catalytic role, not only by providing credit enhancement, but also by standardising transaction structures and anchoring market confidence. Nigeria's InfraCredit platform¹⁶ provides a concrete example: by offering local currency guarantees, it has enabled pension funds to participate in infrastructure bond issuances at scale, effectively creating a new asset class within the domestic market. Similar models are now being developed in Kenya (Dhamana Guarantee Company) and Ghana¹⁷, reflecting growing recognition that unlocking institutional capital requires not just regulatory change, but investable, de-risked instruments.

A critical next frontier for regulatory reform lies in the permissibility, and strategic design, of cross-border investment. While domestic capital pools are growing, they remain largely fragmented along national lines, limiting their ability to finance projects at scale. In many African markets, pension and insurance funds face tight restrictions – or outright prohibitions – on allocating capital beyond their domestic jurisdictions (Morocco, Ghana, Nigeria) or into alternative offshore assets. This effectively confines large pools of long-term savings to relatively shallow local markets, even where investable opportunities are limited.

Where outward investment is permitted, patterns diverge. Smaller economies with relatively large institutional asset bases often channel capital abroad in search of depth and returns (Botswana, Malawi) or within their immediate sub-region (Namibia, Eswatini or Lesotho within the Common Monetary Area shared with South Africa). This reflects both market size constraints and regional financial linkages.

East Africa offers a more structured model: cross-border investments are permitted within the East African Community (Kenya, Uganda), demonstrating the potential of regional investment frameworks to pool capital and expand opportunity sets – though still confined to a single regional economic community. By contrast, similar mechanisms remain largely lacking or underdeveloped in West and North Africa, where regulatory fragmentation continues to limit the mobilisation of capital across borders.

Enabling greater cross-border allocation would fundamentally change the scale and efficiency of capital deployment. It would allow domestic savings to be pooled across markets, diversify risk, and support the financing of large, regionally significant infrastructure projects – particularly in transport, energy, and digital networks, where economic returns are inherently cross-border. Importantly, it would also help address the mismatch between the geographic distribution of savings and investment opportunities across the continent.

In this sense, advancing a framework for regulated, well-governed cross-border investment is not simply a portfolio diversification measure – it is a required step toward building genuinely pan-African capital markets. Unlocking this channel would allow Africa's domestic capital pools to operate at a continental scale, aligning more effectively with the regionally integrated nature of its development needs.

¹⁶ Idem.

¹⁷ <https://www.ghanaweb.com/GhanaHomePage/business/Ghana-to-establish-infrastructure-credit-guarantee-scheme-2001538>

Box

1

What 5% and 10% of African Pension Assets Could Build

Allocating just 5% of pension assets (an estimated US\$31 billion) to infrastructure could already finance a substantial share of the continent's most transformative projects mentioned throughout this report, including:



1

Phase I of the Grand Inga Dam (11 GW)

In D.R. Congo – at an estimated cost of at least US\$12 billion – could potentially eliminate power deficits across Southern and Central Africa (see Section 3: Energy). The project would multiply the country's installed generation capacity by four and anchor new electricity transmission corridors towards the East and Southern African power pools, while enabling green industrialisation and metals processing at scale.



2

Angola power transmission interconnectors

Build transmission lines connecting Angola to the Copperbelt (D.R. Congo/Zambia) and Namibia (US\$2.9 billion). Angola currently has Africa's largest volume of stranded power generation capacity (2 GW) due to its lack of regional interconnection, despite large power deficits across the neighbouring Southern African Power Pool (SAPP).



3

Railway network expansion:

Deliver the Lobito Corridor rail link between Angola and Zambia (US\$4.5 billion). This would create the continent's first trans-Atlantic rail connection and anchor a new multi-user trade corridor in Southern Africa, strengthening minerals, fuel and food logistics.



4

Fertiliser production

Establish a 3 mtpa urea production hub (US\$2.5 billion) to end fertiliser import dependence and decrease vulnerability to global fertiliser prices.



5

Metals processing

Advance downstream processing of Guinea's bauxite into alumina (1.4 mtpa unit – US\$1.4 billion) and aluminium (1 mtpa plant – US\$4 billion); enable primary steel production from high-grade iron ore (3 mtpa steel plant – US\$3 billion).

At 10% allocation, the scale of transformation would deepen significantly.

Data centre capacity could expand by an additional 500 MW (US\$5.5 billion), the Lagos–Abidjan Highway could be financed to connect one of Africa's most densely populated economic corridors (US\$15.6 billion), large-scale hydropower such as the Mambilla project could be realised in West Africa (US\$5.8 billion), and refining capacity in East Africa could be expanded to reduce dependence on imported fuels (200,000 bpd – US\$6 billion).

4 Strengthening Africa's Intermediation Architecture

Scaling the deployment of Africa's domestic savings will require intermediating institutions capable of aggregating savings, structuring investments, and deploying capital at scale. The challenge is not only to mobilise resources, but to build institutions with the mandate, balance sheet, and technical capacity to intermediate between fragmented savings pools and long-term investment opportunities.

A new wave of public investment institutions reflects growing intent to mobilise and direct domestic savings more strategically. This is most visible in the expansion of sovereign wealth funds, with a clear shift toward development-oriented mandates. While stabilisation objectives historically dominated, over 60% of African sovereign wealth funds now have explicit domestic investment mandates. The recent establishment of new funds in Botswana, D.R. Congo, Kenya, and Zambia, alongside the operationalisation of resource-backed funds in Senegal and Mozambique, signals a broader shift toward using public savings as an active tool for infrastructure and industrial development.

Caisses des Dépôts et Consignations (deposits and consignments funds, common in Francophone Africa) offer a particularly relevant, and still underutilised, model for Africa. Originally developed in Europe as part of the institutional architecture that supported industrialisation, these institutions were designed to mobilise domestic savings at scale and channel them into strategic sectors. Their relevance in the African context lies in their dual function: aggregating fragmented and often idle savings, while acting as long-term investors in infrastructure and development projects.

The strength of the model lies in its funding structure. Caisses typically combine multiple sources of stable, long-term capital, including state equity, consignments (such as dormant funds and judicial deposits), regulated or mandatory deposits from institutional actors, retail savings products, and market-based financing. In Burkina Faso and Cameroon, the Caisses are also mandated to hold the country's sovereign gold stock. This provides both scale and predictability of funding, allowing the Caisses to take long-duration positions that are often beyond the reach of commercial banks or fragmented institutional investors.

Morocco's Caisse de Dépôt et de Gestion (CDG) provides a concrete African example of how the model can be operationalised (see box below). CDG has played a central role in structuring and financing major national infrastructure projects, including the development of Tanger Med port – now Africa's biggest – and associated industrial zones. Its role extends beyond financing to project incubation, governance, and coordination – effectively acting as both investor and system integrator within the domestic investment ecosystem. Similar equity positions have been taken by other Caisses across the continent, including CDC-Senegal's investment in Air Senegal and CDC-Gabon's participation in the Gabon Special Economic Zone.

A growing wave of sovereign wealth funds and public savings institutions reflects a clear shift: Africa is building the institutions to intermediate capital.

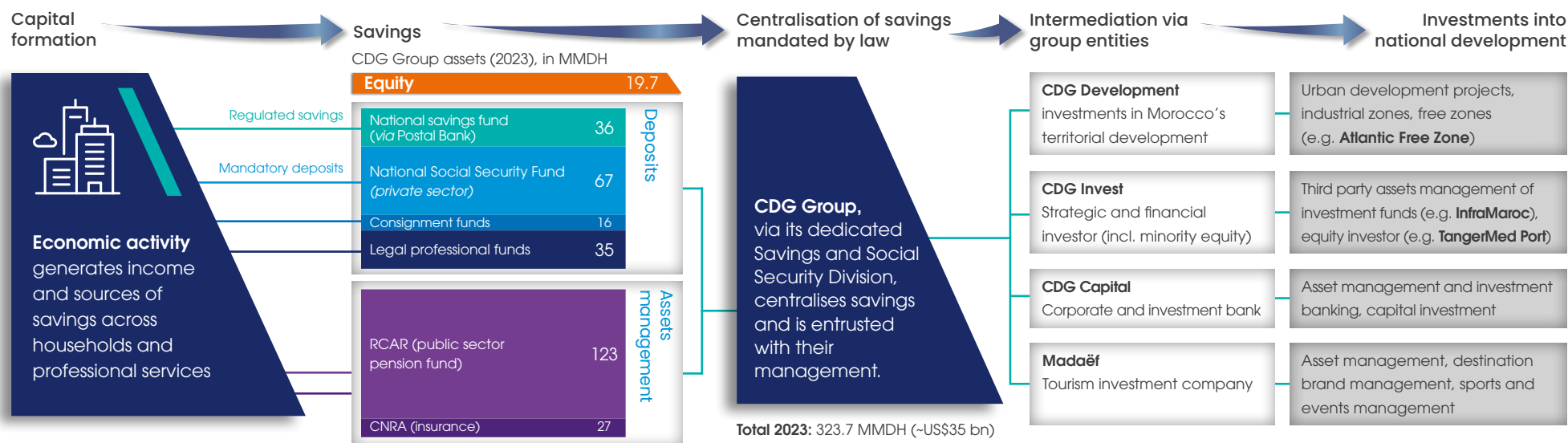
Box

2 How CDG Group has Built Morocco's Economic Sovereignty through Structured Intermediation

The experience of CDG Group in Morocco provides a compelling illustration of how the model of a Caisse de Dépôt et de Consignation can anchor domestic capital mobilisation and long-term investment on the continent. The institution was established with the central bank (Bank Al-Maghrib) in the aftermath of independence in 1959 to ensure that domestic savings could be mobilised and deployed in support of new national development priorities.

From its inception, CDG Group was entrusted with a dual mandate: to centralise and manage regulated savings, mandatory deposits and consignments, and to channel these resources into productive investment. This model has enabled Morocco to build a structured and reliable pipeline of domestic capital, aggregating flows from pension schemes, public deposits and other institutional savings into a single, professionally managed platform.

How CDG Group Transforms Savings Into Investments



Over time, CDG has evolved into a fully integrated intermediation ecosystem (see infographic). Beyond its core balance sheet, CDG has developed a network of specialised subsidiaries and investment platforms covering asset management, project development, engineering, and financial structuring. Through entities such as CDG Capital, CDG Invest and its dedicated funds, the Group intermediates capital into priority sectors aligned with Morocco's economic strategy – including urban development, industrial and free zones, logistics infrastructure, tourism, and strategic public assets. It has also played a catalytic role in originating and developing projects through dedicated platforms, while acting as one of the country's leading long-term equity investors.

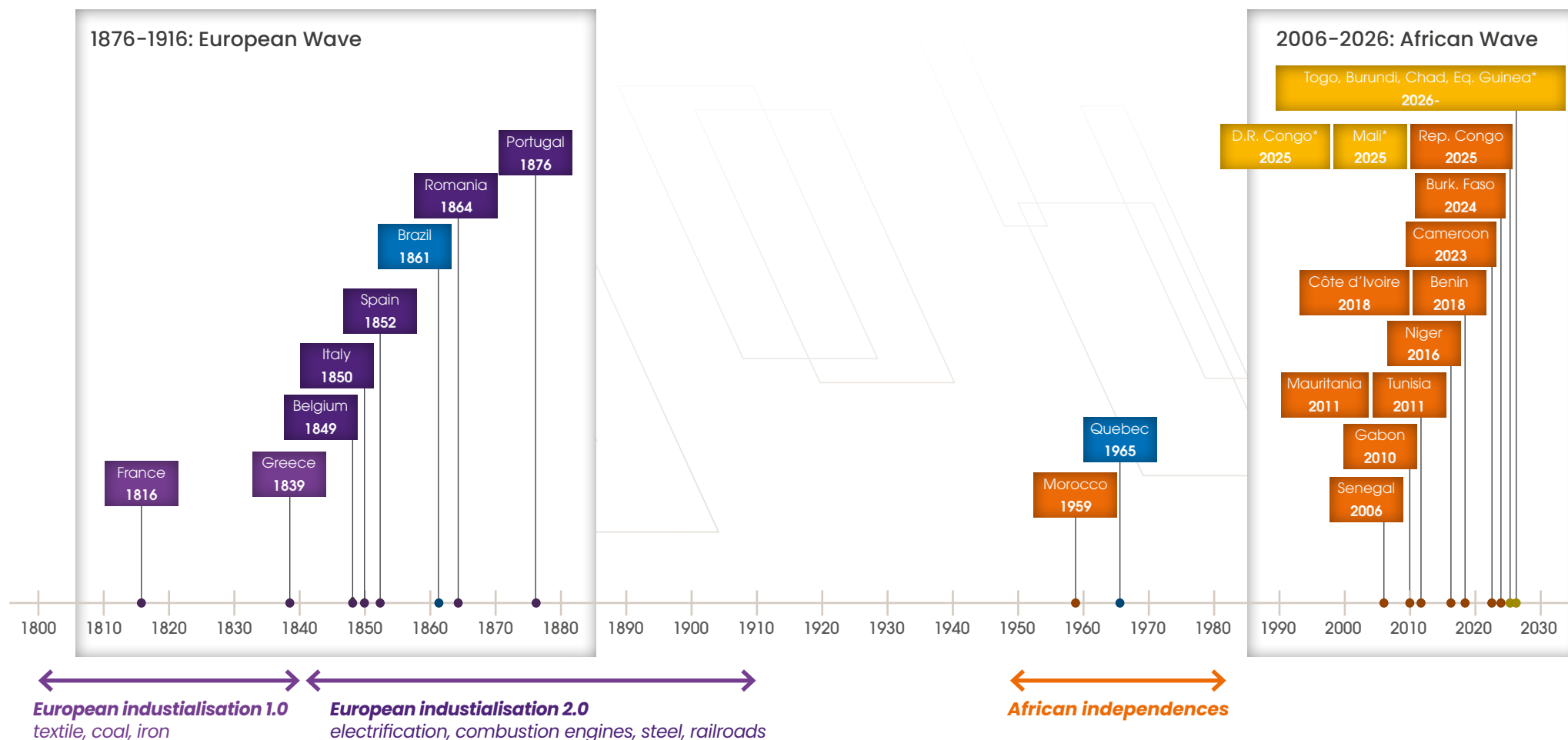
Importantly, CDG has demonstrated the ability to take early-stage risk in strategic infrastructure. Through its investment arm, FIPAR (CDG Invest), the Group held an early

30% stake in Tanger Med port, supporting what has since become one of Africa's most important logistics hubs. This capacity to incubate and scale transformative assets has been replicated across multiple projects, including industrial zones, new urban centres, major tourism developments, and the future Dakhla Atlantique deepwater port.

CDG's hybrid model combines centralised savings mobilisation with diversified investment and project development capabilities. This has made it a cornerstone of Morocco's investment landscape. It demonstrates how domestic capital, when effectively aggregated and intermediated through strong institutions, can be deployed at scale to support structural transformation, reduce reliance on external financing, and strengthen economic sovereignty.

Across Africa, more than a dozen Caisses have been established over the past two decades (Figure 8), with additional institutions under development. However, their effectiveness remains uneven. In many cases, they operate below potential, constrained by limited resource mobilisation, narrow mandates, or weak integration with broader financial systems.

Figure 8: African countries are establishing Caisses des Dépôts et Consignations in an effort to centralise savings and boost investment intermediation



* Announced or planned institutions

Source: Re-adapted and updated by AFC Research from "FERDI (December 2025). Le rôle des Caisses de dépôt dans la mobilization des ressources privées nationales pour le financement du développement".

A key challenge lies in the inherently conflictual nature of the Caisses' integration into domestic financial architectures. The establishment and scaling of these institutions often requires the reallocation of resources from existing actors – commercial banks, pension and insurance funds, microfinance institutions, and in some cases even regional central banks. This creates institutional friction, particularly where mandates overlap or where existing intermediaries perceive disintermediation risks.

The challenge is even more pronounced in monetary unions, where financial sector structures are shaped at regional level and require alignment across jurisdictions. Without such coordination, attempts to establish national Caisses can face structural constraints or fragmentation, as illustrated by the experience of the Caisse in Cameroon¹⁸. Unlocking the Caisses' full potential will therefore require not only clearer mandates and stronger governance frameworks, but also deliberate system-wide integration to align incentives across financial actors and ensure coherence with national infrastructure strategies and regional financial frameworks.

Commercial banks remain central to financial intermediation, but their role in financing long-term investment remains constrained. Africa's banking systems are characterised by relatively low deposit-to-GDP ratios – around 39% compared to a global average of approximately 60%¹⁹ – and some of the highest interest rate spreads globally. This reflects a combination of perceived credit risk, limited availability of bankable projects, and structural inefficiencies in credit markets. As a result, banks tend to favour short-term lending and sovereign exposure over long-duration project financing.

Unlocking bank participation in infrastructure and industrial financing will require targeted interventions to improve risk-return dynamics. This includes the use of guarantee schemes, concessional credit lines, and blended finance structures to reduce credit risk and extend tenors, as well as co-investment frameworks that allow banks to participate alongside development finance institutions and public investment vehicles. International experience, particularly in parts of Asia, demonstrates that banks can play a leading role in financing infrastructure when supported by appropriate incentives and risk mitigation frameworks.



¹⁸ See for instance <https://www.financialafrik.com/2025/12/21/bras-de-fer-cobac-cdec-la-stabilite-financiere-a-lepreuve-de-lambiguite-juridique/>

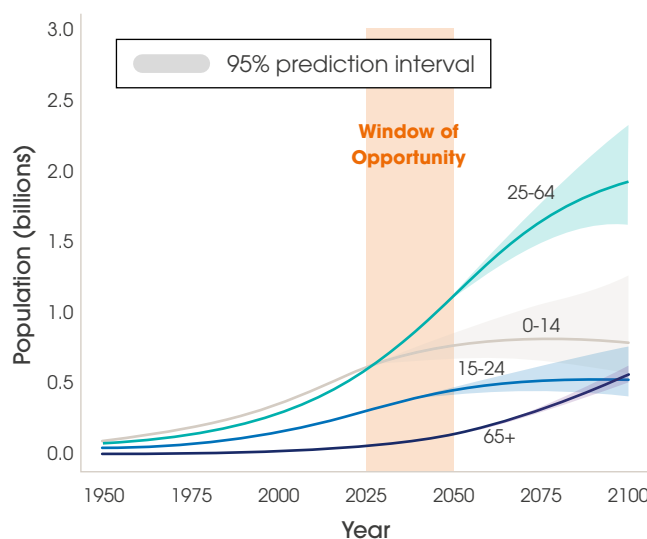
¹⁹ FERDI (December 2025). *Le rôle des Caisses de dépôt dans la mobilisation des ressources privées nationales pour le financement du développement.*

5 Expanding the Capital Base

Sustaining growth in domestic capital will require not only improved intermediation, but a deliberate effort to mobilise and formalise savings at scale. While institutional pools have expanded significantly, they still reflect only a portion of the continent's underlying savings potential.

Figure 9: Africa's demographic trajectory provides a strong but time-bound foundation for building domestic savings

Population by broad age groups



Source: United Nations, DESA, Population Division. Licensed under Creative Commons licence CC BY 3.0 IGO. United Nations, DESA, Population Division. World Population Prospects 2024. <http://population.un.org/wpp>

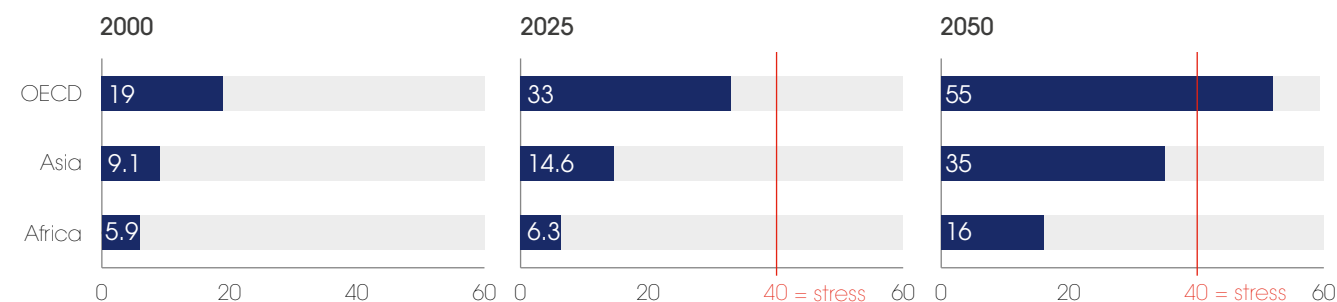
Africa's demographic trajectory provides a strong but time-bound foundation for building domestic savings. The continent is only now entering a period of rapid expansion in its working-age population (Figure 9), which is expected to account for over 40% of global growth in the labour force through to 2050. At the same time, the share of the population aged 65 and above will remain relatively low and is not expected to rise until after mid-century. This creates a unique window in which the ratio of earners to dependants is highly favourable, offering strong potential for income generation and savings accumulation.

This dynamic underpins what is commonly referred to as the demographic dividend: a phase in which a rising share of working-age individuals supports economic growth by increasing labour supply, productivity, and the capacity to save. Across many emerging economies, this demographic structure has played a critical role in sustaining long-term growth and supporting the development of pension systems and capital markets. Africa is now entering this phase and must capitalise on it.

However, this dividend is not automatic. The key challenge is in converting rising incomes into formal, intermediated savings that can be aggregated and deployed productively. Crucially, this must occur before demographic pressures begin to shift. Once the elderly population starts to grow more rapidly – beyond 2050 – the opportunity to build robust, pre-funded pension systems will narrow and fiscal pressures will increase (Figure 10). The implication is clear: Africa's demographic window is open, but it is finite. The time to establish savings systems, deepen intermediation, and build long-term capital pools is now.

Figure 10: Dependency pressures are rising in the OECD and Asia, while Africa retains demographic headroom until after 2050

Old age to working age ratio, in %

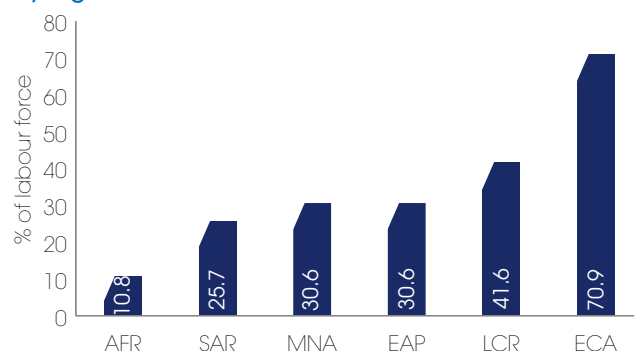


Source: World Bank

To capitalise on this demographic dividend, Africa must accelerate the formalisation of its economies and expand participation in contributory systems. Formal employment remains the primary channel through which workers are integrated into pension schemes, linking income generation to long-term savings.²⁰ This is evident in regions such as Europe and Central Asia, where high levels of formal employment have enabled contributory coverage to reach an average of 70.9% of the labour force (Figure 11).

By contrast, coverage remains significantly lower across Africa – around 30% in North Africa and just 10.8% in sub-Saharan Africa – reflecting the dominance of informal employment. In many countries, pension systems are largely confined to public sector workers and a narrow segment of formal private employment, leaving the majority of the labour force, particularly informal and self-employed workers, outside the system and without access to long-term savings mechanisms.

Figure 11: Contributory coverage is higher in countries with higher formal employment
Coverage: contributors as a percentage of labour force by region



Source: United Nations, DESA, Population Division. Licence CC BY 3.0 IGO. United Nations, DESA, Population Division. World Population Prospects 2024. <http://population.un.org/wapp>

Digital finance is helping reshape this landscape and offer payment and saving opportunities even to informal workers. In many African economies, mobile money has become the dominant channel for formal savings, with a growing share of balances held not just for transactions, but as stores of value. Countries such as Kenya, Ghana, and Tanzania have seen steady increases in mobile-based savings balances, reflecting a behavioural shift toward formal financial usage.²¹ However, these systems remain largely disconnected from the broader financial architecture. Mobile wallets are still primarily designed for payments, with limited integration into pension systems, insurance products, or long-term investment vehicles.

The next phase of financial deepening will depend on building products and institutional linkages that convert digital access into structured savings. This includes interest-bearing mobile savings accounts, micro-pension products, and insurance-linked savings instruments that can capture small but regular contributions and aggregate them at scale. Kenya's M-PESA ecosystem, through partnerships with banks such as Kenya Bank Limited (KCB), provides an early example of how digital platforms can be linked to formal financial intermediation, offering savings products with meaningful returns (7.5% in 2026²²). Scaling such models across markets and connecting them to institutions capable of deploying capital, such as pension funds, insurers, or Caisses, will be critical.

At the system level, this will require investment in digital public infrastructure. The lack of universal and interoperable digital identity remains a binding constraint on account ownership, particularly in lower-income and rural populations.²³ Strengthening digital ID systems, interoperable payment rails, and data-sharing frameworks will not only expand financial inclusion but also improve the efficiency of savings mobilisation and its integration into the formal financial system.

Formalisation as a Source of Capital Formation

Expanding capital pools will also require addressing a more fundamental constraint: the large share of economic activity that remains informal and therefore outside the financial system. Financial inclusion alone does not generate savings; underlying income streams must also be formalised, recorded, and intermediated.

Across Africa, lack of income is consistently cited as a primary barrier to both bank account ownership and mobile money usage. This reflects a structural reality: a significant portion of economic activity operates via informal, cash-based systems that do not generate financial records, tax contributions, or savings flows that can be captured by formal institutions. As a result, a large share of the continent's economic output remains disconnected from its financial system – and from its capital formation process.

Targeted formalisation strategies can therefore serve as a direct mechanism for expanding domestic capital pools.

Artisanal and small-scale mining (ASM), particularly in gold, provides one of the most immediate and scalable opportunities. The sector generates substantial income across multiple African economies but largely operates outside formal channels, limiting its contribution to foreign exchange accumulation, fiscal revenues, and financial intermediation.

Ghana's recent experience illustrates how formalisation can be leveraged as a macroeconomic tool at scale. By centralising gold purchases through official channels and progressively integrating ASM into the formal system, Ghana has significantly increased foreign exchange accumulation, strengthened reserve buffers, and supported currency stability (Figure 11). This reflects a broader shift toward treating natural resources not only as export commodities, but as instruments of macroeconomic management and capital formation.

²⁰ Hartley, Gonzalo Reyes; Abels, Miglena. 2025. Riding the Demographic Wave Pensions and Retirement Income in an Aging World: The State of Social Protection Report 2025 Background Paper #5. Social Protection Discussion Paper, No. 2512, March 2025. © World Bank. <http://hdl.handle.net/10986/43042> Licence: CC BY-NC 3.0 IGO.

²¹ Melecky, Martin and Singer, Dorothe (February 2026). Formalizing Savings, Policy Research Working Paper 11322, World Bank. <https://openknowledge.worldbank.org/server/api/core/bitstreams/dba43837-a38f-4b87-853f-f79e1d728adc/content>

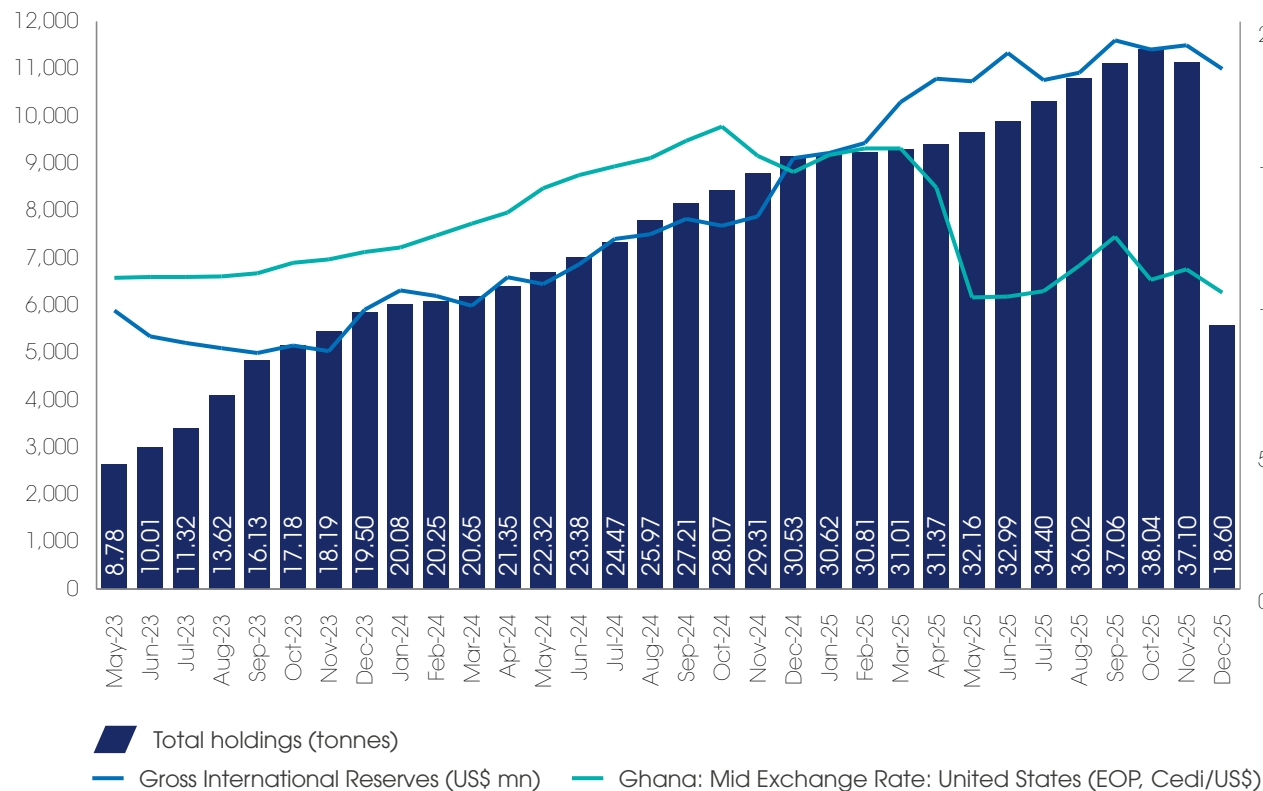
²² <https://ke.kcbgroup.com/for-you/open-account/mobile-online/kcb-m-pesa>

²³ The Global Findex Database 2025.

At the centre of this approach is the role of the Bank of Ghana (BoG) as a domestic intermediary. Launched in 2021, the Domestic Gold Purchase Program (DGPP) enabled the BoG to purchase gold from domestic producers in local currency, effectively converting domestic output into reserve assets. The programme was significantly scaled up in 2024. It enabled the BoG to consistently outperform its international reserve targets (Figure 12) and reach its programmed reserve coverage ahead of schedule,²⁴ while also injecting liquidity into the domestic financial system.

A critical component of this strategy was the establishment of the Ghana Gold Board (GoldBod) in 2025 to strengthen the institutional framework. GoldBod was mandated to oversee and centralise the purchase and export of ASM gold, effectively creating a formal pipeline through which previously informal production can be captured, monetised, and integrated into the national balance sheet. While the BoG continues to purchase gold from large-scale miners, particularly for reserve accumulation, ASM flows are now increasingly channelled through this structured framework.

Figure 12: Rising gold holdings have significantly helped expand Ghana's reserve buffers
Ghana's gold holdings, in tonnes (right) and gross international reserves, in US\$ million (left)



Source(s): Bank of Ghana, Haver Analytics.

Similar approaches are now emerging across several African gold-producing economies, particularly where large ASM sectors coexist with relatively limited formal reserve capture. This is especially relevant for countries such as Burkina Faso, Mali, Zimbabwe, D.R. Congo, and Cameroon,²⁵ where significant volumes of gold production have historically remained outside official channels. Across these markets, governments are increasingly seeking to formalise production, improve traceability, and centralise gold purchases and exports to strengthen foreign exchange accumulation and domestic resource mobilisation.

The broader implication is clear: expanding Africa's capital base will depend not only on financial sector reforms, but on policies that bring income-generating activity into the formal economy. Formalisation, in this context, is not simply a governance objective – it is a core component of capital formation.

²⁴ <https://www.imf.org/-/media/files/publications/cr/2025/english/1ghaea2025001-source-pdf.pdf>

²⁵ This shift is already visible in several concrete initiatives. D.R. Congo is scaling efforts to formalise ASM supply chains and opened its first domestic refinery in 2026. Uganda is expected to initiate a central bank gold purchasing programme in 2026, while Burkina Faso has mandated its newly established Caisse to manage its gold holdings, a policy replicated by Cameroon in 2026. In Mali, groundwork for a national gold refinery began in 2025.

Conclusion: From Mobilisation to Deployment

Africa's domestic capital base is substantial, growing, and increasingly diversified. The core question is no longer one of availability, but of allocation – how to move from pools of savings to sustained investment in the real economy.

The strategic priorities are now clear:

- **Deploy** existing savings into infrastructure and productive sectors at scale, creating investable pipelines that can absorb long-term capital.
- **Strengthen** intermediation mechanisms and institutions, ensuring that savings are efficiently channelled through credible vehicles, risk-sharing frameworks, and market infrastructure.
- **Expand** the capital base by mobilising new savings and formalising economic activity, broadening the foundation for long-term investment.

Delivering on this agenda will require coordinated action across policy, regulation, and institutions. It will also require a shift in approach – recognising that the crucial task is not mobilising capital but building systems capable of deploying capital efficiently and consistently.

In a context of declining and volatile external financing, Africa's development trajectory cannot be contingent on external cycles. The question is no longer whether the continent can finance its own development, but how effectively and quickly it can build the systems required to do so, thereby anchoring its growth model on its own resources.



Transport and Logistics

From Corridors to Integrated Economic Systems

- Corridors can anchor industrialisation and regional value chains. When aligned with energy systems, industrial zones and trade flows, corridors become platforms for production – enabling the movement of intermediate and finished goods across borders. This requires moving beyond discrete infrastructure projects to integrated economic systems, where ports, rail, roads, logistics and trade facilitation are designed and operated as a single ecosystem in support of Africa's industrialisation.
- Africa's transport map reveals a continental system taking shape. The AFC Transport & Logistics Corridors Map shows that a core network of ports, railways and road corridors already spans the continent, linking production zones to regional and global markets. The opportunity is therefore not to build from first principles, but to upgrade performance – converting existing networks into integrated, high-efficiency systems that can support production at scale and regional trade.
- Existing infrastructure along routes such as Abidjan–Lagos, Dakar–Bamako, and the North–South Corridor provides a foundation for scale, but unlocking value is primarily an execution challenge. This requires operationalising one-stop border posts (OSBPs), improving corridor infrastructure and weighbridge efficiency, and institutionalising corridors through functioning authorities that align public and private stakeholders.
- Corridor bankability must be anchored in industrial demand, not transit volumes alone. Positioned as standalone transport assets, many projects struggle to achieve scale and predictable revenues. Embedded within industrial ecosystems – linking mines, processing zones, manufacturing clusters, and ports – corridors benefit from captive demand, higher utilisation, and stronger revenue visibility, materially improving their investment profile and ability to crowd in private capital.
- Aviation provides the fastest layer of integration and should be treated as a core pillar of AfCFTA implementation. Strengthening air connectivity – particularly through cargo infrastructure and full implementation of the Single African Air Transport Market (SAATM) – can accelerate the movement of time-sensitive goods, reduce logistics costs, and more rapidly connect fragmented markets.
- Storage and logistics must be embedded into corridor planning to build resilience. Recent shocks have shown that without storage, buffers and efficient distribution systems, gains in transport efficiency do not translate into lower costs or greater stability. This gap remains acute: no African country meets the IEA's 90-day emergency oil stock requirement, while food storage capacity across the continent covers less than 30% of annual production. Expanding storage capacity, building strategic reserves, and integrating rail and pipeline infrastructure into supply chains are therefore critical to reducing vulnerability in both food and fuel systems.

i Building Trade Corridors as the Backbone of Intra-African Trade and Resilience

Recent crises have made Africa's logistics constraints impossible to ignore.

Disruptions to global fuel and food supply chains have placed acute pressure on domestic systems, exposing how quickly external shocks transmit into inflation, shortages, and fiscal strain. These episodes highlight a simple but critical reality: Africa's ability to absorb shocks depends not only on production capacity but on how efficiently goods can be moved, stored, and distributed across the continent.

This sits at the core of Africa's growth model under the African Continental Free Trade Area (AfCFTA). The agreement creates the conditions for production, demand, and markets to be organised within the continent – across countries, sectors, and value chains. But this opportunity is fundamentally a logistics challenge. Without the ability to move goods reliably, at scale, and at competitive cost, the gains from trade, industrialisation, and regional integration will remain constrained.

In this context, transport and logistics systems are not just enablers of mobility – they are the backbone of economic transformation. They determine whether trade flows materialise, whether value chains can develop, and whether growth can be sustained across the continent.

From Infrastructure to Systems: Corridors as Supply Chains

This is a reminder that corridors must be operationalised – not just built. Yet across much of the continent, fragmented planning, weak institutional coordination, and persistent bottlenecks continue to undermine throughput. Corridor governance and trade facilitation, therefore, emerge as critical infrastructure in their own right. Where effective frameworks exist – particularly in East and Southern Africa – they demonstrate the value of coordinated planning, private sector participation, and performance monitoring.

At the same time, progress across individual transport assets continues. Africa's transport and logistics sector is recording tangible gains, with sustained investment in ports, railways, and road networks, building on momentum highlighted in previous editions of this report. However, infrastructure build-out alone is not translating into efficient trade. The central challenge remains how these systems are connected, governed, and utilised to move goods reliably across borders.

This gap becomes clear when Africa's logistics network is viewed as a system. Released alongside this report, AFC's African Transport Corridors Map provides an integrated perspective, bringing together rail, ports, roads, dry ports, and key trade facilitation nodes. It highlights persistent bottlenecks along major routes – from Abidjan–Lagos to Dakar–Bamako and the North–South Corridor – where gaps in connectivity, rehabilitation, and border efficiency continue to constrain trade flows.

Aviation: The Fastest Lever to Operationalise Trade Corridors

Within this context, aviation stands out as the most immediate lever for improving connectivity. Unlike ground infrastructure, which requires long development timelines and complex coordination, air transport can rapidly connect fragmented markets and support the movement of high-value and time-sensitive goods. Full implementation of the Single African Air Transport Market would unlock 15.9 million additional passenger trips, generate US\$1.46 billion in annual fare savings, and create over 96,000 direct jobs – demonstrating the scale of opportunity from liberalisation.¹

Where aviation ecosystems have been deliberately developed, the results are clear. Kenya and Rwanda, alongside Ethiopia, show how combining liberalisation, visa openness, infrastructure investment, and effective national carriers can drive trade, tourism, and investment, contributing US\$5.5 billion to GDP and supporting around one million jobs in East Africa.

¹ See *Continental Study on the Benefits of the Single African Air Transport Market (SAATM)* prepared for the African Union Commission (AUC) by IATA Consulting at https://www.afcac.org/wp-content/uploads/bsk-pdf-manager/2023/09/Continental_Study.pdf

1 Africa's Transport Infrastructure Is Advancing on the Ground, but Air Connectivity Holds the Key to Faster Integration

1.1. African Ports Have Continued Their Expansion, Driven by a Combination of Domestic and Regional Consumption Growth

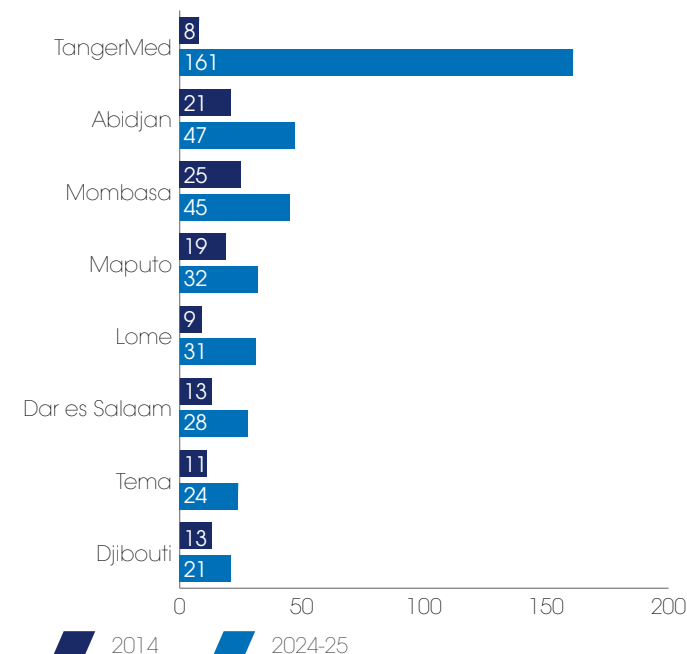
Ports remain the most advanced segment of Africa's transport infrastructure, with a new wave of private investment sustaining capacity expansion. The third wave of port privatisation highlighted in previous editions has continued, characterised by diversification of investment partners, deeper private sector participation, and a growing focus on addressing inland logistics constraints.

New concession agreements signed in 2025 reinforce this momentum. Key transactions were concluded at ports in South Africa, Senegal, Cameroon, Côte d'Ivoire, and Egypt, involving a mix of global operators such as ICTSI², Conti-Lines³ and AD Ports,⁴ alongside emerging local players, including Lagune Exploration and Alexandria Supply Chain Company. This reflects a maturing investment landscape where both international and domestic capital are increasingly active.

Traffic growth across Africa's largest ports confirms strong underlying demand and sustained momentum from previous years. Ports consistently tracked in earlier editions continue to scale new heights, with Tanger Med exceeding 160 million tonnes last year, followed by Abidjan, and Mombasa surpassing 45 million tonnes. Lomé and Maputo have consolidated volumes above 30 million tonnes, with Dar es Salaam approaching that threshold, while Tema and Djibouti have now crossed the 20 million tonne mark (Figure 13). This continued growth reflects both rising domestic consumption in fast-growing economies such as Côte d'Ivoire and Kenya, and increasing transit and transshipment activity across regional hubs.

Regional dynamics, particularly in East and Southeast Africa, are increasingly shaping port performance. Ports such as Mombasa and Dar es Salaam are consolidating their roles as regional gateways, serving expanding hinterlands across the East African Community (EAC) and beyond. At the same time, disruptions in the Red Sea since 2023 have redirected shipping routes, contributing to incremental traffic growth at ports, including Djibouti, Mombasa, and Dar es Salaam.⁵

Figure 13: Africa's major ports have recorded sustained volume growth over the past decade
Port throughput, in million tonnes (2014 vs 2024-2025)



Note: 2024-2025 based on the latest year available at the time of publication

Source: AFC Research

² <https://www.transnet.net/getFile.ashx?id=6347>

³ <https://en.flows.be/shipping/2025/12/antwerp-based-conti-lines-and-poabi-sign-concession-for-dakar-terminal/>

⁴ <https://africaportsdevelopment.com/douala-port/>

⁵ The Red Sea crisis and its impact on African ports were analysed in detail in Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.

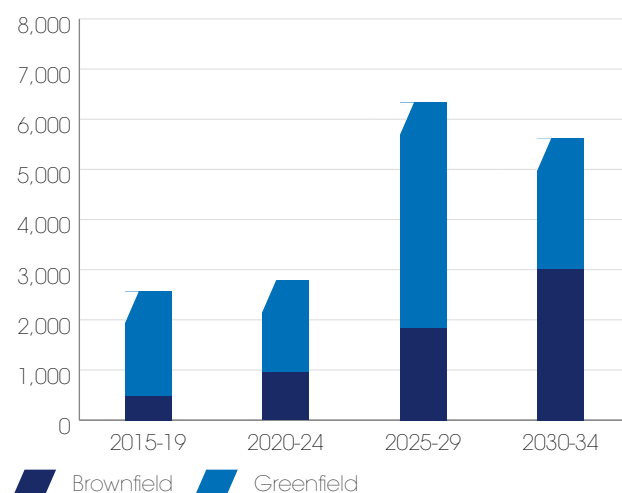
1.2. Railway Activity Confirms Strengthening Investment Momentum Across Africa

Rail development is entering the new expansion cycle identified in last year's **State of Africa's Infrastructure Report**, with greenfield projects now taking the lead over rehabilitation programmes. While brownfield upgrades remain necessary across ageing networks, the current pipeline reflects a shift toward new capacity additions. An estimated 7,000 km of railway lines are now at various stages of construction and development, more than doubling greenfield expansion compared to the 2015-2024 period (Figure 14).

This is reflected once again in projects launched in 2025, including the Kenitra-Marrakech high-speed extension in Morocco, the Uvinza-Musongati line linking Tanzania to Burundi's mineral belt, and the launch of construction for the Naivasha-Kisumu extension in Kenya.

Figure 14: Africa is entering a new cycle of railway expansion

Projected railway extensions by status, in km



Source: AFC Research

This renewed momentum reflects three key trends identified in previous editions:

- Public investment and commodity demand are driving a new pipeline of projects. Governments, often supported by DFIs and multi-lateral partners, are advancing national and cross-border rail development (Tanzania, Burundi, Morocco, Egypt), while mining and industrial demand continues to anchor new corridors (Guinea, Algeria).
- Private sector participation is expanding beyond traditional pit-to-port models. While commodity corridors remain central, new financing and operating models are emerging, including concessions, and track-access or tolling frameworks in countries such as Egypt and South Africa, signalling a gradual opening of rail infrastructure to private operators.
- Railways are increasingly being repositioned as multi-user, open-access systems. Infrastructure planning in countries such as Guinea and Liberia reflects a shift away from single-user extractive lines toward corridors designed to support broader economic activity, including agriculture, trade, and industrial development.

1.3. Aviation Is the Fastest Way to Operationalise Intra-African Trade Corridors

Amidst ground fragmentation, aviation emerges as the most immediate and scalable lever for integration. Africa's scale and geographic fragmentation make aviation the most practical way to connect people, goods, and economies across the continent. Unlike roads or rail, air transport can bridge distance immediately and connect markets, firms, and consumers – particularly for high-value, time-sensitive sectors such as horticulture, fresh produce, pharmaceuticals, electronics, and e-commerce.

Yet the sector remains severely underdeveloped, and the gap between population and traffic is stark. Despite representing nearly one-fifth of the global population, Africa's airlines accounted for just 2.2% of global passenger traffic and 2% of air cargo in 2024. Cargo flows are also highly concentrated around a small number of hubs – Addis Ababa, Nairobi, Johannesburg, Lagos, Casablanca, and Cairo – leaving many countries weakly connected and facing elevated logistics costs.

The Single African Air Transport Market is meant to address this; however, the project still needs to be implemented.

More than two decades after the original liberalisation commitments, no country is fully compliant with the 1999 Yamoussoukro Decision.⁶ This is a missed opportunity. In 2021, a continental study commissioned by the African Civil Aviation Commission (AFCAC) found that full implementation would unlock 15.9 million additional trips, generate US\$1.46 billion in fare savings, and support over 96,000 jobs each year.⁷

The impact would extend beyond aviation itself. Better air connectivity would support tourism through multi-destination travel, improve cargo flows and supply chains under the AfCFTA, and make African markets more accessible to investors.

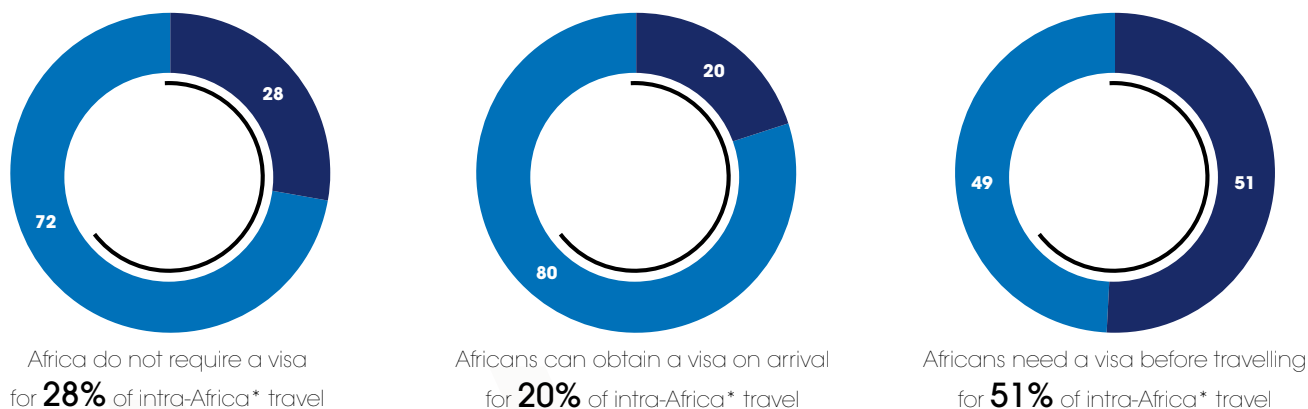
⁶ https://www.afcac.org/history_saاتم/

⁷ See full study at https://www.afcac.org/wp-content/uploads/bsk-pdf-manager/2023/09/Continental_Study.pdf

Two sets of constraints explain the lack of progress – policy and infrastructure – and together they shape the economics of African aviation.

1. On the policy front, low prioritisation and protectionism continue to limit connectivity. Aviation is rarely treated as core economic infrastructure, while governments shield national carriers from competition. Twenty-eight African countries retain ownership stakes in airlines – many of which are financially distressed – and restrict market access through bilateral agreements to protect them.⁸ At the same time, limited visa openness – more than half of the African population requires a visa to travel to another African country – further suppresses demand, while high taxes and charges, including airport fees, fuel levies, and government surcharges, push up ticket prices.
2. On the infrastructure front, capacity gaps – particularly in cargo – constrain the sector's ability to support trade. A recent AFCAC gap analysis shows that 35% of international airports operate with inadequate pavement strength, while 18% lack sufficient passenger or cargo terminal capacity. More critically, cargo infrastructure remains underdeveloped: cold-chain facilities, storage, and handling systems are limited despite their importance to competitive sectors such as perishables, pharmaceuticals, and horticulture.

Figure 15: Less than 30% of intra-African travel scenarios are visa-free
Visa openness in Africa in 2025



* Intra-Africa travel refers to travel by African citizens between African countries.
 Source: Visa Openness Index. <https://www.visaopenness.org/>

Strengthening air connectivity – particularly through cargo infrastructure and the implementation of SAATM – can accelerate the movement of time sensitive goods and integrate markets more rapidly.

⁸ Idem.

The result is a distorted cost structure that undermines intra-African trade. It is often cheaper to ship goods by air from Johannesburg to London than between African cities such as Lagos and Abidjan, one of the continent's priority trade corridors. Limited freighter capacity and weak route density frequently force cargo to transit through Europe before returning to Africa.

Constraints such as smaller fleets, higher capital costs and lower route density also directly affect airlines' capacity to access operating leases from global lessors, undermining sector competitiveness and growth. On most routes, freight relies on belly capacity, which is constrained

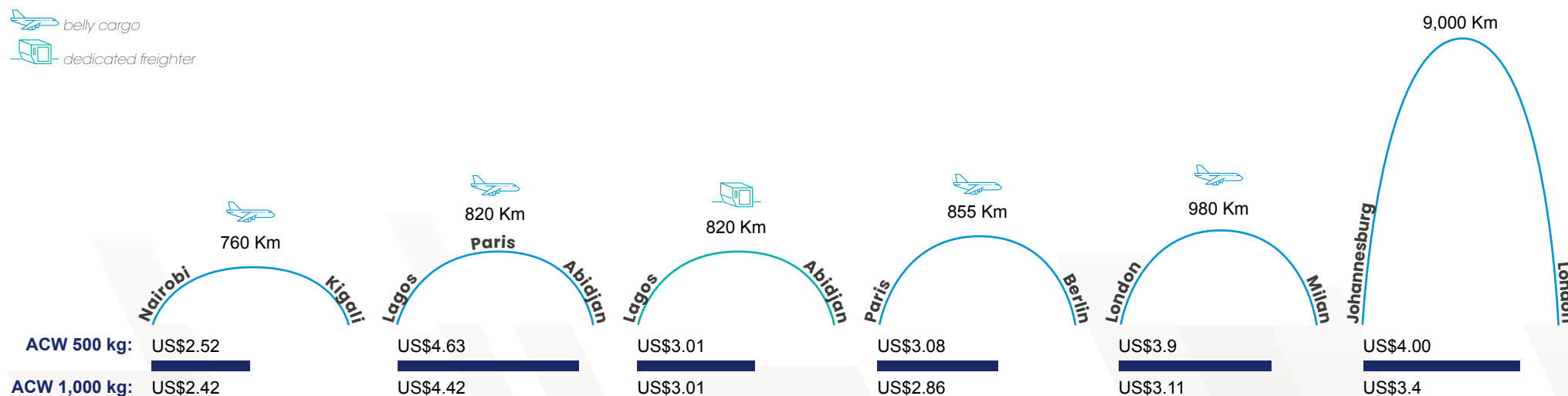
by passenger demand and limits both volumes and frequency. Only more integrated markets – particularly in East Africa – show different outcomes, with routes such as Nairobi-Kigali among the most competitive, even compared to intra-European benchmarks (Infographic 1).

The missed opportunity for trade integration is even clearer considering that Africa's aviation industry largely serves international demand while Africans remain poorly connected within their own continent. Passenger volumes are estimated to have exceeded pre-pandemic levels in 2025, reaching around 113 million (AFRAA).⁹

However, this recovery is skewed toward international routes, with intra-African connectivity still lagging, highlighting a disconnect between rising demand and stagnant policy and market integration. At a time when the AfCFTA is increasing the need for faster, more reliable movement of people and goods, aviation remains fragmented and underdeveloped, leaving one of the most immediate levers for advancing the African single market largely untapped.

Infographic 1: Air cargo costs reveal sharply diverging levels of air transport integration

Cost of air cargo across intra-regional routes, in US\$ per kg of actual chargeable weight (ACW)



Note: Cost estimates gathered by AGS Global Solutions as of March 2026. Only cheapest options are displayed here including Ethiopian Airlines (Nairobi-Kigali), Air France and DHL (Lagos-Abidjan), Air France (Paris-Berlin), British Airways (London-Milan; Johannesburg-London). Belly cargo comes with severe size constraints with heights typically limited to 150cm.

⁹ <https://www.afraa.org/african-airlines-performance-updates-june-2025/>

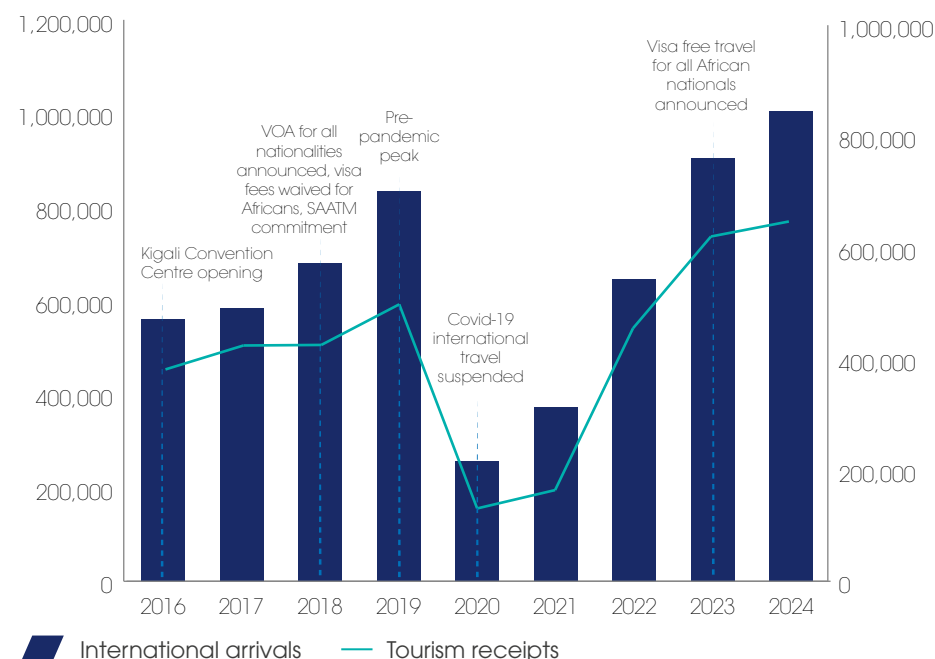
Box

3 Three Charts to Understand Aviation's Positive Impact on Economic Development in Africa

Where aviation ecosystems are developed, the gains are substantial. Rwanda, Kenya, and Ethiopia illustrate what is achievable when aviation is embedded within a broader economic strategy, combining liberalisation, visa openness, infrastructure investment and effective national carriers to drive tourism, trade, and connectivity. These three models demonstrate the scale of impact, with aviation contributing a combined US\$5.5 billion to GDP across these countries and supporting around one million jobs.

Rwanda has built one of Africa's fastest-growing aviation markets by aligning visa openness, infrastructure investment (including the Kigali Convention Centre) and carrier development (Figure 16).

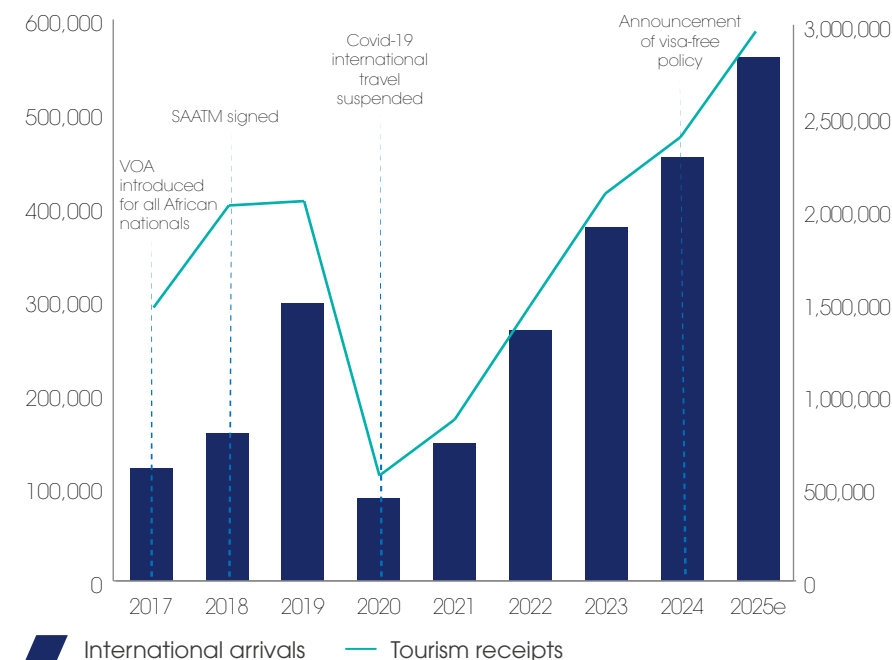
Figure 16: Rwanda's tourism receipts grow following gradual visa openness
Inbound tourism receipts, in US\$ mn (left) vs. total arrivals (right)



Source: Rwandan Development Board, National Institute of Statistics of Rwanda (NISR)

Following visa-on-arrival reforms in Kenya in 2017 and broader aviation liberalisation, international arrivals doubled from 1.4 million to nearly 3 million by 2024 (Figure 17). Tourism receipts more than tripled from US\$1.16 billion to US\$3.73 billion,¹⁰ while tourism's contribution to GDP doubled from 1.4% to 3.1%¹¹. This demonstrates the scale of returns when policy and connectivity are aligned.

Figure 17: Kenya's tourism sector experienced significant growth in arrivals and revenues following the 2017 Visa-on-Arrival Policy
Inbound tourism receipts, in '000 KSh (left) vs. total arrivals (right)



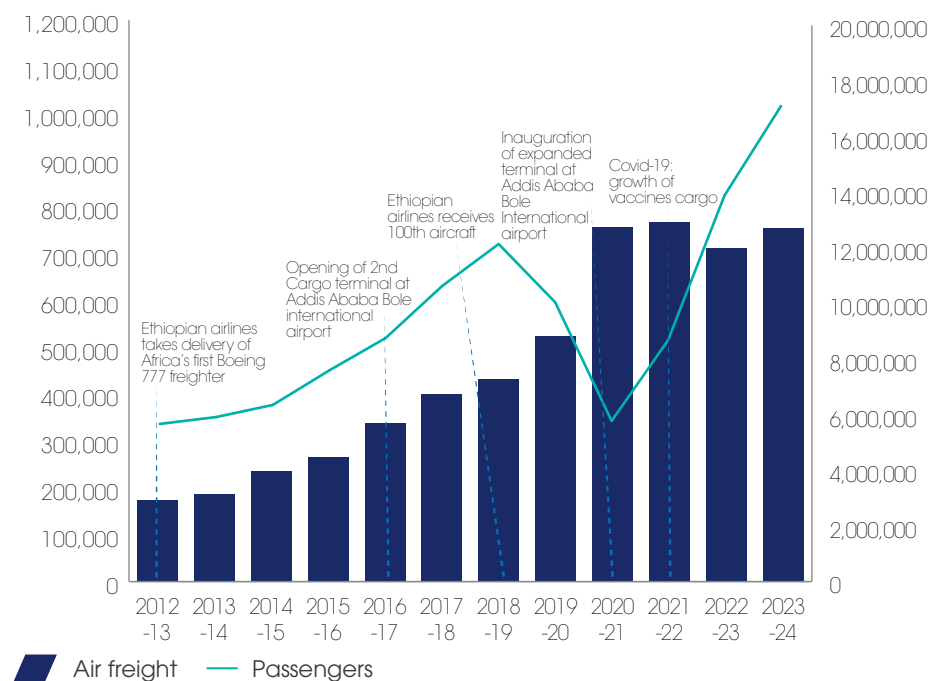
Source: Tourism Research Institute, Kenya

¹⁰ Converted from KSh119.9 billion and KSh452.2 billion of inbound tourism receipts for 2017 and 2024, respectively. Data sourced from Tourism Sector Performance Report. <https://tri.go.ke/>

¹¹ <https://www.iata.org/en/iata-repository/publications/economic-reports/the-value-of-air-transport-to-kenya/>

Ethiopian Airlines – Africa’s most profitable carrier – now serves over 140 destinations, carries around 19 million passengers annually and anchors the continent’s largest air cargo hub with over 750,000 tonnes transported annually (Figure 18). In 2023, aviation contributed approximately US\$2 billion (2% of GDP) and supported 527,400 jobs.¹² The country is now planning a US\$12.5 billion mega airport at Bishoftu, capable of handling 110 million passengers per year.

Figure 18: Ethiopian Airlines has built Africa’s largest air cargo hub in Addis Ababa
Ethiopian Airlines’ total air freight handled, in tonnes (left) vs. total passengers traffic (right)



Source: Ethiopian Airlines, AFC Research

¹² <https://www.iata.org/en/iata-repository/publications/economic-reports/the-value-of-air-transport-to-ethiopia/>



2 Trade Corridors Only Deliver Value When Designed and Operated as Integrated Ecosystems

Previous editions of this report have consistently called for the development of trade corridors as the backbone of Africa's economic integration. This year, to take this analysis further, we examine what determines whether and how corridors actually deliver economic value. To do so, we reviewed recent evidence from the World Bank and other global studies¹³ to understand how corridors have been operationalised in practice and what lessons can be drawn for Africa.

2.1. Trade Facilitation Infrastructure Is as Critical as Transport Infrastructure

The evidence from recent studies on Asian, African, and global corridors shows that transport corridors can generate wide economic benefits – but only when they function as systems, not standalone assets. Transport investments consistently deliver impacts beyond direct outcomes such as travel-time savings and lower transport costs. These benefits materialise through intermediate channels – particularly increased trade, higher productivity, and shifts in population and land values – highlighting how connectivity reshapes economic activity rather than simply facilitating movement.

However, these benefits are neither automatic nor evenly distributed. Outcomes vary significantly depending on context and design. Impacts tend to be stronger in smaller, less developed and coastal economies, and where flatter geography allows connectivity gains to translate into real economic change. Most importantly, results are amplified when infrastructure is embedded within a clear theory of change and supported by complementary policies and institutions.

Governance and trade openness emerge as the strongest multipliers across studies. In South Asia, for instance, the Asian Development Bank finds that a one-point increase in governance effectiveness is associated with more than a fourfold increase in corridor-related economic activity.

Consequently, trade facilitation emerges as the decisive factor. Infrastructure alone is insufficient. Border processes, customs efficiency, and the removal of non-tariff barriers ultimately determine whether corridors translate into trade. This is evident across the literature and is best illustrated in West Africa, where the World Bank finds that combining corridor upgrades with trade facilitation measures yields substantial gains, with GDP impacts increasing to 0.83-1.28% when transit delays are removed along a corridor, and up to 1.7-3.5% when reforms are implemented more broadly across countries.

The implication for Africa is clear: corridors must be designed and operated as integrated ecosystems. Physical infrastructure, trade facilitation, institutional coordination and complementary policies must work together to translate connectivity into trade, productivity, and growth. Building on these lessons, this report analyses African trade corridors through a new framework that combines hard and soft infrastructure components, and identifies practical solutions and low-hanging opportunities to improve performance.

2.2. A New Framework to Expand and Operationalise African Trade Corridors

To operationalise the concept of corridors as integrated ecosystems, this report introduces a new framework (see Table 4: Transport Corridors Benchmarking Framework) **to benchmark major trade routes across both institutional and infrastructure dimensions.** The objective is to move beyond asset-level analysis to assess whether corridors are functioning as coordinated systems capable of moving goods efficiently across borders.

The framework first evaluates the institutional architecture that governs each corridor. This includes whether a formal corridor agreement has been signed, recognising that several recent agreements, such as those for the Abidjan-Lagos Corridor and Djibouti-Ethiopia-South Sudan-Uganda (DESSU), remain in the early stages, while others, such as Beira, are yet to come into force. It also assesses whether a dedicated corridor authority exists, whether there are existing customs or tariff unions, and whether public-private partnerships are in place to structure and manage corridor infrastructure.

The framework then assesses the physical and operational infrastructure that enables corridor functionality. This includes the presence and performance of one-stop border posts (OSBPs), the availability of inland logistics infrastructure such as dry ports and inland container depots, and whether corridors are supported by multi-modal systems, including railways and pipelines, beyond road transport.

¹³ Literature review includes (1) Lebrand, Mathilde. 2021. *Corridors without Borders in West Africa*. Policy Research Working Paper; No. 9855. © World Bank. <http://hdl.handle.net/10986/36634> Licence: CC BY 3.0 IGO.; (2) Asian Development Bank; UKAID; JICA; World Bank Group. 2018. *The WEB of Transport Corridors in South Asia*. © World Bank. <http://hdl.handle.net/10986/28882> Licence: CC BY 3.0 IGO; and (3) Roberts, Mark; Bougna, Theophile; Xu, Yan Sarah; Melecky, Martin. 2018. *Transport Corridors and Their Wider Economic Benefits: A Critical Review of the Literature*. Policy Research Working Paper; No. 8302. © World Bank. <http://hdl.handle.net/10986/29212> Licence: CC BY 3.0 IGO.

This framework is complemented by AFC's African Transport Corridors Map, released alongside this report, which provides a system-wide view of regional transport dynamics across the continent. The map brings together core transport infrastructure – roads, railways, ports, and dry ports – with key trade facilitation nodes such as one-stop border posts (OSBPs)¹⁴ and weighbridges. By visualising hard and soft infrastructure along major corridors, it highlights where connectivity exists, where gaps persist, and how infrastructure, institutions, and trade flows interact across regions. It also locates some of the most critical border crossing points (BCPs) identified in recent literature, including the World Bank's 2025 study Improving Transport Connectivity for Food Security in Africa, further underscoring the central role of trade facilitation in enabling corridor performance.

The results point to a clear divide between regions where corridors are institutionalised and operationalised, and those where they remain fragmented. East and Southeastern Africa stand out, particularly along the Northern and Central Corridors, where agreements have been implemented, corridor authorities are functional, and monitoring mechanisms are in place.

In Southern Africa, the Walvis Bay Corridor Group provides a notable model of public-private coordination, aligning stakeholders and systematically addressing bottlenecks through structured engagement and performance tracking.

By contrast, significant gaps persist in West and Central Africa. Most corridors rely on national or regional joint committees with limited execution capacity, while operations are often driven by fragmented private interests, particularly within the trucking sector. Although progress is underway – with new agreements and institutional structures emerging for corridors such as Abidjan-Lagos – implementation remains in its early stages.

These institutional gaps are mirrored in infrastructure and operational performance. The Northern and Central Corridors benefit from relatively well-developed and functional networks of OSBPs, while much of the rest of the continent lacks both the infrastructure and effective operationalisation of border systems.

- In East Africa – the region that has the highest number of operational and planned OSBPs on the continent (Map 1) – OSBPs have been linked to transport cost reductions of 62% to 87%.
- In contrast, Central Africa does not yet have a single operational OSBP (Map 2), while major corridors such as the North–South Corridor continue to face similar gaps despite their scale and economic importance.

This institutional and operational strength is reflected in trade outcomes: East Africa records the highest levels of intra-regional trade on the continent, with around 18% of total trade occurring within the region, compared to just 2.25% in Central Africa – the lowest on the continent.¹⁶

Map 1: Integrated hard and trade facilitation infrastructure underpin trade along the Northern and Central Corridors



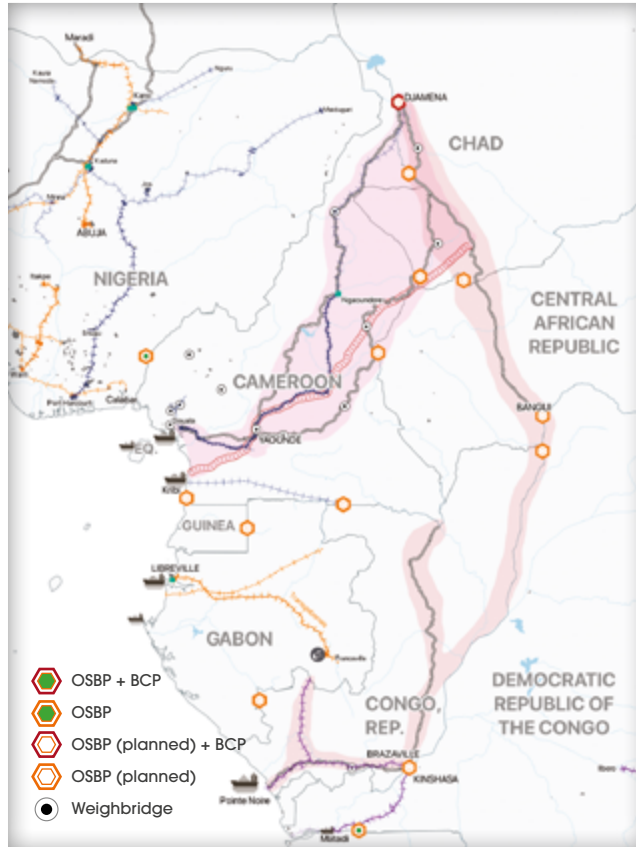
OSBP = One-Stop Border Post; BCP = Border Crossing Point
Source: AFC African Transport Corridors Map, 2026

¹⁴ A single land border crossing facility that combines all procedures required for exit and entry formalities into a country. The analysis of OSBPs for this report relies on AUDA-NEPAD's latest One-Stop Border Post (OSBP) Status Report available at <https://www.nepad.org/publication/one-stop-border-post-osbp-status-report>

¹⁵ "One-stop border posts in East Africa: impact on transport costs and issues for further analysis", Research reports, Overseas Development Institute, July 2023.

¹⁶ <https://unctadstat.unctad.org/datacentre/dataviewer/US.IntraTrade>

Map 2: In contrast, Central Africa's corridors remain fragmented and poorly integrated

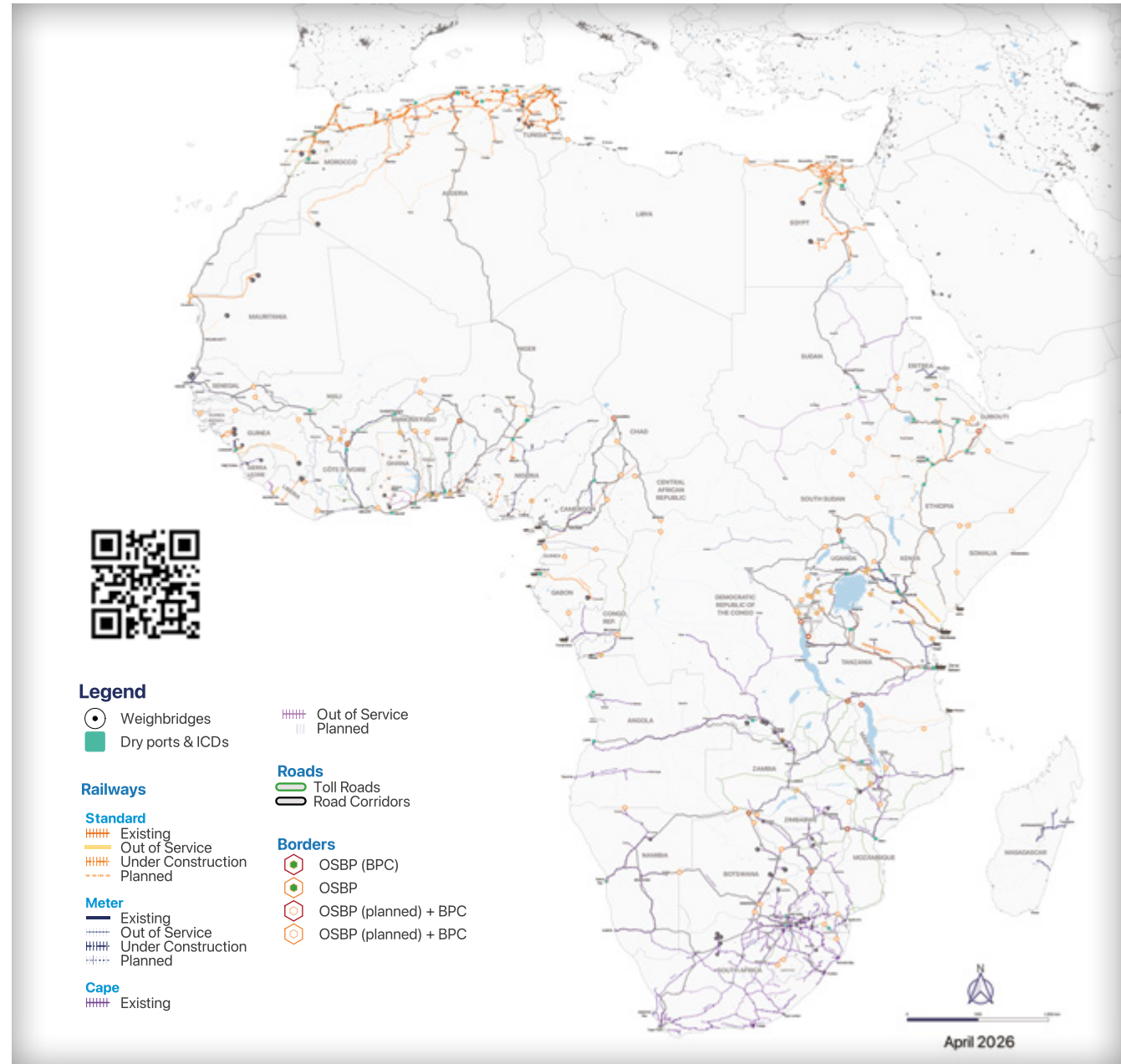


OSBP = One-Stop Border Post; BCP = Border Crossing Point

Source: AFC African Transport Corridors Map, 2026

Multi-modal integration further reinforces this divergence. East and Southeastern Africa benefit from interconnected systems that combine highways, railways and petroleum product pipelines, enabling more efficient movement of goods. In contrast, West and Central Africa remain heavily reliant on road transport, with no cross-border railway beyond the Abidjan-Ouagadougou line and no regional petroleum product pipelines, aside from Côte d'Ivoire's domestic Abidjan-Yamoussoukro pipeline serving its hinterland.

Map 3: African trade corridors



3 Logistics, Storage, and Supply Chains Are Emerging as Strategic Infrastructure in an Era of Recurrent External Shocks

In focusing on operationalising trade corridors, attention has rightly centred on hard infrastructure and trade facilitation – but one critical node remains underdeveloped: storage. Recent external shocks have brought this gap into sharp focus, showing that the ability to store and buffer goods is as important as the ability to move them. Storage must therefore be treated as an integral component of corridor planning, not a downstream consideration.

3.1. Weak Storage and Logistics Systems Amplify Africa's Exposure to External Shocks

Africa's exposure to external shocks is amplified by limited storage capacity and fragmented logistics systems. Disruptions to fuel and food supply chains translate rapidly into inflation and shortages, reflecting the absence of adequate buffers and inefficient distribution networks.

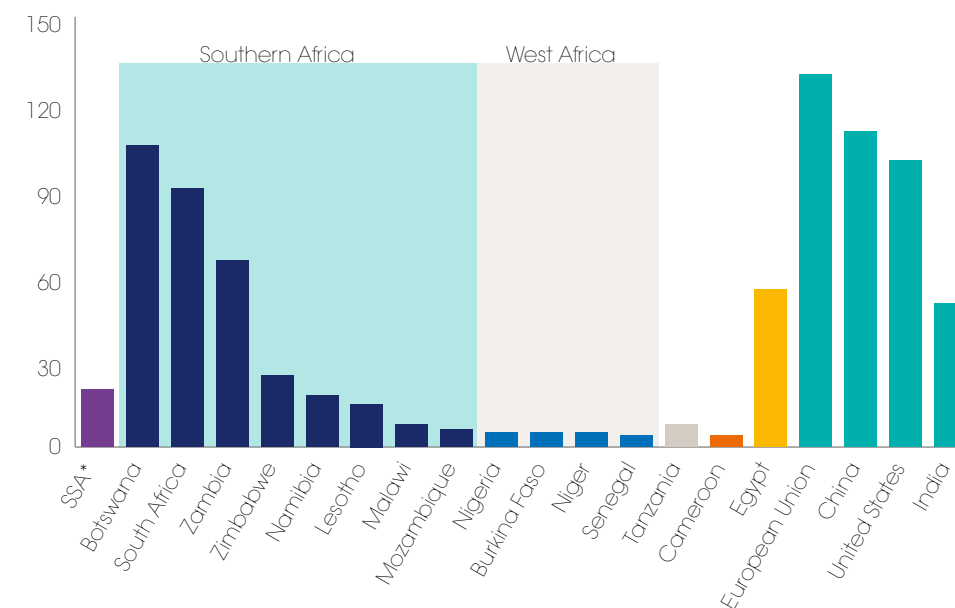
Recent research confirms that food insecurity in Africa is driven less by production deficits than by failures in connectivity, storage, and trade facilitation. The continent produces approximately 75% of its food needs, yet fragmented logistics networks and long supply chains result in high prices, significant post-harvest losses, and heightened vulnerability to shocks. Food travels an average of 4,000 km to reach consumers – four times farther than in Europe – and takes four times longer to move across the continent, reflecting weak regional integration, poor rural access, and limited multi-modal connectivity.¹⁷

Transport costs significantly inflate food prices, particularly for staple crops. A 2025 World Bank study found that logistics account for up to 45% of final cassava prices and between 13% and 31% of final maize, rice, and wheat prices – underscoring how inefficiencies in distribution directly translate into higher food costs.

Storage capacity is the critical missing link in Africa's food systems. Across sub-Saharan Africa, storage infrastructure remains severely underdeveloped, with available capacity estimated at less than 30% of annual production – far below that of other regions. South Africa is a notable exception, with significantly higher storage capacity relative to output.

Without storage, supply chains operate without buffers, amplifying volatility. Much of Africa's food system effectively operates “just in time,” with limited ability to absorb shocks, manage seasonal variation, or stabilise supply. This contributes to high levels of waste, including the loss of up to 40% of perishable crops and around 20% of other food commodities.¹⁸

Figure 19: Africa is able to store only a fraction of the cereals it produces
Grain storage capacity, % of total production



Note: The sub-Saharan Africa (SSA) estimates are for 12 countries: Botswana, Burkina Faso, Cameroon, Lesotho, Malawi, Mozambique, Namibia, Niger, Senegal, Tanzania, Zambia, and Zimbabwe.
Source: Kunaka, Charles; Abate, Megersa Abera; Lonla, Théophile Bougna; Molla, Kisanet Haile. 2025. Transport Connectivity for Food Security in Africa: Strengthening Supply Chains. © World Bank. <http://hdl.handle.net/10986/43194> Licence: CC BY 3.0 IGO. Supplemented by AFC staff calculations for Egypt and Nigeria based on “Egypt: Country Food and Agriculture Delivery Compact” (2023) and “Strategic Food Reserve in Nigeria: An Assessment of Optimal Stock Levels and Storage Capacity” (AGRA, 2023).

¹⁷ Kunaka, Charles; Abate, Megersa Abera; Lonla, Théophile Bougna; Molla, Kisanet Haile. 2025. Transport Connectivity for Food Security in Africa: Strengthening Supply Chains. © World Bank. <http://hdl.handle.net/10986/43194> Licence: CC BY 3.0 IGO.

¹⁸ Idem.

Transport improvements alone cannot resolve these challenges. Without adequate storage to manage the spatial and temporal mismatch between supply and demand, even efficient transport systems cannot prevent shortages or price spikes. Resilience, therefore, depends on integrating storage into broader logistics systems. Strengthening both import and domestic distribution infrastructure across ports, storage facilities, and inland networks is essential to reduce vulnerability and improve food system stability.

3.2. Building Strategic Reserves and Expanding Rail and Pipeline Networks Are Key to Fuel Security

Low fuel storage coverage is a critical layer of vulnerability across African economies. Many countries maintain less than 10 days of fuel demand cover – well below the recommended 90-day buffer – leaving them highly exposed to supply shocks, price volatility, and fiscal pressure during global disruptions.

Where storage exists, it is often concentrated in single assets, creating additional risk. Incidents such as the destruction of the Kaloum storage terminal in Conakry in 2023 and the SONARA refinery in Cameroon in 2021 highlight how reliance on limited infrastructure can trigger widespread supply disruptions.

These vulnerabilities are compounded by the structure of Africa's fuel logistics systems. Transport remains heavily reliant on road haulage, with approximately 83% of petroleum products moved by truck¹⁹ – driving up costs, congestion, and exposure to disruptions. Although around 13,000 km of petroleum product pipelines exist across sub-Saharan Africa, these networks are concentrated in a small number of countries, and often operate near capacity. Cross-border pipelines enabling the flow of petroleum products between countries have also remained limited to Tanzania–Zambia and Mozambique–Zimbabwe, with Kenya's pipeline infrastructure increasingly serving its regional neighbours despite its network being limited to Kenya's territory.

Strengthening fuel logistics will require diversifying transport modes and upgrading existing infrastructure.

Rail presents a clear but underutilised opportunity. Despite its suitability for bulk transport, its role in petroleum distribution remains limited. Several countries, including Cameroon, Angola, the DRC, and South Africa, already have fuel depots connected to rail networks, but these assets require rehabilitation, improved asset integrity, and operational modernisation.²⁰ Fuel transport volumes could serve as a stable anchor to revitalise rail systems and support broader logistics.

Pipelines offer the most scalable long-term solution but require a strong commercial foundation. For both domestic markets and regional corridors, pipelines provide cost-efficient and reliable supply. However, bankable development depends on guaranteed offtake, competitive tariffs, and alignment with national energy strategies. A recent corridor-level analysis²¹ by CITAC and Puma Energy highlighted that pipeline investments would be viable across several regional routes, especially as extensions of existing systems such as CPMZ (Mozambique–Zimbabwe), TAZAMA (Tanzania–Zambia), or to establish new routes towards high-growth landlocked provinces such as Nacala–Lusaka–Lubumbashi and Walvis Bay–Gaborone.

Without storage, the efficiency gains from corridor investments fail to translate into lower logistics costs and economic returns.

¹⁹ CITAC and Puma Energy (2024). *Fuelling Africa's Potential: Bridging the Gap in Energy Infrastructure*.

²⁰ See Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.

²¹ CITAC and Puma Energy (2024). *Fuelling Africa's Potential: Bridging the Gap in Energy Infrastructure*.

Africa's transport and logistics challenge is no longer one of building infrastructure, but of making systems work.

While ports, rail and road networks continue to expand, fragmentation across modes, borders, and institutions continues to limit their impact. Operationalising trade corridors, therefore, requires a shift from asset development to system integration – aligning infrastructure with trade facilitation, governance frameworks, and multi-modal connectivity. Aviation offers the fastest way to bridge connectivity gaps in the short term, while deeper integration across rail, road, and pipelines is essential for long-term efficiency.

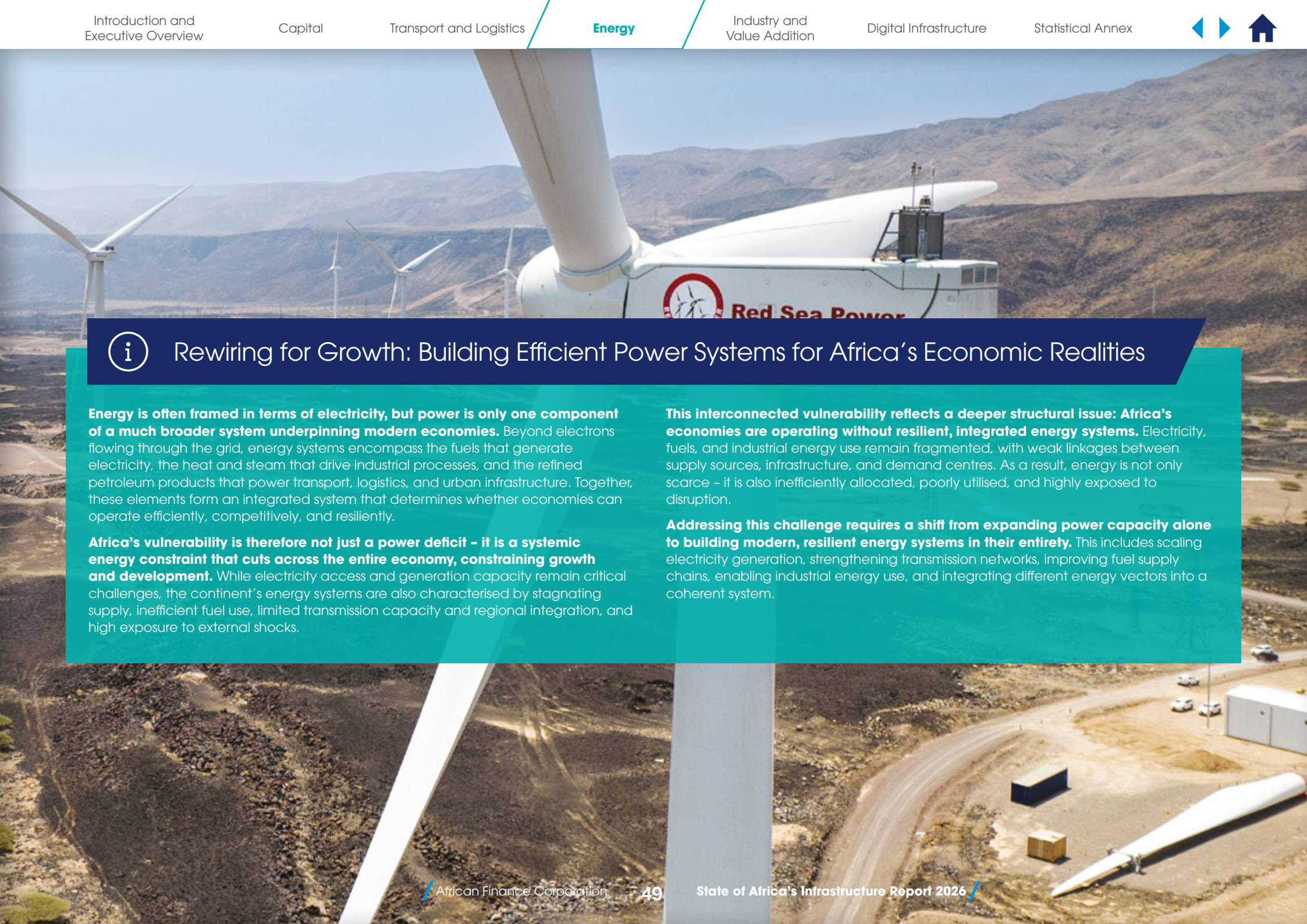
At the same time, resilience must become a core objective of corridor development. Recent shocks have shown that without storage, buffers, and efficient distribution systems, connectivity alone cannot prevent disruptions from translating into inflation and supply instability. Integrating storage and logistics into corridor planning – alongside diversified transport systems – will be critical. Africa's trade transformation will not be achieved by building more corridors, but by making them work as integrated, resilient ecosystems.



Energy

Energy Systems as the Backbone of Industrialisation

- Africa's energy systems can underpin industrial growth only if built as integrated systems. The priority is no longer incremental capacity additions, but the engineering of generation, transmission, storage, fuels, and industrial demand into coherent energy ecosystems capable of sustaining large-scale, continuous production.
- Energy must be deployed where it creates economic value. Reliable, high-load, and cost-competitive power is the anchor for downstream industries – from steel and fertilisers to refining, manufacturing, and data centres – requiring deliberate alignment between energy infrastructure and industrial corridors to ensure utilisation, competitiveness, and scale.
- Transmission is the critical unlock for system performance and must be opened to private capital. The first Independent Transmission Project (ITP) reaching financial close in 2026 demonstrates the viability of the model; scaling it will require leveraging markets with strong IPP track records – particularly in East and Southern Africa – to crowd in private investment, accelerate grid expansion and reduce system bottlenecks.
- Regional integration offers the fastest trajectory to scale, efficiency, and reliability. Bridging power pools through priority interconnectors can unlock stranded capacity in countries such as Angola, Ethiopia, and Uganda, while addressing deficits in major demand centres across the Copperbelt and Southern Africa, transforming fragmented national systems into competitive regional energy markets.
- Energy security has become a core economic imperative in a more fragmented and less reliable global system. The 2026 Strait of Hormuz crisis underscores that heavy dependence on imported fuels exposes countries to both price volatility and physical supply disruptions, as global energy networks increasingly reflect geopolitical fragmentation rather than stability. In this context, refining, storage, and fuel logistics are as critical as electricity systems to industrial resilience and macroeconomic stability.



Rewiring for Growth: Building Efficient Power Systems for Africa's Economic Realities

Energy is often framed in terms of electricity, but power is only one component of a much broader system underpinning modern economies. Beyond electrons flowing through the grid, energy systems encompass the fuels that generate electricity, the heat and steam that drive industrial processes, and the refined petroleum products that power transport, logistics, and urban infrastructure. Together, these elements form an integrated system that determines whether economies can operate efficiently, competitively, and resiliently.

Africa's vulnerability is therefore not just a power deficit – it is a systemic energy constraint that cuts across the entire economy, constraining growth and development. While electricity access and generation capacity remain critical challenges, the continent's energy systems are also characterised by stagnating supply, inefficient fuel use, limited transmission capacity and regional integration, and high exposure to external shocks.

This interconnected vulnerability reflects a deeper structural issue: Africa's economies are operating without resilient, integrated energy systems. Electricity, fuels, and industrial energy use remain fragmented, with weak linkages between supply sources, infrastructure, and demand centres. As a result, energy is not only scarce – it is also inefficiently allocated, poorly utilised, and highly exposed to disruption.

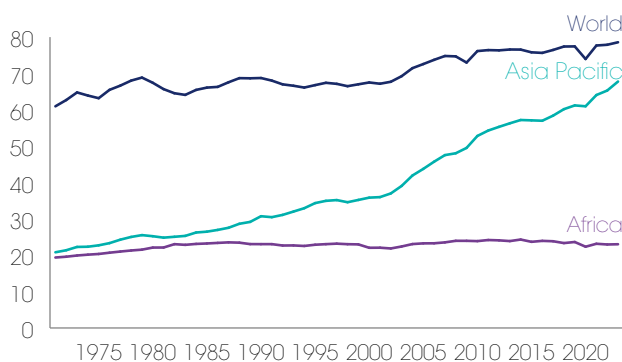
Addressing this challenge requires a shift from expanding power capacity alone to building modern, resilient energy systems in their entirety. This includes scaling electricity generation, strengthening transmission networks, improving fuel supply chains, enabling industrial energy use, and integrating different energy vectors into a coherent system.

1 Africa's Energy Dependencies: Low-Quality Supply, Fuel Import Dependence, and Lack of Scale

1.1. Energy Supply Remains Low-Quality, with Growing Reliance on Traditional and Polluting Fuels

Energy supply has not kept pace with Africa's economic and demographic trajectory. Per capita energy availability has remained largely unchanged for decades, reflecting limited expansion of modern energy systems relative to population growth. In 2023, per capita energy supply stood at just 23 GJ per person – essentially unchanged since the early 1980s – while regions such as the Asia Pacific more than doubled supply over the same period, reaching 68 GJ per capita (Figure 20). This stagnation reflects a deeper failure to expand modern energy systems in line with structural economic transformation.

Figure 20: Africa's per capita energy supply has stagnated for the past 40 years
Total energy supply in gigajoule per capita (1971-2023)

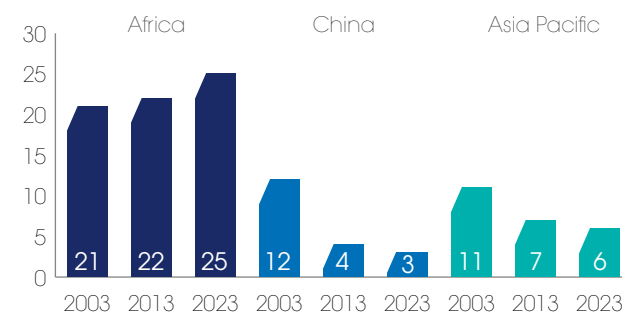


Source(s): AFC staff calculations based on IEA, World Energy Balances, World Bank

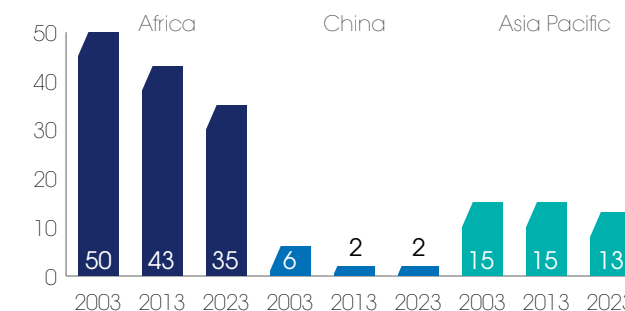
At the same time, the composition of energy supply has shifted in ways that undermine productivity and resilience. Africa continues to rely increasingly on traditional biomass and waste – low-efficiency, polluting fuels that dominate household and informal sector consumption. These sources accounted for 25% of total energy supply in 2023, up from 21% in 2003 (Figure 21), underscoring persistent dependence on inefficient fuels for cooking, heating, and informal economic activity. In contrast, other regions have transitioned rapidly toward modern energy sources, improving both energy efficiency, and economic output.

Critically, only a small share of Africa's energy system is channelled into productive economic use. Only around 8% of total energy supply reaches industry, a figure that has remained largely unchanged over two decades. This reflects a system in which energy is either consumed inefficiently, lost in conversion and transmission, or exported in raw form rather than deployed to support domestic value addition.

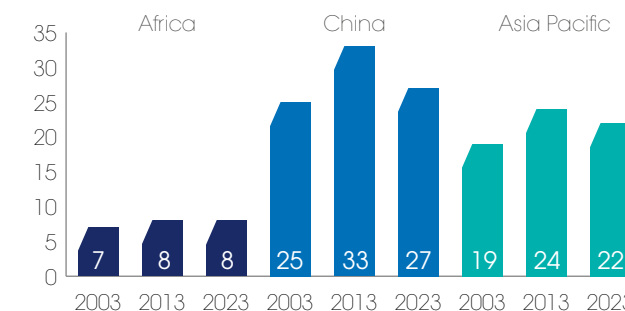
Figure 21: As polluting fuel use rises...
Share of biofuels and waste in total energy supply, in %



... modern energy continues to be exported...
Share of energy exported, in %



...leaving little to power industrial growth.
Share of energy consumed in industry, in %

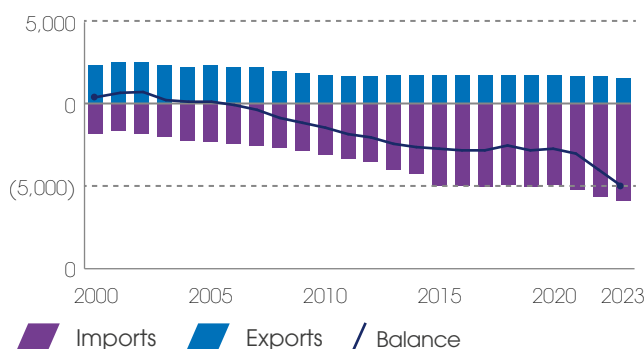


Source: AFC staff calculations based on International Energy Agency (2023), World Energy Balance. <https://www.iea.org/data-and-statistics/data-tools/energy-sankey>

1.2. Africa Depends on Imported Fuels, Exposing its Economies to External Shocks

Africa's energy systems are further weakened by persistent dependence on imported fuels, effectively making many economies net energy importers despite abundant natural resources. Refined petroleum products – critical for transport, backup power generation, and industrial activity – are largely sourced from international markets. This creates structural exposure to global supply disruptions and price volatility, with direct implications for inflation, fiscal stability, and economic activity.

Figure 22: Africa is a net importer of oil products despite being a global oil and gas producer
Africa's trade in oil products, in '000 TJ



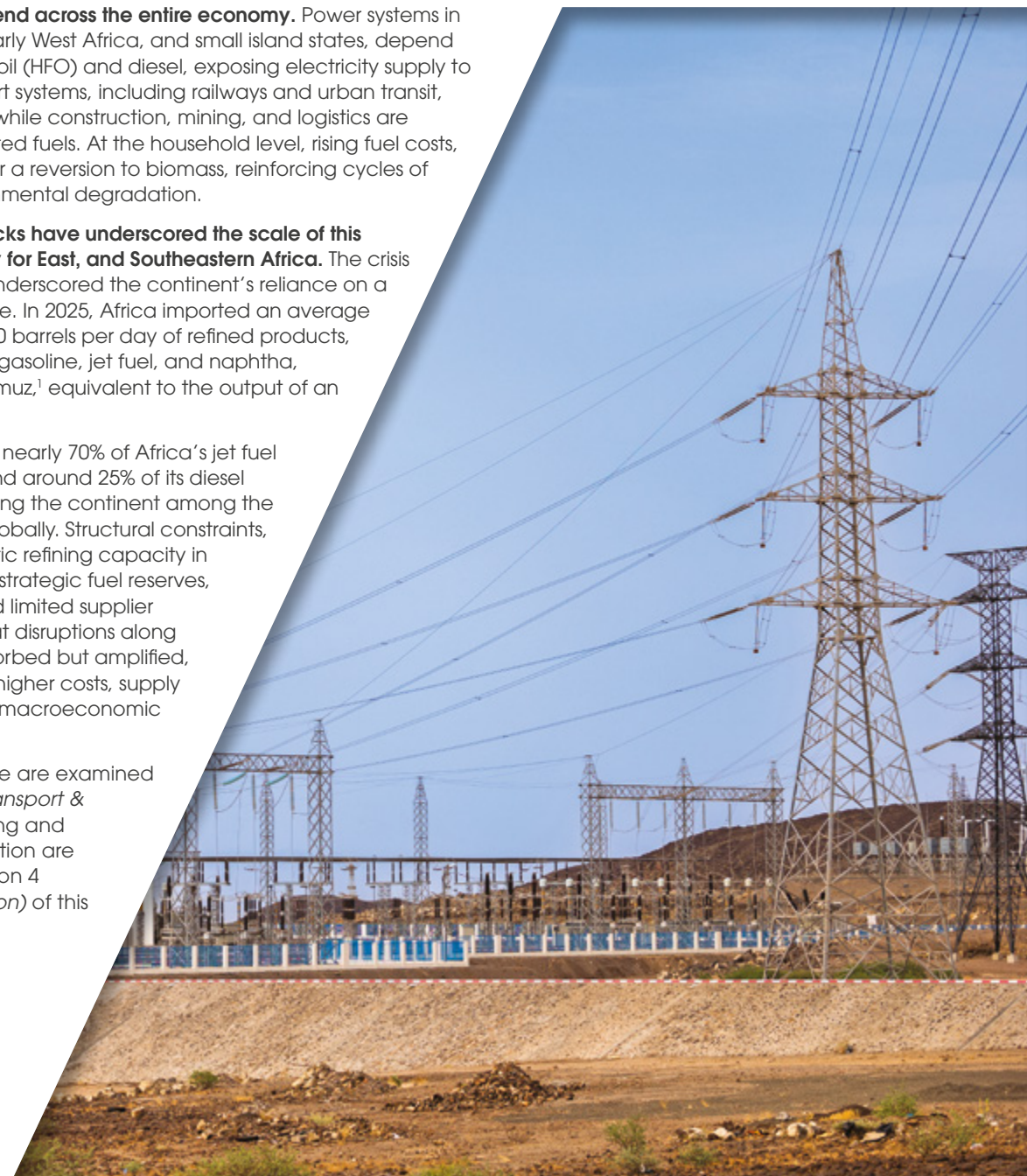
Source: International Energy Agency. Licence: CC BY 4.0

These vulnerabilities extend across the entire economy. Power systems in several regions, particularly West Africa, and small island states, depend on imported heavy fuel oil (HFO) and diesel, exposing electricity supply to external shocks. Transport systems, including railways and urban transit, are powered by diesel, while construction, mining, and logistics are similarly reliant on imported fuels. At the household level, rising fuel costs, or shortages often trigger a reversion to biomass, reinforcing cycles of inefficiency, and environmental degradation.

Recent geopolitical shocks have underscored the scale of this vulnerability, particularly for East, and Southeastern Africa. The crisis in the Persian Gulf has underscored the continent's reliance on a single critical supply route. In 2025, Africa imported an average of approximately 650,000 barrels per day of refined products, including diesel, fuel oil, gasoline, jet fuel, and naphtha, through the Strait of Hormuz,¹ equivalent to the output of an entire Dangote Refinery.

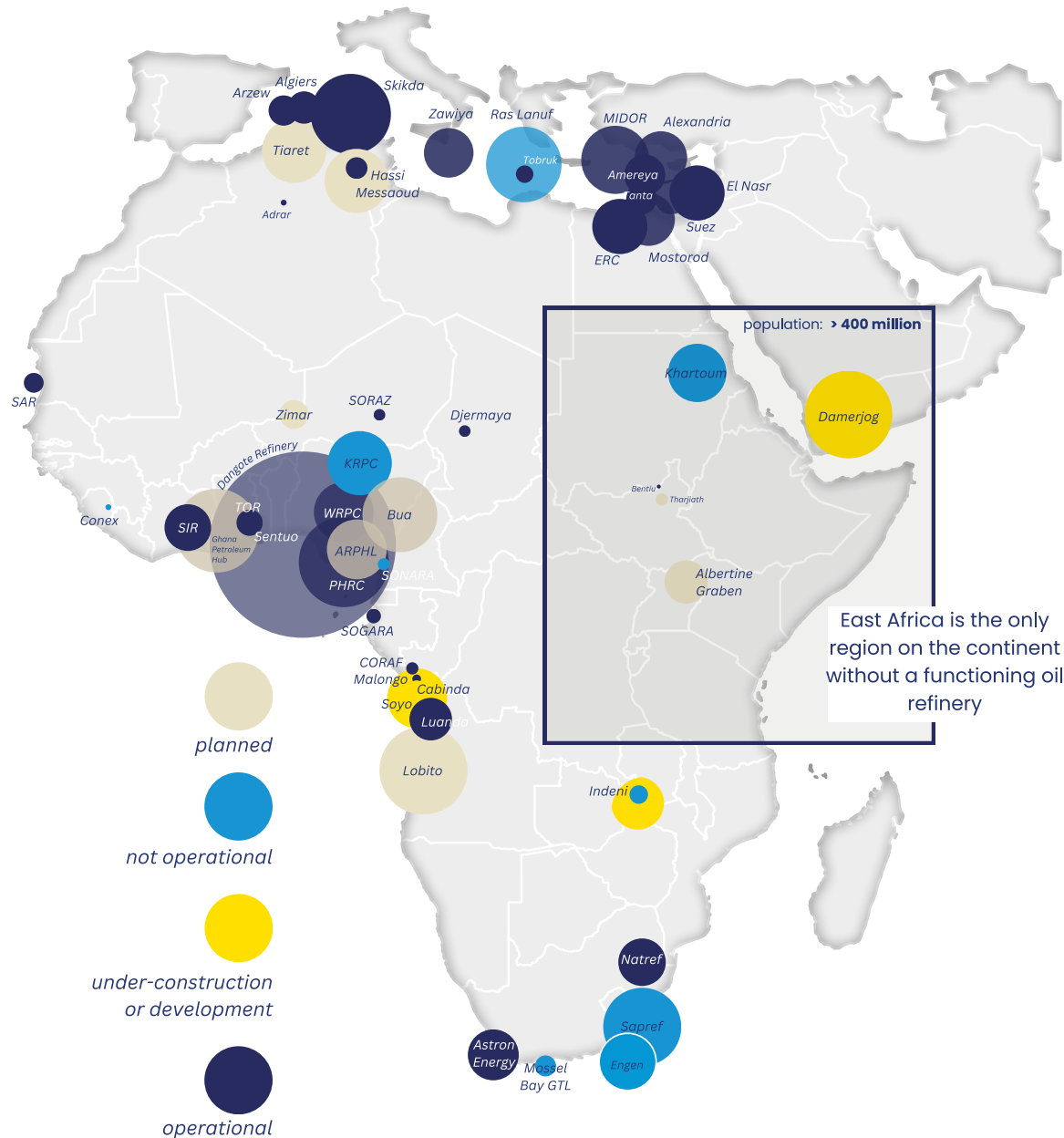
The Strait accounted for nearly 70% of Africa's jet fuel and kerosene imports and around 25% of its diesel and gasoil imports, placing the continent among the most exposed regions globally. Structural constraints, including limited domestic refining capacity in East Africa (Map 4), low strategic fuel reserves, high price sensitivity, and limited supplier diversification, mean that disruptions along this corridor are not absorbed but amplified, transmitting rapidly into higher costs, supply shortages, and broader macroeconomic stress.

Fuel logistics and storage are examined in detail in Section 2 (*Transport & Logistics*), while oil refining and downstream value addition are further explored in Section 4 (*Industry & Value Addition*) of this report.



¹ S&P Global Energy Insight (6 March 2026). Middle East war: What is the impact on African fuel markets?

Map 4: A regional void: over 400 million people in East Africa are without a single functioning refinery

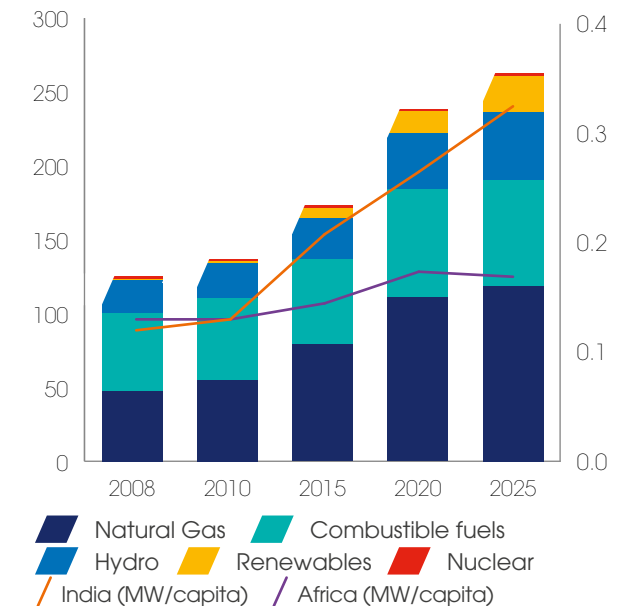


Note: Refineries are sized in proportion to their installed or planned capacity.
Source: AFC Research based on company disclosures and news clippings

1.3. Capacity Is Expanding, but not Fast Enough to Improve Power Availability per Capita

Africa has made visible progress in expanding electricity generation capacity, but this has not translated into systemic transformation. Installed capacity has doubled since 2008, exceeding 260 GW in 2025, with some 6.5 GW added in 2024 and 8 GW added last year, reflecting sustained investment in generation assets. However, this growth remains insufficient relative to population growth and economic needs (Figure 23).

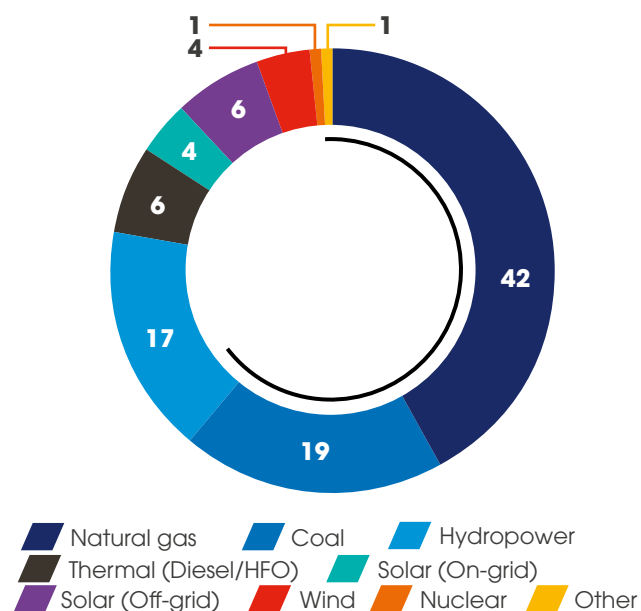
Figure 23: Power capacity is increasing, but per capita levels lag behind emerging Asia
Installed power generation capacity (grid-connected) in MW (left) and MW/capita (right)



Annual additions have held steady at around 6-8 GW in recent years, barely 50% of the 16 GW per year that our 2025 report had identified as the minimum needed to meet Africa's most basic energy needs by 2050. Given constant population growth, that minimum threshold has now increased to 22 GW per year of required capacity addition. Moreover, capacity expansion is highly concentrated,² with South Africa and North Africa accounting for the majority of additions, while many other economies continue to see minimal growth, reinforcing structural inequalities in energy access and supply.

Africa's electricity mix is gradually evolving, but remains anchored in fossil fuels. Around 70% of electricity generation still comes from fossil sources, even as renewable capacity expands (Figure 24). While the pipeline of under-construction and planned projects shows a clear shift toward renewables, legacy energy structures continue to dominate system-wide outcomes.

Figure 24: Africa's electricity mix, in % (2025)



Note: Other include geothermal and biomass-to-power, among others

Source: AFC Electricity Mix Dataset

A significant share of Africa's energy system also remains outside the grid. Off-grid solar and decentralised solutions play an increasingly important role, particularly in rural areas, and captive industrial use, but are often excluded from conventional capacity metrics, complicating assessments of system performance and overall progress.



² Africa Finance Corporation (2025). State of Africa's Infrastructure Report. <https://www.africafc.org/our-impact/our-publications>

2 The System Design Problem: Legacy Grids in a Modern Economy

2.1. Africa's Legacy Grid Design No Longer Matches Modern Demand Patterns

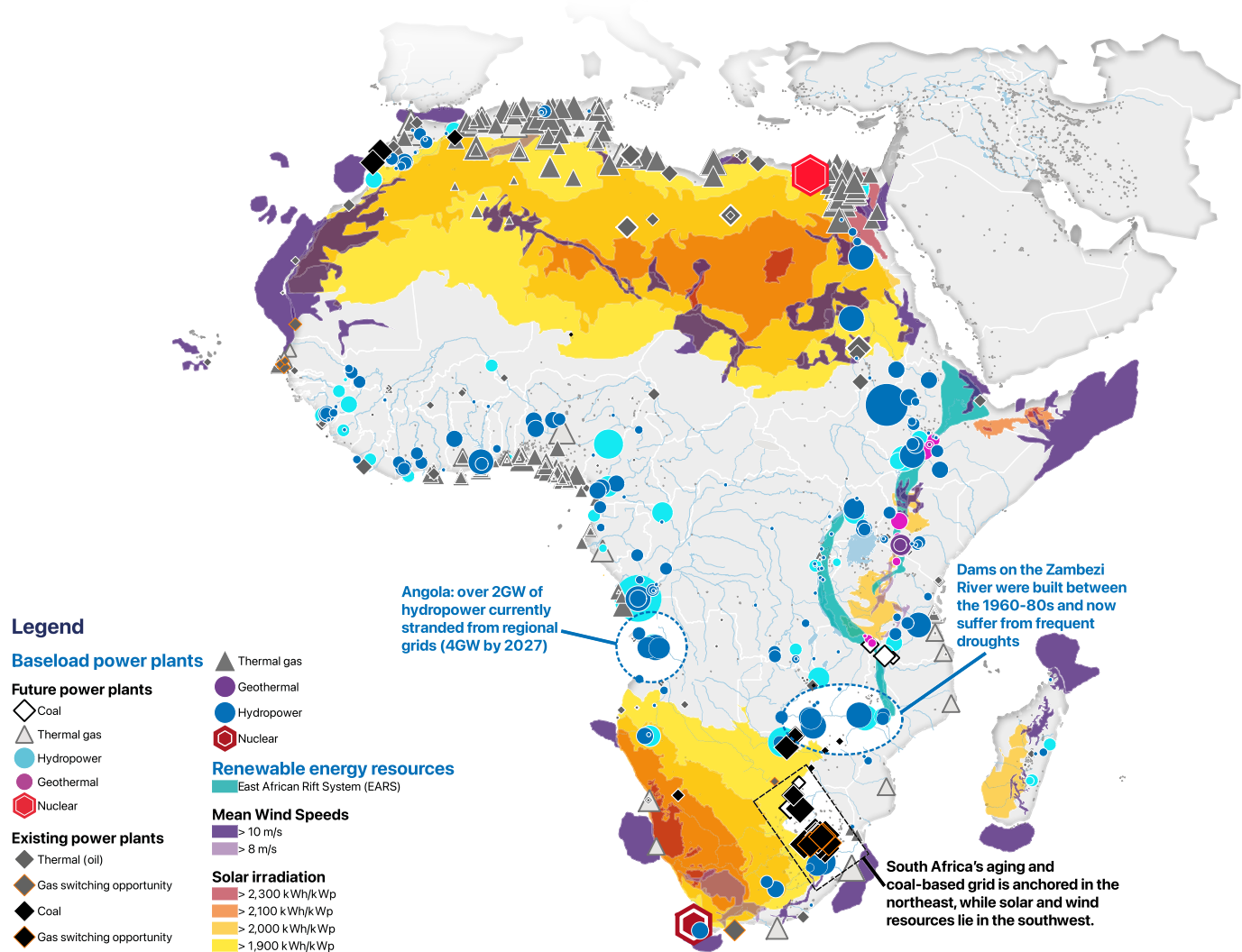
Africa's energy systems were not designed for modern, diversified economies. Many national grids were originally built around extractive industries, single urban centres, or isolated hydropower schemes – resulting in fragmented networks poorly aligned with today's industrial demand and regional trade patterns (Map 5). Selected examples notably include:

- In South Africa, the grid was built around coal plants in the northeast, while the best solar and wind resources are in the west, creating transmission bottlenecks that constrain renewable energy rollout.
- In the Zambezi Basin (Zambia, Zimbabwe, Mozambique), systems anchored on large hydropower dams designed for stable climates are now increasingly exposed to drought, reducing reliability, and forcing costly backup generation.
- In Angola, fragmented, coast-focused grids were not designed for regional integration, leaving surplus hydropower disconnected from rising demand in the Copperbelt of Zambia and the Democratic Republic of the Congo.

Source(s): AFC Research. Solar irradiation data is obtained from the "Global Solar Atlas 2.0", a free, web-based application developed, and operated by Solargis s.r.o. on behalf of the World Bank Group, utilising Solargis data, with funding provided by the Energy Sector Management Assistance Program (ESMAP). For additional information, see: <https://globalsolaratlas.info>. Mean Wind Speeds data is obtained from the Global Wind Atlas version 4.0, a free, web-based application developed, owned and operated by the Technical University of Denmark (DTU) and is released in partnership with the World Bank Group, utilising data provided by Vortex, using funding provided by ESMAP. For additional information, see: <https://globalwindatlas.info>

Map 5: Accessing abundant energy resources requires a rewiring of African power systems

Renewables and baseload are both plentiful across Africa, but their geographic dispersion requires stronger grid integration



This legacy design has created structural mismatches between where energy is produced and where it is needed. Some of the world's highest solar irradiation levels are concentrated in the Sahara and Kalahari deserts (Map 5) – far from major population and industrial centres – meaning without large-scale transmission infrastructure, this low-cost renewable potential remains effectively stranded.

Emerging technologies are also revealing underexploited opportunities. Within the East African Rift System, the eastern branch holds high-temperature geothermal resources suitable for power generation – largely untapped outside Kenya – while the western branch, stretching from Uganda to Malawi, is well-suited for direct-use applications such as greenhouse heating, aquaculture, crop drying, food processing, and cold chains, offering a pathway to displace widespread biomass use.³ Unlocking these opportunities will require a shift from resource-based development to system-based planning – prioritising transmission corridors, cross-border integration, and aligning energy infrastructure with industrial demand.

Unlocking these resource opportunities ultimately depends on the ability to move power across distances, making transmission the central constraint in Africa's energy system. Yet state-owned utilities, historically responsible for building, and operating grids, have been unable to adapt systems at the pace required.⁴ Chronic financial stress, weak balance sheets, and operational inefficiencies have limited their capacity to maintain existing infrastructure, invest in network expansion, or modernise grid architecture. As a result, transmission has become a critical missing link between Africa's energy potential and its economic use, setting the stage for the system-level bottlenecks explored in the next section.

Privatised transmission, a critical missing link in Africa's energy systems

Unlocking power sector opportunities requires a shift from resource-based development to system-based planning – prioritising transmission corridors, cross-border integration, and alignment between energy infrastructure and industrial demand

2.2. Transmission Constraints and System Losses Limit Effective Supply

Transmission constraints are now among the most binding limitations in Africa's energy system. Despite growth in generation capacity, transmission networks remain too sparse and underdeveloped to efficiently deliver power across countries and regions. Africa's grid density remains far below global benchmarks, limiting system efficiency. Sub-Saharan Africa has just 247 km of high-voltage transmission lines per million people,⁵ compared to over 600 km in countries such as Brazil, reflecting a fundamental infrastructure gap.

System losses remain persistently high, eroding the effective supply of electricity. Many African countries experience transmission and distribution losses of 10-20%, far above the global average of around 7% (Figure 25), meaning a significant share of generated power never reaches end users.

Closing the transmission gap will require significant and sustained investment. National Energy Compacts⁶ developed under Mission 300, a joint World Bank-AfDB initiative to connect 300 million Africans to electricity by 2030, estimate around US\$31 billion in transmission investment needs across 29 countries, highlighting the scale of the challenge.⁷

To map transmission bottlenecks and opportunities, our analysis compares system losses against transmission density by country (Figure 26). It reveals a common structural pattern across Africa's power systems: low transmission density and high system losses remain the norm across sub-Saharan Africa. In most countries, networks are significantly less dense than global benchmarks.

Within this broader trend, two priority groups emerge among Africa's largest power markets. Group 1 combines relatively high installed generation capacity with the highest levels of system losses, pointing to an urgent need to invest in efficiency – rehabilitating grids, reducing technical losses, and improving system performance to better utilise existing capacity. Group 2, by contrast, exhibits lower losses – though still above global benchmarks – but suffers from extremely low transmission density, indicating that generation capacity remains geographically constrained and underutilised. In these systems, the priority is also on expansion: extending transmission networks to unlock stranded power and connect supply with demand.

³ Kincer, Jacob and Ngaryo Degolmal, Sylvain (12 July 2021). What's the status of East Africa's geothermal market? See <https://energyforgrowth.org/article/whats-the-status-of-east-africas-geothermal-market/>

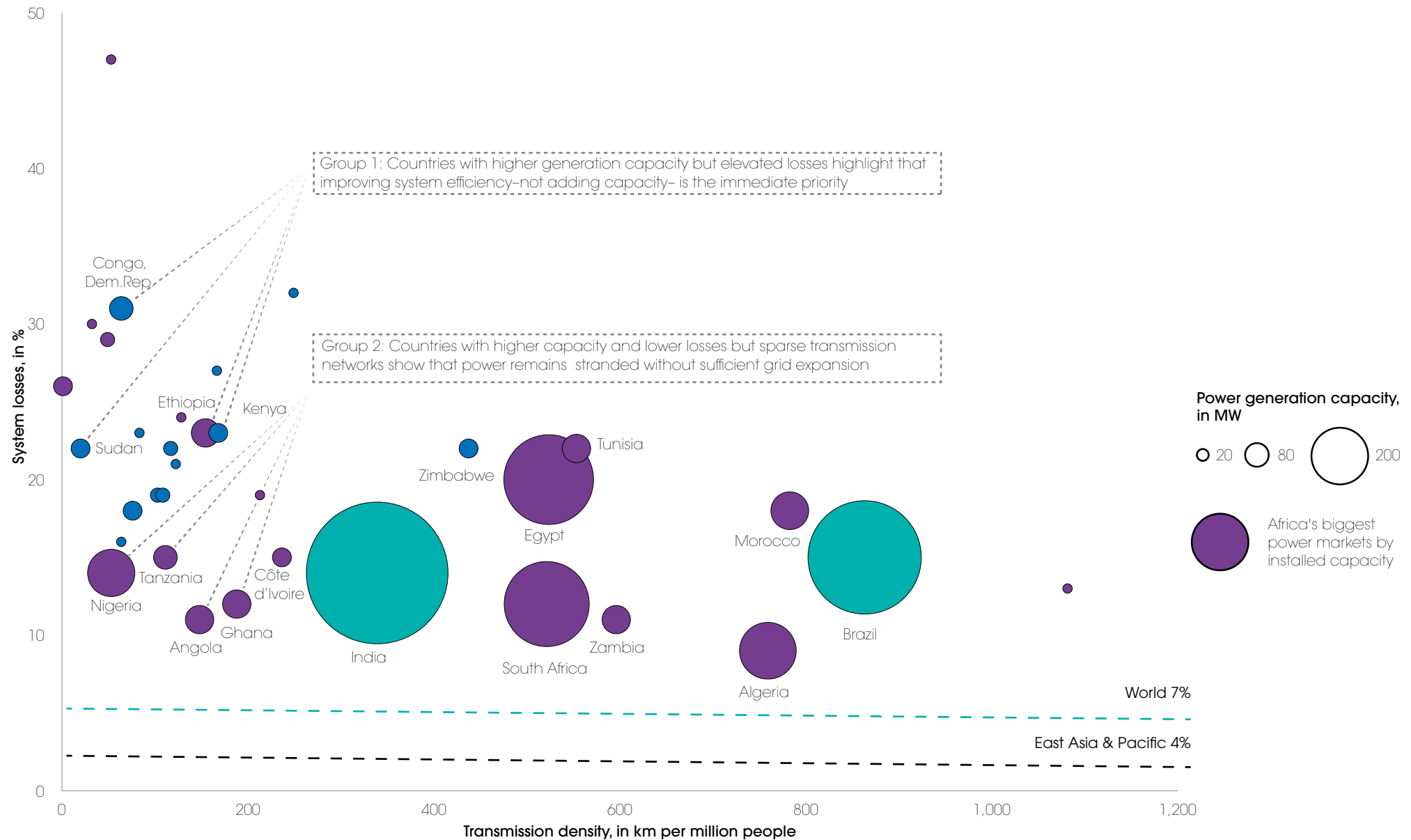
⁴ Africa Finance Corporation (2025). State of Africa's Infrastructure Report. <https://www.africafc.org/our-impact/our-publications>

⁵ World Bank Group. Linking Up: Public-Private Partnerships in Power Transmission in Africa. <https://openknowledge.worldbank.org/server/api/core/bitstreams/09863ef0-8ef8-5167-a280-8e3fce639245/content>

⁶ National Energy Compacts are available at <https://mission300africa.org/compacts/>

⁷ See <https://www.afdb.org/en/topics-and-sectors/initiatives-and-partnerships/mission-300/compacts>

Figure 25: Thin grids, high system losses: Africa's transmission gap is rooted in legacy networks that have not expanded or upgraded in line with demand growth
System losses in % vs. transmission density in km per million people



Note: Both the size of India and Brazil's power sector is capped for visualisation purposes only. Their power generation capacity currently stands at 520 GW and 209 GW, respectively.

Source: AFC Research, based on data from Upbeat Energy, World Bank, and IEA (2020-2023), TAESA, Power Line India

2.3. Transmission Must Become an Investable Asset Class to Unlock System Performance

If generation is where Africa's electricity conversation begins, transmission is where it tends to stall. Unlike generation, where independent power producer frameworks have channelled billions in private capital across the continent, transmission has remained almost exclusively a state-run affair. Between 2000 and 2024, 99% of private investment in Africa's power sector went to generation, with just 1% allocated to transmission, despite its critical role in system performance.⁸ Meanwhile, countries such as Brazil, Chile, India and the Philippines have demonstrated that competitively tendered transmission concessions and Independent Transmission Projects (ITPs) can deliver infrastructure at lower cost and on shorter timelines, provided the regulatory scaffolding is credible.

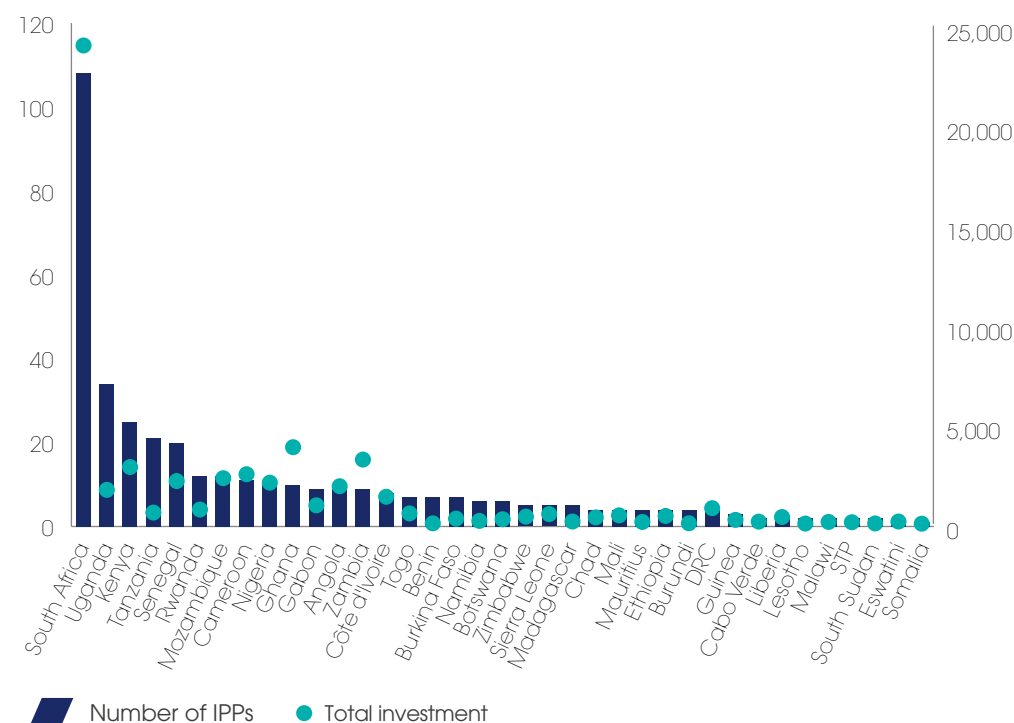
Africa's growing experience with public-private partnerships (PPPs) and independent power producers (IPPs) has laid the institutional foundation for private participation in transmission. ITPs are best suited to markets with established regulatory frameworks, strong contractual enforcement, and a proven track record of delivering bankable PPPs. Critically, they require stable, long-term demand from creditworthy industrial off-takers – such as mining operations, smelters, or manufacturers – to underpin the revenue model of 25- to 30-year transmission concessions. These conditions make ITPs particularly well-aligned with high-priority projects and industrial corridors where demand visibility and payment certainty can be ensured.

Momentum is building across the continent to unlock private sector participation in transmission, with several flagship programmes, and transactions signalling a shift in approach. South Africa has launched the Independent Transmission Programme (ITP)⁹ alongside an ambitious Transmission Development Plan that requires over 14,000 km of new lines to integrate more than 50 GW of new capacity – highlighting both the scale of need and the limits of utility-led expansion. Kenya has moved from policy to execution, signing a fully privately financed US\$311 million PPP with Africa50 and Power Grid Corporation of India to develop high-voltage lines under a long-term concession, intended as a replicable model.¹⁰

These efforts are complemented by emerging platforms such as Gridworks, which reached financial close on its first project in Uganda in early 2026¹¹ (see Box 4: *Gridworks and Project Amari – Africa's First Independent Transmission Project to Reach Financial Close*), and Zambia's Copperbelt Energy Corporation, which recently became the first Zambian company to reach a US\$1 billion market capitalisation and demonstrates the commercial viability of privately operated transmission networks in mining corridors.¹² Together, these initiatives point to a growing pipeline of transmission projects across Africa, with further details provided in Table 4.

Figure 26: Markets with established IPP frameworks are best positioned to lead private investment in transmission

Cumulative number of IPPs (left axis) and investment value (US\$ million, right axis), 2000–2024



Source: World Bank PPI Database (2000–2024)

⁸ World Bank, *Private Participation in Infrastructure (PPI) Database (2000–2024)*. <https://ppi.worldbank.org/>

⁹ National Treasury, Republic of South Africa, "Independent Transmission Programme" (June 2025). <https://www.gov.za/news/media-statements/national-treasury-independent-transmission-programme-06-jun-2025>

¹⁰ Africa50, "KETRACO Signs Landmark Public-Private Partnership with Africa50 and PowerGrid Corporation of India to Deliver USD 311 Million Power Transmission Project" (December 2025). <https://www.africa50.com/media/news/article/ketraco-signs-landmark-public-private-partnership-with-africa50-and-powergrid-corporation-of-india-to-deliver-usd311-million-power-transmission-project/>

¹¹ <https://gridworkspartners.com/uncategorized/amari-power-transmission-becomes-first-independent-transmission-project-in-africa-to-reach-financial-close/>

¹² Copperbelt Energy Corporation, "CEC Celebrates Historic One Billion Market Capitalisation Milestone" (2024). <https://www.cec.com.zm/cec-celebrates-historic-one-billion-market-capitalisation-milestone/>

Box

4 Gridworks and Project Amari – Africa's First Independent Transmission Project to Reach Financial Close

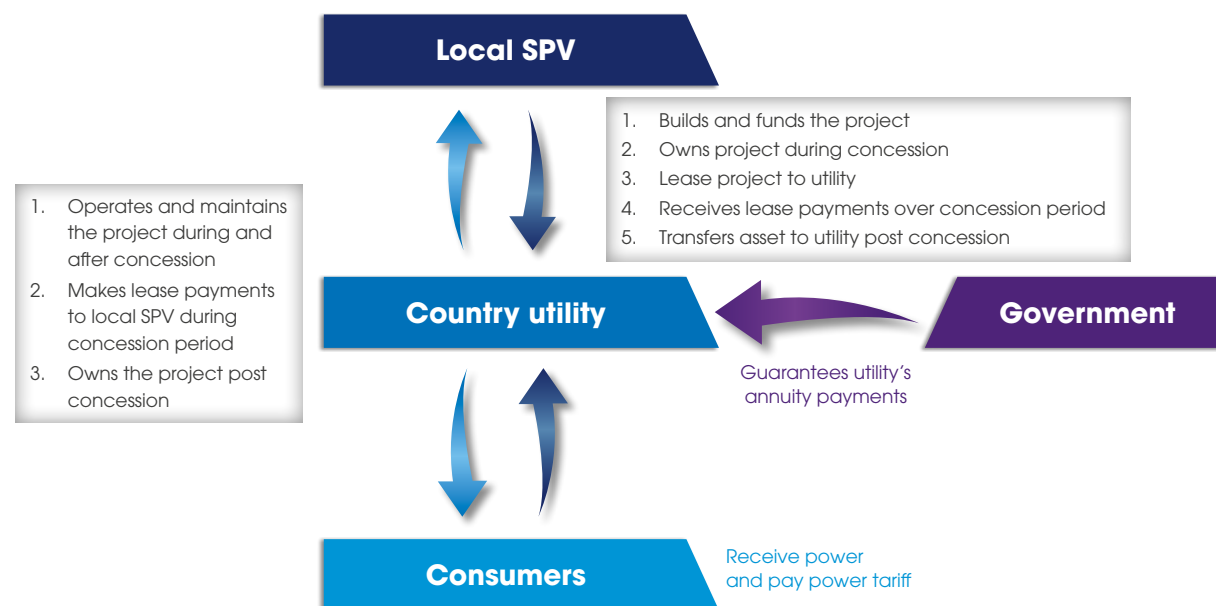
Project Amari marks a breakthrough for private sector participation in Africa's transmission sector, demonstrating that bankable Independent Transmission Projects (ITPs) are feasible under the right conditions. In March 2026, Gridworks – a platform established by British International Investment – reached financial close on the US\$50 million Amari Power Transmission Project in Uganda, the first privately financed transmission project in sub-Saharan Africa to achieve this milestone.

The project addresses a critical system bottleneck by upgrading four key high-voltage substations to unlock existing generation capacity. (Tororo 220 kV, Nkenda 132 kV, Mbarara North 132 kV, Mbarara South 220 kV). Amari will increase transformer capacity across these four strategic substations on Uganda's national grid, relieving constraints that have limited the evacuation and distribution of power.

Its structure provides a replicable model for mobilising private capital into transmission. The project is implemented through a dedicated special purpose vehicle that finances, builds and owns the assets under a long-term transmission service agreement with the national utility, Uganda Electricity Transmission Company Limited (UETCL). Revenues are secured through annuity payments ensuring predictable cash flows independent of electricity volumes. Ownership of the assets reverts to the utility at the end of the operation period. The project also benefits from Government support from the Government of Uganda under a Concession Agreement.

Amari was enabled by a combination of market conditions that are present in other parts of the continent. Uganda's long-standing experience with IPPs, relatively strong tariff collection, and a credible regulatory framework provided the contractual certainty required to attract private investment. Crucially, the project benefited from strong government collaboration and stakeholder alignment during development and structuring.

Infographic 2: How Africa's First ITP Will Work



3 Improving System Efficiency Can Unlock Significant Capacity Even Before New Generation

Building new infrastructure is only half the equation – Africa can unlock significant value by making existing energy systems work better. Across the continent, there is a substantial opportunity to improve system productivity by restoring underperforming assets, reducing losses, and better integrating available capacity. Hydropower rehabilitation can quickly recover low-cost generation, storage solutions such as battery energy storage systems (BESS). Pumped storage can enhance flexibility and reliability, while smarter regional system integration can ensure that more of the power already produced is effectively used. This section focuses on these immediate, high-impact opportunities to strengthen system efficiency and unlock additional capacity without waiting for new build.

3.1. Hydropower Rehabilitation Can Recover Low-Cost, Large-Scale Capacity Quickly

Hydropower remains one of Africa's most competitive energy sources for industrialisation, combining scale, reliability, and low-cost generation. It is one of the few clean energy technologies capable of delivering bulk, dispatchable power, with individual plants often exceeding 300 MW – making it essential for system stability as variable renewables expand. Yet Africa is significantly underutilising both its hydropower potential and its existing asset base.

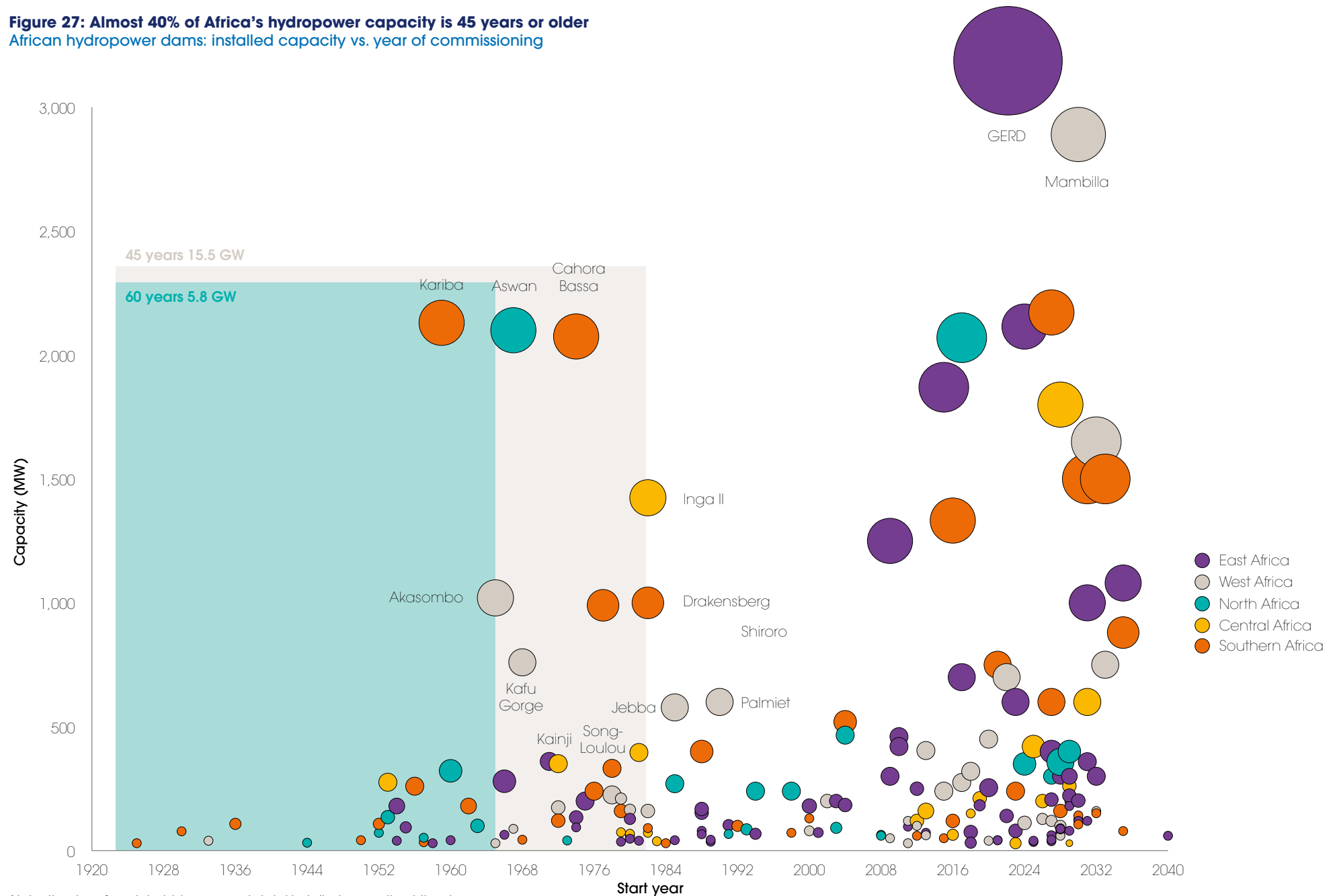
Only around 47 GW is currently installed across the continent, despite vast untapped potential, including over 100 GW in the Democratic Republic of the Congo alone. More critically, a large share of existing capacity has aged: nearly 40% of hydropower capacity, or around 18 GW, is over 35 years old (Figure 27), with many plants operating below their original design capacity.¹³

Being 4 to 5 times cheaper than new hydropower, brownfield rehabilitation translates directly into some of the lowest power generation costs available on the continent. With capital costs of just US\$400-500/kW, it offers a uniquely efficient pathway to recover capacity (Figure 28). Its economic advantage extends to lifetime costs, with levelised costs of electricity estimated at US\$0.01-0.05/kWh, far below the US\$0.20-0.60/kWh cost of diesel generation that many countries rely on during supply shortfalls. By restoring ageing assets, rehabilitation can unlock significant volumes of low-cost, reliable power without the long lead times and complexity of new projects – making it a clear “no-regret” investment to strengthen system performance, reduce costs, and support industrial growth.

¹³ In 2023, a continent-wide assessment under the African Hydropower Modernisation Programme (AHMP) identified widespread rehabilitation needs requiring up to US\$6.8 billion in financing. Out of 87 plants assessed (24.2 GW), 21 plants (4.6 GW) required urgent intervention, while a further 36 (10.1 GW) were approaching critical condition. Many high-need plants were operating with legacy technology, at derated capacity, with units in disrepair or entirely out of service. Of the US\$6.8 billion required, US\$2.1 billion is needed for the most urgent cases and US\$4.7 billion for medium-need plants. In return, modernisation could not only restore reliable generation from 14.7 GW of existing capacity but could increase output by 740 MW to 1,700 MW through improved turbine efficiency alone. For details, see: https://www.afdb.org/sites/default/files/documents/publications/hydropower_modernisation_report.pdf



Figure 27: Almost 40% of Africa's hydropower capacity is 45 years or older
African hydropower dams: installed capacity vs. year of commissioning

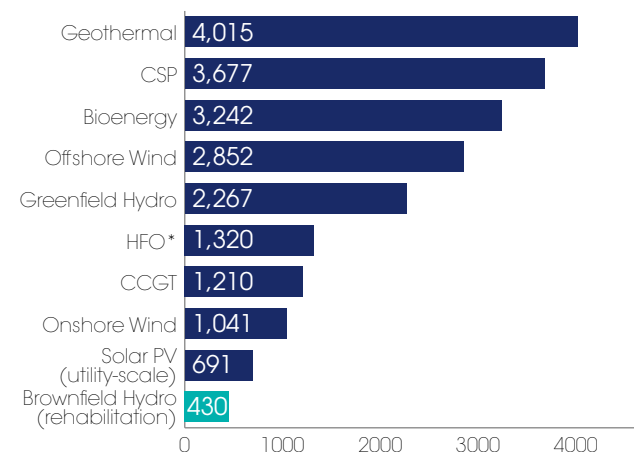


Note: the size of each bubble represents total installed capacity at the dam.

Source: AFC Research based on Global Energy Monitor's Global Hydropower Tracker.

Figure 28: Rehabilitating hydropower delivers new capacity at 4–5x lower cost

Cost of installed power per energy source, in US\$/kW



CSP = Concentrated Solar Power; HFO = Heavy Fuel Oil; CCGT = Combined Cycle Gas Turbine. Thermal power costs reflect a 10% increase due to increased fuel costs.

Source(s): Sustainable Energy Fund for Africa (SEFA) & African Development Bank Group: Africa Hydropower Modernisation Programme (IHA, June 2023); IRENA Renewable Power Generation Costs in 2024 (July 2025); USP&E

Beyond its cost advantage, brownfield hydropower rehabilitation also offers a compelling entry point for private sector participation in a segment historically dominated by state utilities. Recent projects demonstrate that private capital is willing to engage where a clear commercial framework exists. In Nigeria, Mainstream Energy Solutions is rehabilitating key assets at Kainji and Jebba following their privatisation; in the Democratic Republic of the Congo, Ivanhoe Mines restored capacity at Inga II to secure power for Africa's largest copper smelter;¹⁴ and in the Republic of the Congo, a 30-year concession for the Imboulou plant was awarded in 2024 to a private consortium led by Axian Group.¹⁵ Taken together, these examples suggest that hydropower rehabilitation can serve not only as a low-cost supply solution but also as a scalable pathway to crowd in private capital and accelerate the modernisation of Africa's power systems.

¹⁴ <https://www.ivanhoemines.com/news-stories/news-release/ivanhoe-mines-announces-completion-of-hydropower-ramp-up-of-178-megawatt-turbine-5-at-inga-ii/>

¹⁵ <https://www.aci.cg/congo-energie-mise-en-concession-de-la-centrale-hydro-electrique-dimboulou/>

¹⁶ Africa Finance Corporation (2026). Compendium of Africa's Strategic Minerals.

3.2. Storage Is Becoming Essential to Stabilise Grids and Integrate Renewable Energy

As grid stability becomes a priority and renewable energy scales across Africa, storage is becoming a critical enabler of system efficiency. Solar and wind generation are inherently variable, with output peaks often misaligned with demand patterns, leading to curtailment, and underutilisation of available power. Battery energy storage systems (BESS) have emerged as a key solution, enabling excess electricity to be stored and dispatched when needed, thereby improving reliability, and reducing losses.

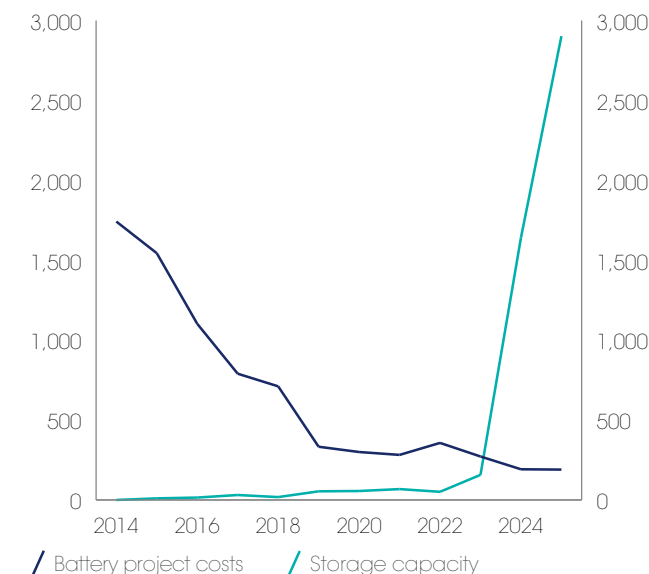
Alongside batteries, pumped storage hydropower – often overlooked in Africa – offers a proven, large-scale solution for long-duration storage, particularly suited to countries with existing hydropower assets and favourable topography. Together, these technologies are central to transitioning from fragmented generation systems to integrated, flexible energy networks.

Recent deployment trends indicate that storage is moving from pilot projects to early-stage scaling, driven by rapid cost declines. Installed battery capacity has grown from just 31 MWh in 2017 to over 1.6 GWh in 2024 (Figure 29), reflecting a sharp acceleration in adoption. This growth has been underpinned by falling lithium-ion battery costs – declining by around 20% in 2024 alone – driven by manufacturing scale-up and the increasing use of lower-cost lithium iron phosphate (LFP) technologies. As a result, storage is becoming increasingly viable across African markets, with capacity projected to grow at over 20% annually through 2030.

However, deployment remains highly concentrated, underscoring both progress, and remaining gaps. South Africa accounts for the vast majority of grid-scale storage capacity, supported by programmes such as the Battery Energy Storage Independent Power Producers Procurement Programme (BESIPPPP), while most other markets remain at early stages of adoption.

Figure 29: Falling battery costs are enabling a scale up of storage capacities in Africa

Installed storage capacity in MWh (left axis) vs. installed battery project costs in US\$/kW (right axis)



Source(s): IRENA; Ember Energy; African Solar Industry Association (AFSIA)

At the same time, Africa is uniquely positioned within the global battery value chain, with significant reserves of lithium, cobalt, manganese, and graphite resources.¹⁶ This creates an opportunity not only to deploy storage domestically but to develop refining, processing, and manufacturing capabilities on the continent. Early initiatives, such as large-scale battery manufacturing projects in South Africa and emerging plans in Nigeria, point to the potential for storage to play a dual role: strengthening power systems while anchoring new industrial value chains.

3.3. Cross-Border Trade: Unlocking System Efficiency at Scale

Cross-border power trading can, at its core, enhance system efficiency by balancing supply and demand across geographies. Where battery storage smooths imbalances across time, power trading does so across geographies – allowing countries with surplus generation to offset deficits in neighbouring economies, creating economies of scale that lower the average cost of supply for all participants. Modelling studies estimate substantial savings from deeper integration. In Southern Africa, full integration could reduce system costs by over US\$42 billion by 2040,¹⁷ while estimated savings in East and West Africa range from US\$7.6-18.6 billion¹⁸ and roughly US\$32 billion,¹⁹ respectively.

A closer examination of both the Southern Africa Power Pool (SAPP) and East Africa Power Pool (EAPP) reveals the clearest illustration of why cross-border power trading matters. In SAPP, the region faces a persistent and widening capacity shortfall (Figure 30). The power deficit – historically concentrated in South Africa and the DRC – has recently narrowed, largely due to the growth of embedded and private generation, particularly in South Africa. However, this improvement is likely to be temporary: both systems remain finely balanced, and South Africa is expected to decommission nearly 6 GW of coal capacity in the coming years, putting renewed pressure on supply.

What makes this imbalance striking is that it co-exists with untapped surplus elsewhere. Angola, still outside the SAPP grid, holds over 2 GW of stranded capacity, enough to materially offset most of the region's shortfall. Once the Caculo Cabaça Dam is commissioned by 2027, that stranded capacity will grow to over 4 GW. The interconnection of Angola into the pool could therefore be transformative: a single cross-border link would give Angola a revenue-generating export market for its stranded hydropower while providing Southern African markets with a new source of clean, dispatchable baseload.

Figure 30: Angola, Ethiopia and Uganda have significant stranded power capacity that can benefit East and Southern Africa
Capacity balance across selected members of SAPP and EAPP, in MW



Source(s): SADC Annual Report 2025, East Africa Power Pool

While the structure of Africa's regional power pools was examined in detail in the previous edition of this report, the priority now is clear: a small number of high-impact interconnectors can unlock continental-scale system integration.

- In Southern and Central Africa, connecting Angola's surplus hydropower into the Copperbelt via DRC and Zambia – and creating a separate link with Namibia – would rebalance supply and demand across the Southern African Power Pool (SAPP).
- The upcoming Tanzania-Zambia Interconnector represents a second critical milestone, effectively bridging the EAPP and SAPP to create a continuous energy corridor from Ethiopia to the Copperbelt, traversing some of the continent's richest hydropower, solar, wind, and geothermal resources.
- In North and West Africa, the proposed Morocco-Mauritania Interconnector would link COMELEC to WAPP, while strengthening Egypt-Sudan connections would further integrate North and East African systems.
- Finally, completing the operational synchronisation of WAPP, particularly following Nigeria's recent grid integration, remains essential to unlock competitive regional power trade at scale in West Africa.

Together, these interconnections form the backbone of a future continental grid, shifting Africa from fragmented national systems to an integrated energy market.

¹⁷ SADC Energy, "The SAPP Pool Plan: Highlights of the 2017 Plan", https://sadc-energy.sadc.net/attachments/article/363/The_SAPP_Pool_Plan-Highlight_of_the_2017_Plan.pdf

¹⁸ Wabukala, P. et al., "Economic benefits of electricity trade in Eastern Africa", University of Queensland eSpace (2023). <https://espace.library.uq.edu.au/view/UQ%3AAbc08d35>

¹⁹ ECRREE/USAID, "West Africa Power Trade" (2022). https://assets.ctfassets.net/75ila1cntaeh/70QFVRf12PahvGP6XFlu7k/e58e65530dbac0c7c2defbdc51f13f98/ENGLISH_West_Africa_Power_Trade_UK_WHOLE_LOW_1.pdf

Box

5

Case Study: Ethiopian Electric Power (EEP) – How Exports Built a Revenue Engine

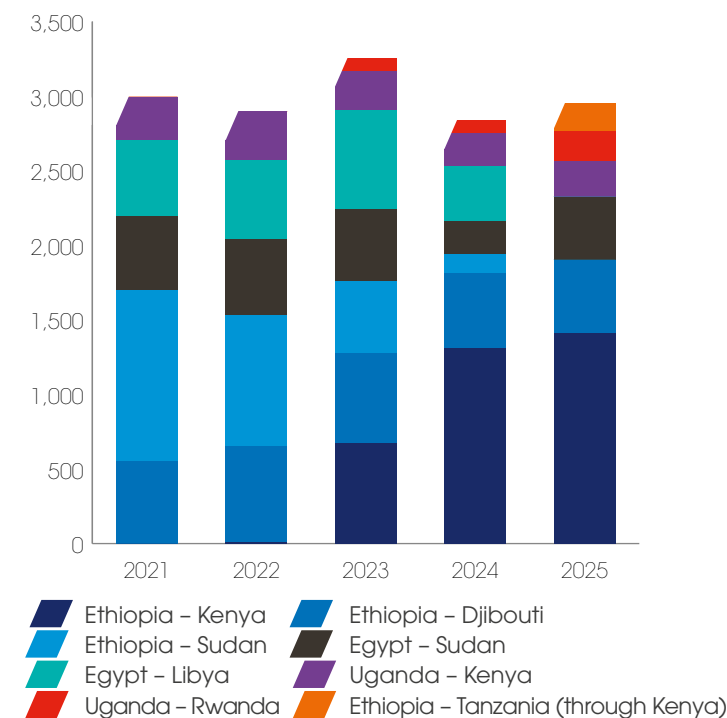
Ethiopia offers the most compelling African case study of how cross-border power trade can transform utility economics. Ethiopian Electric Power (EEP), the state-owned generation, and transmission utility, generated 29,480 GWh of electricity in the 2024/25 fiscal year – 43% higher than the previous year, driven by the commissioning of the Grand Ethiopian Renaissance Dam (GERD).²⁰ EAPP's own data shows Ethiopia's capacity surplus at 1,289 MW in 2023, projected to grow to approximately 8,900 MW²¹ by 2030 as GERD reaches full capacity and additional hydro, wind, and solar projects come online – positioning it as the dominant exporter in East Africa.

Of total generation, approximately 7% was exported to neighbouring countries, primarily Kenya (US\$86.3 million in sales) and Djibouti, with trial transmissions to Tanzania commencing during the year.²² EAPP trade data shows volumes on the Ethiopia–Kenya HVDC Corridor alone reaching 1,410 GWh in 2025, making it by far the largest single trading corridor in the pool. Export revenues reached US\$118 million from cross-border electricity sales alone, accounting for roughly 20% of EEP's total revenue.²³ When combined with earnings from data mining operations (US\$220 million from 24 licensed cryptocurrency mining firms paying in foreign currency), total foreign exchange earnings more than doubled to US\$330–388 million, up from US\$140 million the previous year.²⁴

The strategic significance is clear. Power exports have provided EEP with a hard-currency revenue stream that partially offsets the structural challenge of below-cost-reflective domestic tariffs – a constraint that plagues utilities across the continent. Ethiopia's ambition is to scale this further: EEP targets US\$427 million in foreign currency earnings by 2026 from data mining and regional exports. The model demonstrates that countries that invest in generation capacity above domestic demand can monetise surplus through regional trade, but only if the interconnection infrastructure exists to deliver it.

Figure 31: Ethiopia–Kenya HVDC now carries nearly half of regional electricity volumes and has become a key revenue driver for EEP

Power volumes traded within the East African Power Pool, in GWh



Source: East African Power Pool

²⁰ Birr Metrics, "Ethiopia Electric Power Revenue Hits Br75.4 Billion Amid Surge in Data Mining Demand" (2025). <https://birrmetrics.com/ethiopia-electric-power-revenue-hits-br75-4-bln-amid-surge-in-data-mining-demand/>

²¹ Eastern Africa Power Pool (EAPP), Energy Mix and Balance Sheet 2030 Projections (2024). AFC internal analysis based on EAPP capacity planning data.

²² 2Merkato, "Ethiopia Earns USD 118.1 Million from Regional Electricity Exports" (2025). <https://www.2merkato.com/news/energy-and-mining/8568-ethiopia-earns-usd-1181-million-from-regional-electricity-exports>

²³ Ibid.

²⁴ Birr Metrics, "Ethiopia Electric Power Revenue Hits Br75.4 Billion Amid Surge in Data Mining Demand" (2025). <https://birrmetrics.com/ethiopia-electric-power-revenue-hits-br75-4-bln-amid-surge-in-data-mining-demand/>

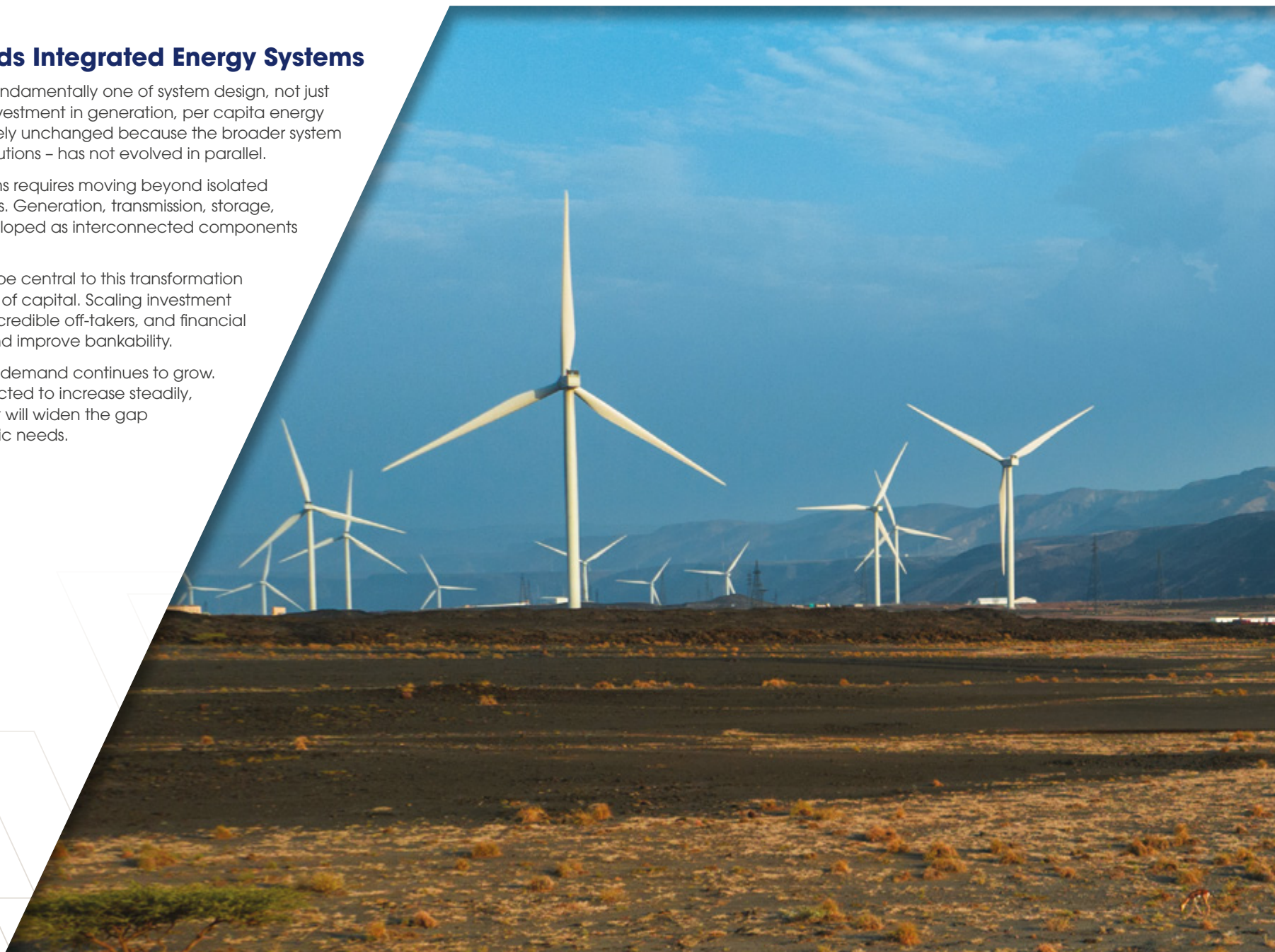
Conclusion: Towards Integrated Energy Systems

Africa's energy challenge is fundamentally one of system design, not just supply. Despite decades of investment in generation, per capita energy availability has remained largely unchanged because the broader system – networks, markets, and institutions – has not evolved in parallel.

Building resilient energy systems requires moving beyond isolated projects to integrated solutions. Generation, transmission, storage, fuels, and trade must be developed as interconnected components of a single system.

Transmission infrastructure will be central to this transformation and must attract new sources of capital. Scaling investment will require regulatory reform, credible off-takers, and financial instruments that reduce risk and improve bankability.

The cost of inaction is rising as demand continues to grow. With electricity demand projected to increase steadily, delays in system development will widen the gap between supply and economic needs.





Industry and Value Addition

From Resource Endowment to Industrial Systems

- In the context of repeated external and geopolitical shocks, Africa's infrastructure deficit has increasingly become a resilience deficit. A US\$230 billion annual import bill for essential goods – including fuel, food, plastics, steel and fertiliser – highlights the continent's limited capacity to absorb external shocks. Many of these products are derived from Africa's own raw materials, yet are processed elsewhere – locking in imported inflation while exporting value, jobs, and industrial capacity.
- Fragmented value chains represent a scalable industrialisation opportunity. The geographic separation of production, processing, and demand provides the basis for building integrated regional systems that retain value within the continent. Africa's strategic minerals position illustrates this clearly: with one of the world's largest endowments of iron ore, bauxite, critical minerals, and inputs to battery and energy systems, the continent is well placed to anchor both global and regional value chains.
- Building on previous *State of Africa's Infrastructure* reports, our Demand, Resources, Infrastructure and Policy (DRIP) framework identifies key opportunities to move from extraction to value creation. Expanding downstream processing – across steel, aluminium, fertiliser, and energy – can significantly increase domestic value addition and reduce import dependence, particularly in oil refining, metals processing and phosphorous and nitrogenous fertilisers.
- Realising this shift depends on infrastructure systems as the enablers of industrialisation at scale. Reliable energy, efficient transport corridors, and market connectivity are not prerequisites alone – they must be developed within an explicit industrialisation objective. Framed in this way, infrastructure moves beyond standalone assets to become integrated platforms that translate resource endowments into industrial capacity – while also strengthening project bankability through clear demand anchors and value chains.



i Industrialising for Resilience: Building Competitive and Integrated Supply Chains

Macroeconomic stability and supply chain resilience have become the most urgent drivers of value addition. The succession of global crises – from Covid-19 to the war in Ukraine and the 2026 conflict across the Middle East – has exposed the fragility of external dependencies. The continent still imports over 70% of its refined fuel, remains structurally dependent on imported fertilisers despite vast resource endowments, and faces a US\$97 billion annual food import bill. Each disruption translates directly into higher import costs, pressure on foreign currency reserves, inflation, and macroeconomic instability, making domestic processing capacity a core economic buffer.

Clear progress is now emerging in refining and fertilisers, replicating the earlier success of cement. Cement offers the clearest precedent, having moved from import dependence to largely self-sufficient regional production across major markets. That model – anchored in strong demand, resource proximity, and integrated infrastructure – has since been replicated in fertilisers, with Morocco, Nigeria, Egypt, and Algeria building globally competitive platforms. The model is increasingly being replicated in refining as well, where new capacity, such as the Dangote Refinery, is beginning to reduce fuel import dependence structurally. These sectors show that value addition scales where infrastructure, policy, and industrial capacity are developed together.

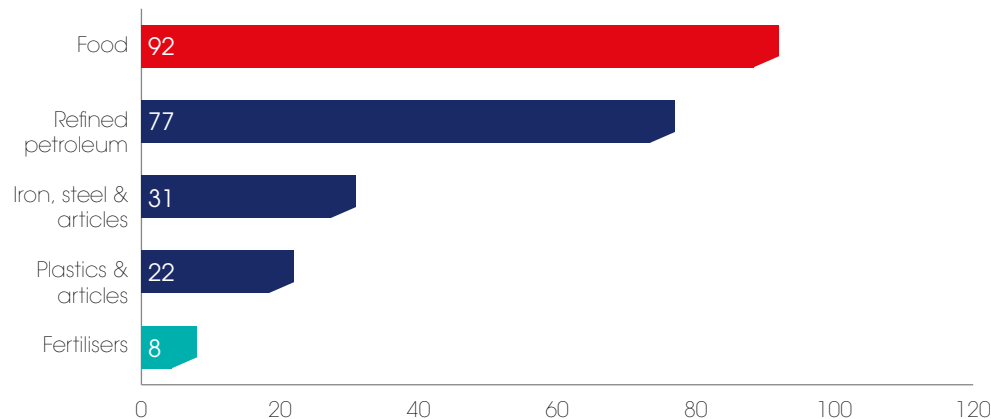
By contrast, metals, and minerals value chains remain largely stalled despite Africa's resource dominance. Across steel, aluminium, copper, and ferro-alloys, the continent continues to export raw materials while importing finished products, capturing only a fraction of the value chain. The constraint is not resource availability or demand, but the absence of enabling ecosystems, particularly affordable and reliable power, transport corridors, and coherent industrial policy. In some cases, existing capacity is itself under pressure, underscoring that sustaining industrial capability is as important as building new capacity.

Scaling value addition, therefore, requires a shift from national strategies to coordinated regional ecosystems. Many value chains are not competitive within the confines of individual national markets, but become viable when resources, infrastructure, and demand are aggregated across borders. Aligning gas, minerals, and agricultural endowments with regional power, rail, and port corridors – and linking these to industrial demand – will be critical to building competitive value chains at scale.

1 The Mounting Cost of Africa's Lack of Industrial Transformation

Every dollar of value addition generates economic activity well beyond the factory gate. Local procurement, wages, services, logistics, and downstream fabrication create multiplier effects that raw commodity exports simply cannot match. The spread between the raw commodities that leave and the finished goods that come back represents a structural “value-addition deficit” running into hundreds of billions of dollars annually across refined fuel, processed food, steel, fertilisers, and basic chemicals (Figure 32).

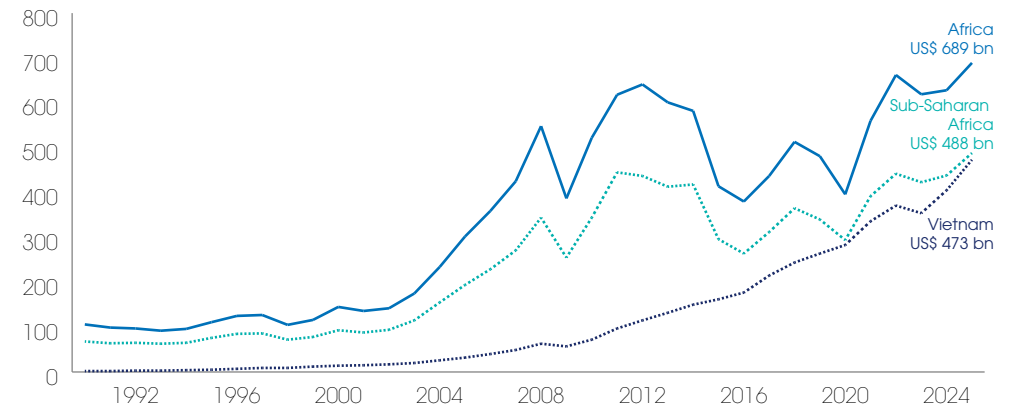
Figure 32: Africa's value-addition deficit bill totals \$230bn across five categories
Annual import bill for products that Africa could process domestically, in US\$bn



Source: UN Comtrade (latest available year). FAO Statistical Yearbook 2025

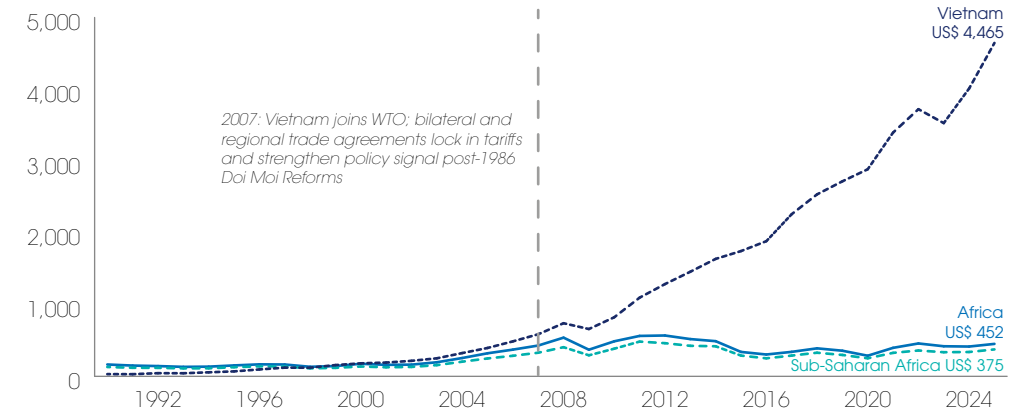
Africa's industrial gap is best understood in comparison with economies that have transformed within a single generation. Vietnam's total exports have already caught up with those of sub-Saharan Africa, and its exports far outperform the continent on a per capita basis. With a population of ~100 million versus SSA's ~1.2 billion, Vietnam generates similar export volumes, implying an order-of-magnitude gap in export intensity and a far deeper level of industrialisation and integration into global value chains (Figure 33). When combined with Thailand, these two economies export more than the entire African continent, underscoring what is achievable within two decades of sustained industrial policy and execution.

Figure 33: Vietnam exports as much value as sub-Saharan Africa...
Exports of goods and services, in current US\$ billions



Source: UNCTAD

...and its export intensity is almost 10x the entire continent of Africa
Per capita exports of goods and services, in current US\$



Source: UNCTAD; World Bank

What Africa forfeits by not industrialising is not only output – it is resilience, incomes and wealth, and macroeconomic stability. The cost of this missed opportunity is often diffused and therefore underestimated, but it is accumulating, and increasingly visible.

At one level, import dependence leaves economies exposed to repeated global shocks. At another, it constrains the creation of jobs, value, and industrial capabilities. At the macroeconomic level, it entrenches structural trade deficits, foreign exchange pressures, and fiscal vulnerability.

To fully understand the scale of this cost, it must be examined across three interlinked dimensions: supply chain resilience, microeconomic impact (firms, jobs, and industrial capabilities), and macroeconomic outcomes (trade balances, fiscal stability, and foreign exchange dynamics).

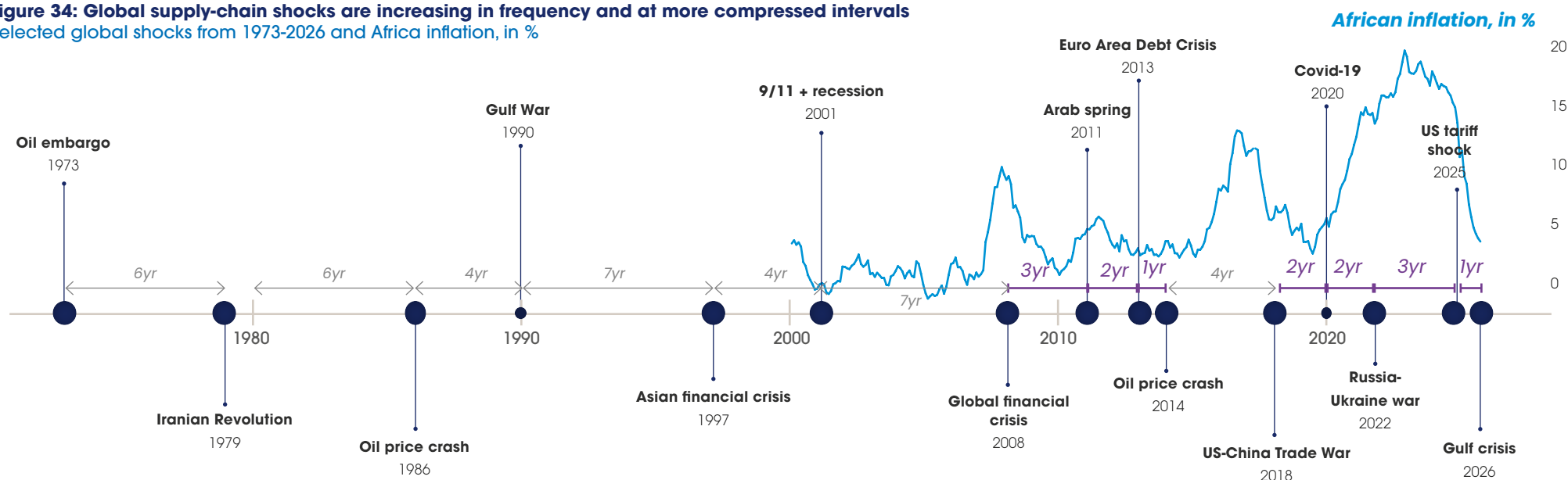
1.1. Without Supply Chain Resilience, Africa Continues to Import Inflation

Africa's import dependence exposes its economies to every global shock – and those shocks are becoming more frequent. Covid-19, the war in Ukraine, trade realignments, and the ongoing Middle East crisis have all demonstrated the economic, developmental, and human costs associated with the absence of onshore value-addition industries. Yet despite repeated upheavals, these vulnerabilities have not translated into a sustained, coordinated industrial response.

The frequency and intensity of these global disruptions are accelerating, increasing the penalty for import dependence (Figure 34). Each successive shock has reinforced the same structural weakness: Africa's reliance on imported processed goods.

The interval between the 1973 oil embargo and the 1990 Gulf War was 17 years; between the 2008 financial crisis and Covid-19 was 12 years; and between Covid and the 2026 Gulf crisis was only six years.

Figure 34: Global supply-chain shocks are increasing in frequency and at more compressed intervals
Selected global shocks from 1973-2026 and Africa inflation, in %



5 shocks in 8 years (2020-2026) – intervals now 1-3 years

Source: Haver, AFC Research

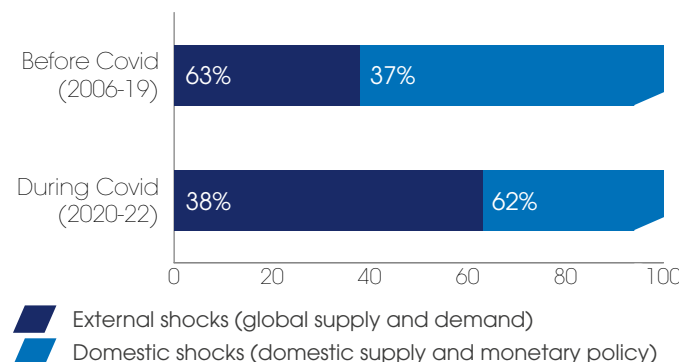
This vulnerability is systemic because Africa depends on imports across virtually every category of processed goods. The continent faces a value-addition gap of approximately US\$230 billion, including US\$8 billion in fertilisers, US\$22 billion in plastics, US\$31 billion in steel, US\$77 billion in refined petroleum, and US\$90 billion in food. Critically, no country on the continent maintains strategic petroleum reserves meeting the International Energy Agency's 90-day benchmark.

The macroeconomic transmission of these shocks is both immediate and severe, particularly on inflation. Across 37 sub-Saharan African countries, external shocks accounted for nearly two-thirds of inflation during the pandemic, up from just over one-third previously (Figure 35).¹ On the other hand, domestic supply capacity has collapsed as a stabilising force: while domestic factors accounted for around 35% of inflationary pressure, this has fallen to under 10%.² The pattern is consistent across sub-regions: global supply shocks dominate in ECOWAS and CEMAC, while global demand shocks drive inflation in SADC and EAC.

North Africa illustrates that even more diversified economies remain exposed without sufficient domestic buffers. Egypt, for example, has experienced compounded shocks – from Covid-19 to the war in Ukraine and Red Sea disruptions – driving inflation to a historic 33.9% in 2023³ through impacts on energy revenues, tourism, and food imports.

Without domestic productive capacity, economies lack the capacity to absorb external shocks.

Figure 35: External shocks nearly doubled their share of SSA inflation during the pandemic era vs. the pre-pandemic era
Aggregate inflation drivers in sub-Saharan Africa (SSA)



Source: Nsafoah, Dery & Ilori (2025), *Empirical Economics* 68:1073–1112.
<https://doi.org/10.1007/s00181-024-02666-0>

The implication is clear: economies without domestic productive capacity are structurally exposed to external shocks and import inflation. Without the ability to substitute or absorb disruptions, each global crisis transmits directly into domestic instability. The 2026 Middle East escalation is yet another reminder of these vulnerabilities. What began as a regional conflict has evolved into a multi-channel energy, trade, and financial shock – reinforcing the urgency of building resilient, domestic industrial capacity.

¹ Nsafoah, Dery & Ilori (2025), *Empirical Economics* 68:1073–1112. <https://doi.org/10.1007/s00181-024-02666-0>

² Idem.

³ <https://www.al-monitor.com/originals/2023/04/inflation-hits-339-egypt-food-prices-surge>

1.2. The Loss of Jobs, Margins, and Industrial Capabilities

At micro-level, value addition determines where jobs, income, and industrial capabilities are created – or lost. It shapes firm-level margins, household income, and the formation of industrial clusters, including the demand linkages that sustain broader economic ecosystems.

The absence of value addition results in significant economic leakage across the value chain. This includes not only lost wages and employment, but also the forfeiture of downstream industries and services that typically emerge around industrial activity.

The aluminium value chain illustrates this leakage starkly. Our 2024 State of Africa's Infrastructure Report examined this case in depth, and we revisit it here not to re-argue it, but because it remains the clearest example of the dynamic this chapter traces across Africa's industrial commodities – where raw exports lead to foregone value addition, and the downstream jobs, and activity that accrue elsewhere. To recap, Guinea is the world's largest producer of bauxite, yet refines only 0.25% of its output, exporting raw ore primarily to China for processing and re-importing finished products (Infographic 3). By contrast, Australia converts around 20% of its bauxite into alumina, capturing significantly more value domestically.

The economic implications of this gap are substantial. Australia's aluminium industry contributes approximately US\$18 billion in value addition and supports over 75,000 full-time jobs, with 70% of this value generated in mid- and downstream activities (Figure 36). This explains why industrialised economies actively support value-added industries, even when they are not profitable on a narrow basis. Australian governments have repeatedly secured concessionary power arrangements for aluminium smelters such as Tomago⁴ and Boyne Island⁵ – the country's largest – recognising that the broader economic activity they anchor far outweighs the cost of subsidies.

⁴ <https://www.reuters.com/sustainability/climate-energy/australia-unveils-rescue-bid-rio-tintos-tomago-aluminium-smelter-2025-12-12/>

⁵ <https://www.riotinto.com/en/news/releases/2026/rio-tinto-queensland-and-commonwealth-secure-long-term-future-for-boyne-aluminium-smelter-at-gladstone>

Infographic 3: By not transforming its bauxite, Guinea forfeits significant value capture from its mineral resources

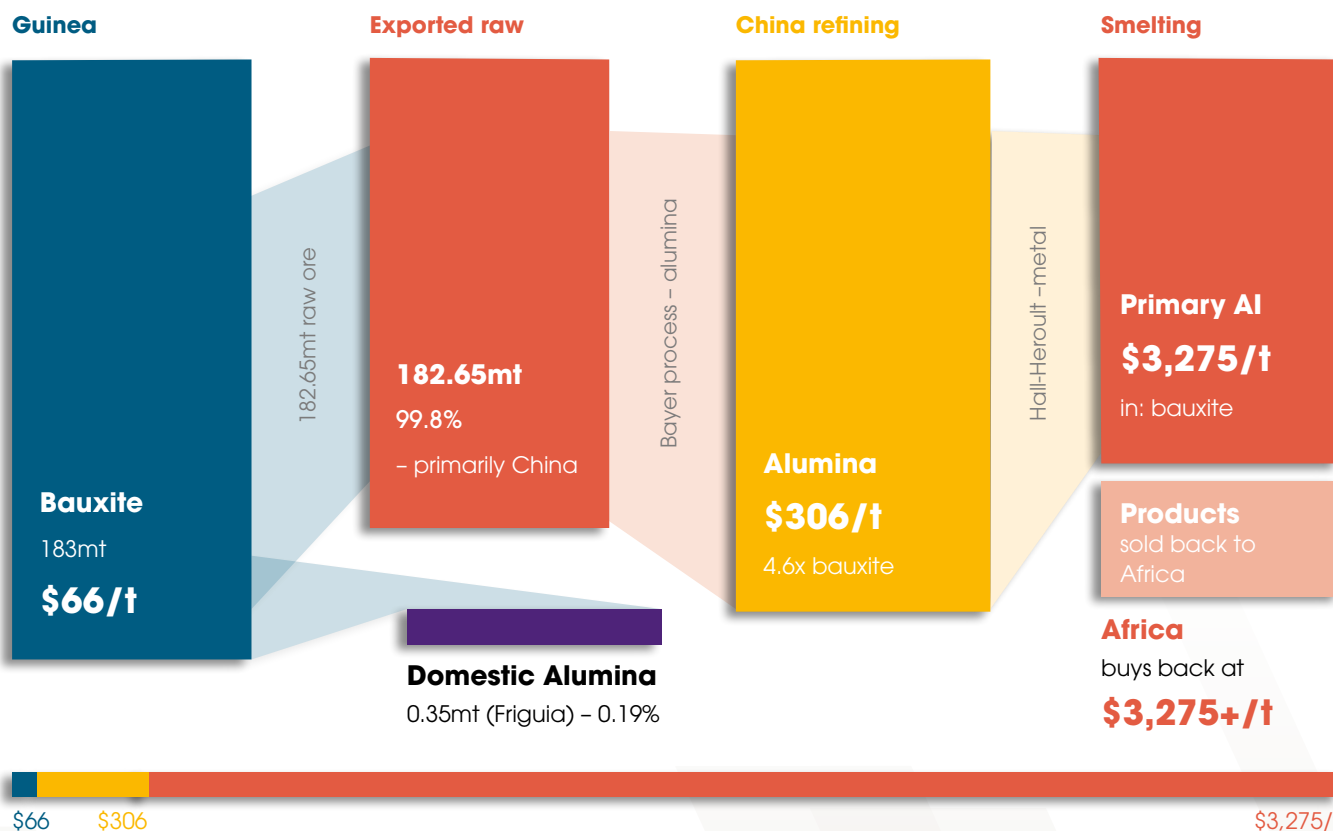
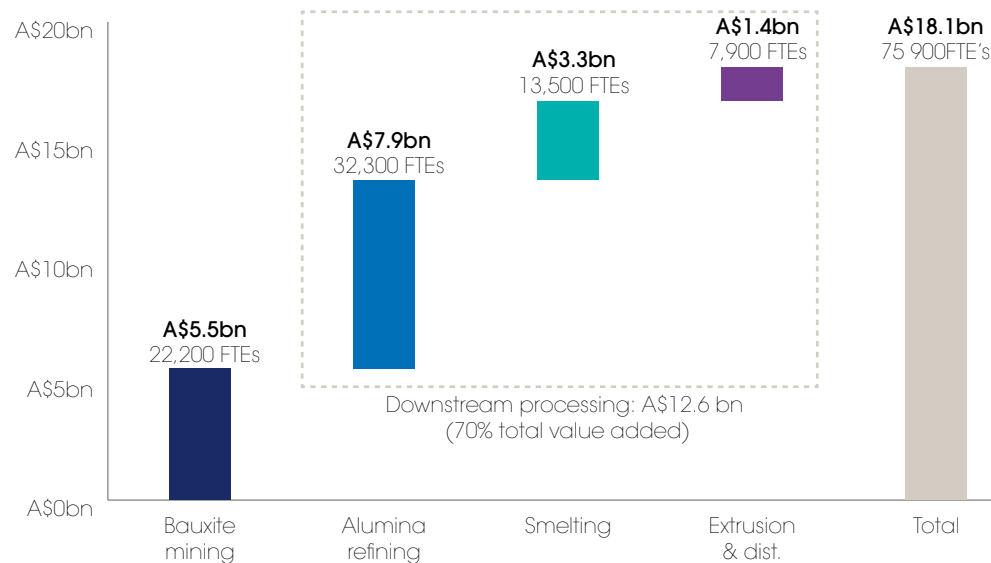


Figure 36: Mid- and downstream processing accounts for 70% of the total value added in the aluminium industry and 71% of its full-time jobs

Australia aluminium industry: value added by stage, in A\$ (2023)



FTE = Full-Time Employment

Source(s): FTI Consulting, Australian Aluminium Council

1.3. Macroeconomic Impact: from Structural Deficits to Economic Stability

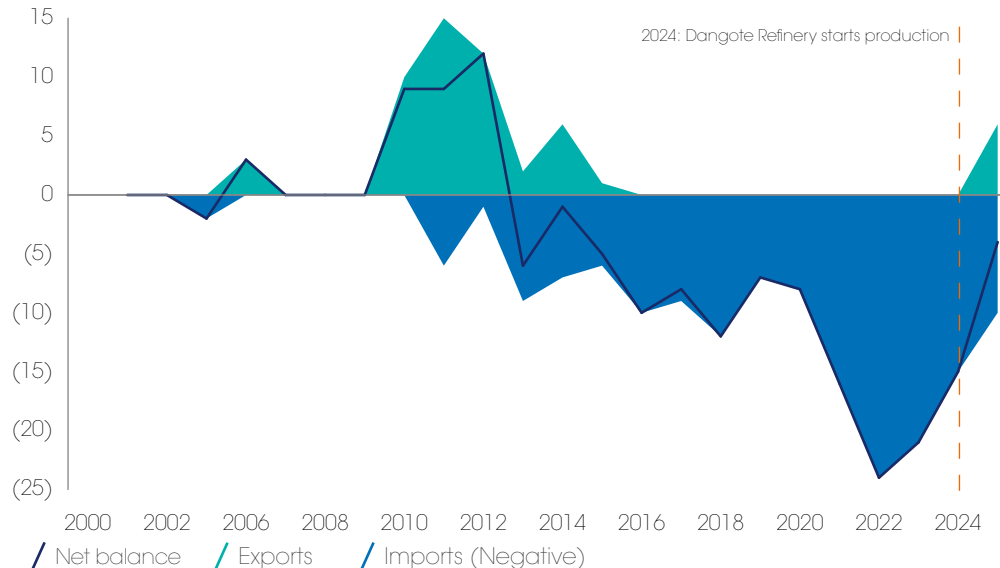
At the macroeconomic level, value addition reshapes the fundamentals of national economies. It improves trade balances, reduces foreign exchange outflows, broadens the fiscal base, and diversifies revenue away from volatile commodity exports – addressing the root causes of recurring fiscal and balance-of-payments crises.

For Africa, this is central to macroeconomic stabilisation and long-term growth. The continent's current model – exporting raw materials while importing finished goods – results in persistent FX leakage and limits job creation, even in resource-rich economies.

Nigeria provides a clear example of how value addition can alter this trajectory. For decades, the country exported crude oil and imported refined fuel. The commissioning of the Dangote Refinery from 2024 onwards, with a total capacity of 650,000 barrels per day, is beginning to shift this dynamic (Figure 37). As domestic refining ramps up, fuel imports are declining, and the petroleum trade balance is moving toward self-sufficiency.

Figure 37: The commissioning of the Dangote Refinery has transformed Nigeria's macroeconomic outlook by improving its current account balance

Nigeria's refined products trade balance, in US\$ billion



Source(s): UN Comtrade (2000-2024), Central Bank of Nigeria (2025)

The broader structural issue extends across all resource sectors. Africa exports commodities on a Free on Board (FOB) basis – bearing inland transport and logistics costs – while importing finished goods on a Cost, Insurance, and Freight (CIF) basis – paying again for shipping, insurance, and risk premiums.

The result is a structural imbalance in which Africa effectively pays twice while capturing minimal value. The continent subsidises global value chains while retaining only a marginal share of the economic value they generate.

Each step of value addition that occurs domestically reverses this dynamic, and the impact goes beyond job creation. It substitutes foreign exchange outflows with domestic economic activity, strengthens industrial ecosystems, and fundamentally shifts how economies generate and retain value.

Africa Finance Corporation (2026). *Compendium of Africa's Strategic Minerals*

2 African Industrialisation Takes Root Where Demand, Resource, Infrastructure, and Policy Align

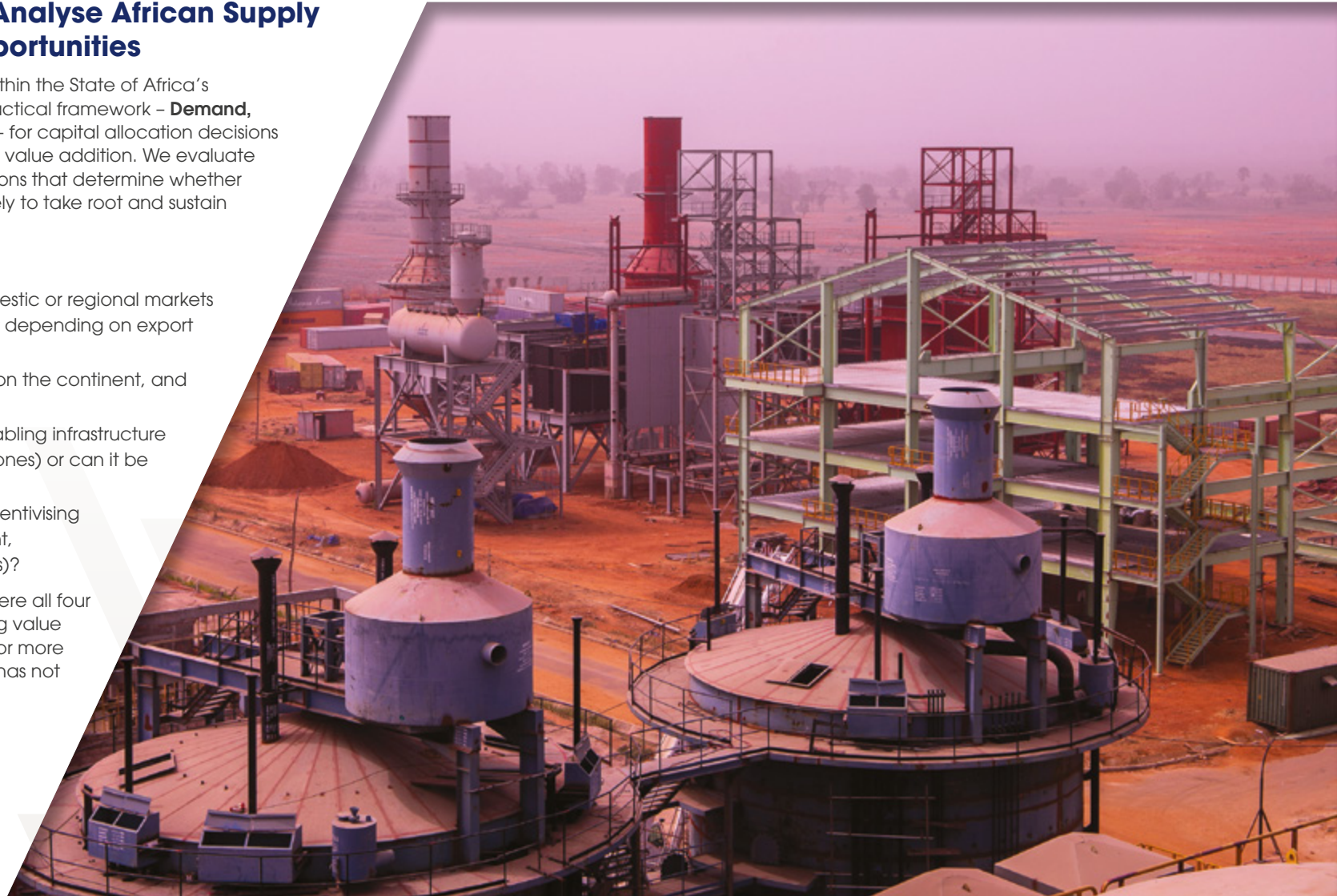
2.1. A New Framework to Analyse African Supply Chains Gaps and Opportunities

Building on our previous work published within the State of Africa's Infrastructure Report, we also lay out a practical framework – **Demand, Resource, Infrastructure and Policy (DRIP)** – for capital allocation decisions that should underpin Africa's approach to value addition. We evaluate selected value chains against four conditions that determine whether African value-addition investments are likely to take root and sustain themselves over time.

They are –

- **Demand Fundamentals:** Are there domestic or regional markets large enough to anchor offtake without depending on export competitiveness from day one?
- **Resource proximity:** Is the raw material on the continent, and is it accessible at a competitive cost?
- **Infrastructure ecosystems:** Does the enabling infrastructure exist (power, logistics, water, industrial zones) or can it be built alongside the asset?
- **Policy signal:** Is there a protective or incentivising policy environment (tariffs, local content, concessionary power, export restrictions)?

Back testing this framework shows that where all four conditions align, industrial growth targeting value addition has taken root firmly. Where one or more are missing, it helps explain why potential has not been converted.



**Table 2: Infrastructure gaps are the major constraints to the expansion of Africa's industrial supply chains**

AFC DRIP Framework for value chain assessment

Value Chain	Demand Fundamentals	Resource Proximity	Infrastructure Gaps	Policy Environment	Score
Cement	- World's fastest urbanisation with 717 million people added to African cities by 2050. - Housing + infrastructure = natural captive market.	- Clinker, limestone, and clay plentiful across continent. - Coal/gas accessible to support processing.	- Quarry-to-kiln-to-port logistics built. - Rail/road distribution needs strengthening in landlocked markets.	- Policy support consistent across multiple countries. - Import tariffs protected early capacity. - Local content drove investment.	90%
Fertilisers	- Lower fertiliser consumption in the world (35 kg/ha) with strong upside (world: 140 kg/ha). 2.5 billion population by 2050 facing soaring food imports.	- Phosphates: North Africa, Gulf of Guinea. - Nitrogen (gas): North, West, and Southern Africa. - Potash (limited): Horn of Africa, Gulf of Guinea.	- Weak distribution logistics across the continent. - Phosphates: successful infrastructure integration in North Africa. - Urea: midstream gas infrastructure gaps across SSA.	- Continental Plan in place (2006 Abuja Declaration,⁶ 2024 Nairobi Declaration).⁷ - Emergence of continental champions (OCP, Dangote Fertiliser).	78%
Refining	Demand for refined products to grow by 56% by 2040.⁸	Crude oil abundant in North Africa and across Atlantic coast.	- Ageing refineries require US\$16 billion brownfield investment. - Port/pipeline/storage gaps.	Regulatory uncertainty, subsidy regimes inconsistent across continent.	75%
Agro-processing	- Africa imports ~US\$92 billion worth of food annually. - Demand will accelerate along with population growth (+1 billion by 2050).	60% of world's uncultivated arable land. - Diverse crops across all climatic zones.	30-50% post-harvest losses due to weak rural feeder roads, absence of cold chain infrastructure, and insufficient warehousing.	Lack of continental framework but growth of agro-processing zones (Nigeria, Ethiopia, Kenya).	60%
Cocoa processing	- Low local consumption. - Export market (EU) needs certifications.	Côte d'Ivoire and Ghana: 60% of global bean production.	- Port logistics for bulk insufficient. - Agro-industrial zones underdeveloped.	Processing incentives in Côte d'Ivoire⁹ and new local processing obligation in Ghana.¹⁰	55%

⁶ The 2006 Abuja Declaration on Fertilizer for the African Green Revolution resolved to increase the level of use of fertiliser from the average of 8 kg/ha at the time to an average of at least 50 kg/ha by 2015.

See <https://www.afdb.org/en/topics-and-sectors/initiatives-partnerships/africa-fertilizer-financing-mechanism/about-affm/abuja-declaration>

⁷ <https://au.int/en/documents/20240509/nairobi-declaration-2024-africa-fertilizer-and-soil-health-summit>

⁸ CITAC.

⁹ Local processing reached 40% during Cote d'Ivoire's 2023-2024 crop season, up from 28.5% in 2016-2017. See <https://www.economie-ivoirienne.ci/activites-sectorielles/agroalimentaire.html>

¹⁰ In early 2026, the Ghanaian Cabinet directed that from the start of the 2026/2027 crop season, a minimum of 50% of cocoa beans should be processed locally. See <https://www.mofep.gov.gh/sites/default/files/news/Press-Briefing-on-Cocoa.pdf>



Value Chain	Demand Fundamentals	Resource Proximity	Infrastructure Gaps	Policy Environment	Score
Copper	Demand is strong regionally (transmission and infrastructure expansion) and globally (digitisation, energy transition, battery precursors).	Central African Copperbelt ensures resource dominance (DRC and Zambia are the 2nd and 6th world producers, respectively).	Insufficient rail and road logistics for landlocked countries; power deficit across the Copperbelt.	- No export ban or processing mandate. - Downstream value captured overseas.	53%
Aluminium	- Construction, packaging, transport, and energy systems buildout create regional demand. - But no local end-use manufacturing base.	- Guinea #1 global bauxite producer (180mt+). - Sierra Leone, Ghana, Cameroon also significant.	Power is 30-40% of smelting cost and causes severe affordability constraints without concessional tariffs.	- Lack of coordinated policy despite early signal from Guinea (alumina). - Mozal closing due to power disputes in Mozambique.	52%
Steel	- Strong demand upside (Africa: 25 kg/capita vs world 230 kg/ha), but demand is fragmented. - Strong fundamentals due to rapid urbanisation and infrastructure expansion.	Supply boom of high-grade iron ore (Simandou, South Africa, Mauritania, Liberia).	- Rail linkages missing in part of West and Central Africa. - Power unreliable or expensive.	- Fragmented demand. - Lack of continental framework. - Anti-dumping rare outside of North and South Africa.	50%
Petrochemicals	- Africa imports plastics, chemicals, and packaging at scale. - Demand large, growing with urbanisation.	Abundant gas reserves across all regions: Nigeria, Algeria, Mozambique, Tanzania, Senegal, Angola, Egypt.	Near-zero gas-to-chemicals infrastructure or related clusters outside of North Africa.	- No cluster policy outside of North Africa. - Large focus on LNG exports with a few exceptions (urea in Nigeria; methanol in Equatorial Guinea).	50%
Ferro-alloys	Strong long-term demand fundamentals, but lack of primary steelmaking base forces ferro-alloys to be processed overseas.	Africa hosts some of the world's largest reserves of manganese (South Africa, Gabon), chromium (South Africa, Zimbabwe) and cobalt (Copperbelt).	Power affordability makes processing prohibitive without concessional power tariffs.	- Lack of continental framework. - Export ban and concessional power tariffs limited (Zimbabwe).	49%

From this framework, several patterns are immediate:

1. Resource proximity never scores red.
2. Infrastructure ecosystems are the most frequent binding constraint, with eight red scores out of 10.
3. The value chains scoring green across demand and resource fundamentals are precisely the ones where investment has flowed.

2.2. Africa's Most Actionable Value Chains Sit at the Intersection of Resources, Demand, and Import Substitution

While the continent holds potential across a wide range of sectors, this report focuses deliberately on a subset of value chains where the case for immediate development is strongest. Previous editions of the State of Africa's Infrastructure Report and the Compendium of Africa's Strategic Minerals have detailed the scale, economics, and infrastructure requirements of process industries (oil refining, fertilisers, agro-processing) and metals value chains (aluminium, copper, steel), highlighting their central role in driving industrialisation, trade balance improvement, and economic diversification.

Table 3 consolidates these findings into a single view of Africa's most actionable value-addition opportunities. It brings together key sectors, indicative market sizes, and strategic enablers – providing a clear roadmap for where industrial capacity can be built at scale and where investment can unlock the greatest system-level impact.

Table 3: Near-term opportunities for selected supply chain investments in Africa

Value Chain	Near-Term Opportunity
Refining	- Brownfield rehabilitation and upgrades to expand capacity (Nigeria) or enable clean fuels production (Côte d'Ivoire, Senegal, Congo, Gabon). - Greenfield capacity additions required in Southern Africa (Angola) to balance shutdowns in South Africa and reduce import dependence in East Africa (Uganda).
Petrochemicals	Adopt cluster development model around key refining and natural gas hubs to expand downstream production of high-value chemicals (light olefins, aromatics), ammonia, and methanol.
Fertilisers	Phosphates: Africa holds 80% of global reserves but accounts for just 20% of supply. Brownfield capacity additions ongoing across North Africa (Morocco, Algeria, Tunisia, Egypt), with geographical diversification possible across West and Central Africa (Togo, Gabon, Congo). Urea: Growing gas reserves across the continent enable brownfield capacity expansions (Algeria, Egypt, Nigeria) and the development of new regional clusters in West (Ghana, Senegal), East (Ethiopia, Tanzania) and Southern Africa (Angola, Mozambique). Potash: Undeveloped reserves in the Horn of Africa, Gulf of Guinea (regional cluster Gabon/Congo), and Morocco can help address full import dependence.
Steel	Backward integration in Algeria to cut reliance on imported iron ore; development of new steel clusters based on high-grade iron ore in West Africa (Guinea, Sierra Leone, Liberia, Mauritania) and the Gulf of Guinea (Gabon, Cameroon, Congo).
Aluminium	- Maximise significant supply growth from Guinea to establish alumina refining capacity locally or within regional markets with energy available at scale (i.e. gas in Nigeria). - Promote regional supply chain development around existing aluminium smelters (Ghana, Cameroon, South Africa, Mozambique).
Copper	- Unlock high-grade copper resources with improved logistics networks, especially rail (Lobito, TAZARA) and roads. - Expand associated power infrastructure, especially transmission, to improve reliability, and affordability of power in Southern Africa.
Ferro-alloys	- Promote development of an African primary steelmaking base to re-anchor ferro-alloy demand on African long-term demand fundamentals and infrastructure build out. - Position Africa as an alternative supply chain for high-value products and markets not linked to the steel economy (electrolytic manganese metal, battery-grade manganese sulphate, etc.).

Source: State of Africa Infrastructure Reports 2024 & 2025

The remainder of this chapter examines these lenses in more detail and applies this framework to the value chains where Africa's endowments are strongest, and the cost of inaction is highest.

3 Refining and Fertilisers Industries Are Gaining Traction but Require Scale and Diversification

Africa's industrialisation trajectory is not uniform – some sectors are gaining momentum while others are struggling to hold ground. Understanding what is working – and what is not – is critical to prioritising the next phase of industrial development.

Process industries such as refining and fertilisers are beginning to scale, demonstrating that large-scale value addition is achievable on the continent. New capacity is reducing import dependence and anchoring domestic supply, but growth remains geographically concentrated. The next phase will require broader spatial distribution of assets, additional downstream integration, and stronger regional trade integration.

3.1. Refining: Progress Is Real – but Closing Africa's Fuel Gap Requires Both New Hubs and Better Performance of Existing Assets

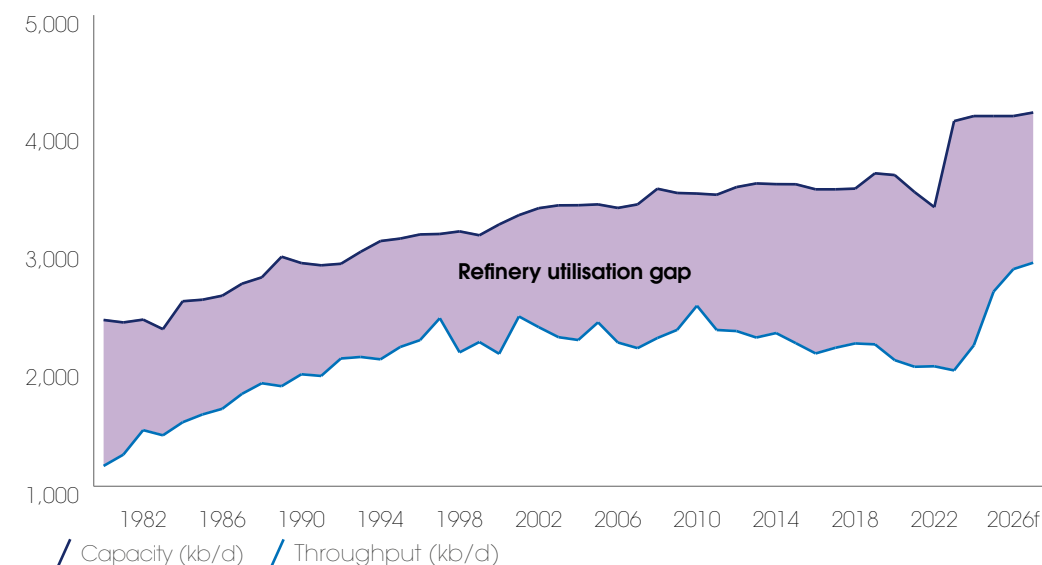
Africa's refining story has begun to shift from chronic dependence toward the first signs of structural self-sufficiency. The commissioning of the Dangote Refinery marks a turning point for West Africa and the Atlantic coast in general, demonstrating that large-scale, world-class refining capacity can be built and operated on the continent.

The contrast with Southern and East Africa highlights the urgency of closing remaining gaps. The escalation of the conflict in the Middle East in 2026 has once again exposed the vulnerability of import-dependent regions, particularly in East Africa, where there are no large-scale refining hubs (see *Section 3: Energy*). With a population exceeding 400 million and no functioning refinery base, the region remains fully exposed to disruptions in global supply routes and pricing shocks, underscoring the strategic case for establishing a refining hub anchored in regional demand.

Despite recent progress, Africa's refining systems also underperform relative to their installed capacity. While the continent has sufficient nameplate capacity to meet a large share of its fuel demand, actual throughput remains significantly below potential (Figure 38) due to operational inefficiencies, ageing infrastructure or facility closures (Nigeria, Libya, Sudan, South Africa). Prior AFC analysis showed that imports accounted for 55% of demand in 2023, despite the theoretical ability to reduce this to near 10% with full utilisation of existing assets.¹¹

Figure 38: Despite significant capacity additions, Africa's refined product deficit continues to grow

Africa's refinery utilisation gap: capacity vs throughput, in thousand barrels per day (1980-2026)



Source(s): OPEC, CITAC, AFC Research

¹¹ Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.

The result is that a structural dependence will continue to deepen. Imports of petroleum products have risen from negligible levels in the 1980s to over 74 million tonnes today, reflecting both rising demand, and declining effective refining output. Even when accounting for all committed capacity additions, the continent is projected to face an import gap of approximately 86 million tonnes per year by 2040 (Figure 39). Closing this gap with domestic output would require close to three additional Dangote-sized refineries.

Figure 39: Africa's refined product deficit requires close to three 'Dangote-sized' refineries to be bridged

Africa's refined product waterfall, in million tonnes



Source(s): CITAC – Sub-Saharan Africa supply and demand short-term forecast, January 2026; Puma Energy – Fuelling Africa's Potential: Bridging the Gap in Energy Infrastructure; <https://pumaenergy.com/wp-content/uploads/2024/05/Fuelling-Africas-Potential-CITAC-Puma-Energy-Report.pdf>

Closing this gap will also require fixing what already exists. The fastest and most capital-efficient gains lie in rehabilitating and upgrading existing refineries across the continent. Many facilities – from Côte d'Ivoire's SIR to Senegal's SAR and Congo's CORAF – operate well below their potential but can be repositioned through targeted investment to upgrade units and improve operational performance.

Refineries must also be leveraged as anchors for broader industrial ecosystems, particularly petrochemicals. North African markets, such as Algeria, and Egypt, have demonstrated the potential of integrated refining and petrochemical platforms, where downstream industries capture significantly more value than fuels alone. This model is now being replicated in West Africa, with the Dangote Complex in Lekki co-locating refining and fertiliser production to maximise synergies across hydrocarbons value chains.

However, Africa's petrochemical ambition remains largely underdeveloped beyond fuels and basic fertilisers. The next frontier lies in higher-value chemical chains – particularly olefins, aromatics, ammonia, and methanol – which underpin plastics, manufacturing inputs, and industrial feedstocks. Countries with both oil and gas resources and refining capacity, such as Ghana, Nigeria, and Angola, are particularly well-positioned to develop these integrated industrial platforms.

Meeting Africa's projected fuel demand would require the equivalent of almost three Dangote-scale refineries.

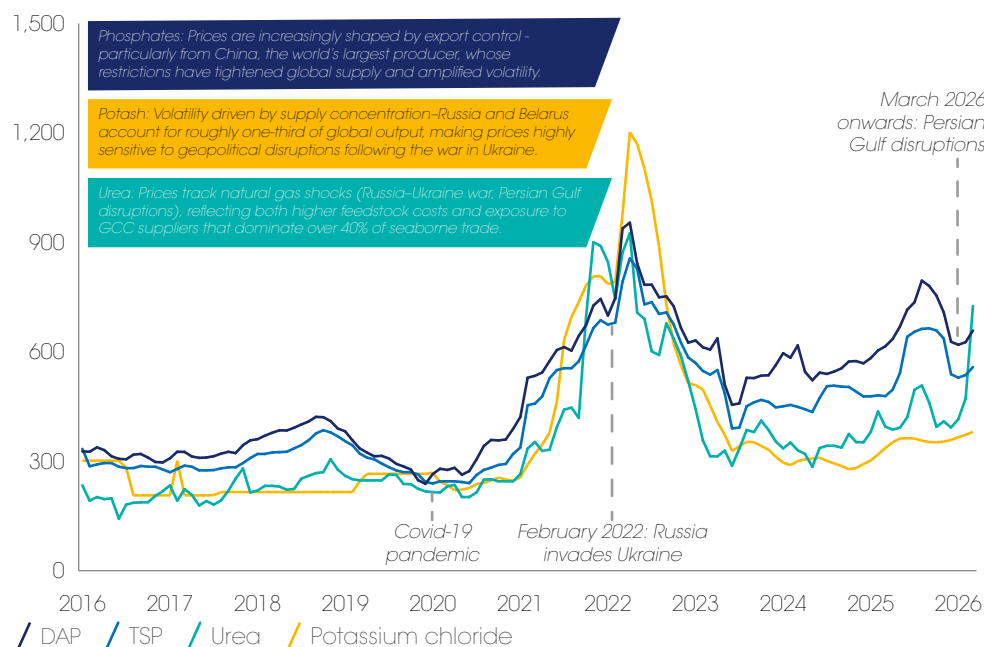
3.2. Fertilisers Offer a Scalable Path to Industrialisation, Food Security, and Import Substitution

Fertilisers represent one of Africa's clearest opportunities to convert resource endowment into industrial capability. Unlike many other value chains, the inputs, demand base, and economics are already aligned: abundant natural gas for nitrogen-based fertilisers, world-class phosphate reserves in North Africa, and a structurally undersupplied agricultural sector that depends heavily on imports.¹²

Yet Africa remains heavily dependent on external fertiliser markets – exposing its food systems to repeated global shocks.

The war in Ukraine disrupted ammonia, urea, and potash supply chains, driving sharp price increases across the continent. More recently, the escalation of the Persian Gulf crisis has again tightened global supply conditions, particularly for nitrogen-based fertilisers linked to gas markets (Figure 40).

Figure 40: Fertiliser prices have become volatile following several external shocks
Global fertiliser prices, in US\$/t



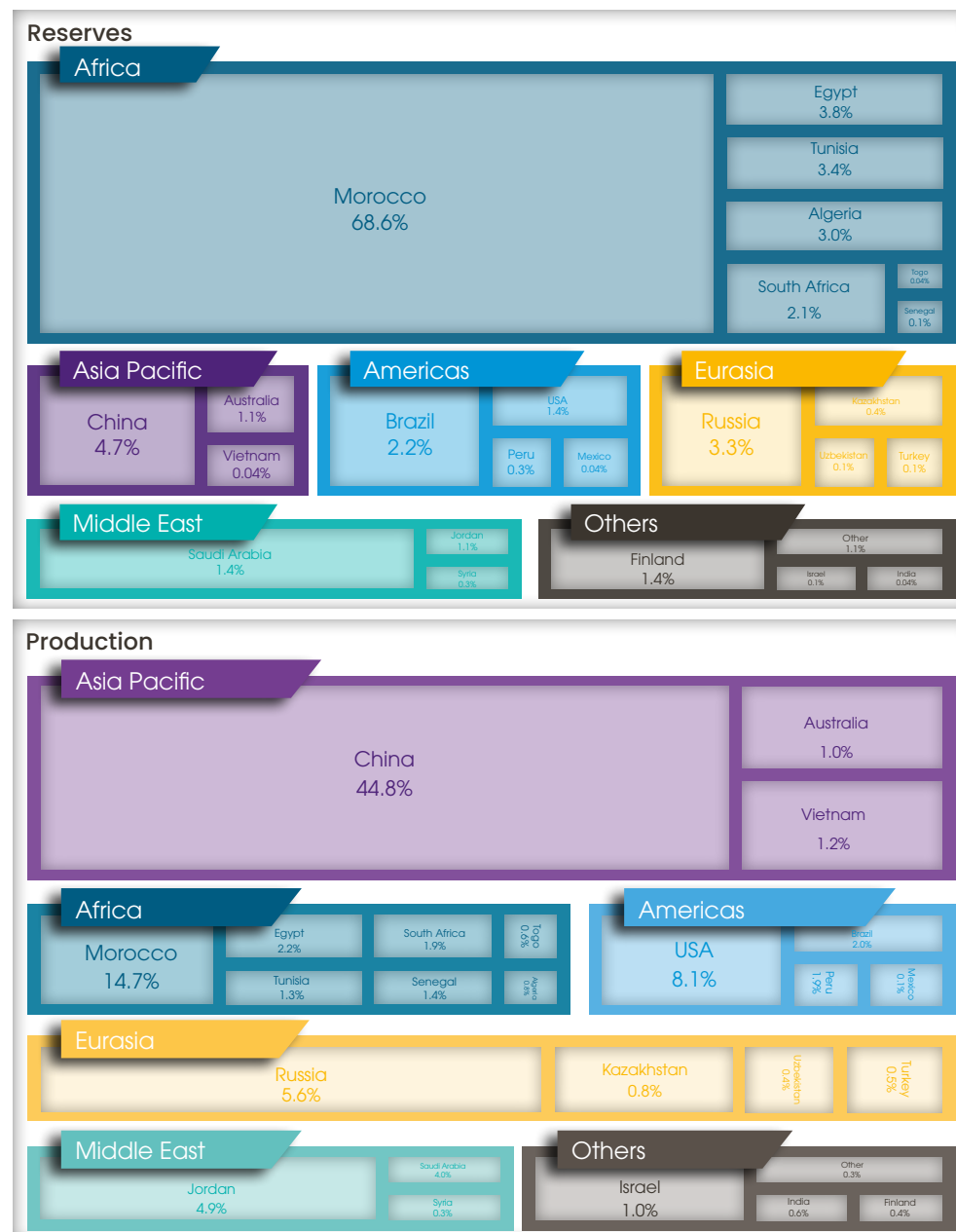
Source: World Bank

This recurring pattern highlights a structural gap: Africa has the resources to produce fertilisers at scale but lacks sufficient domestic conversion capacity. Africa concentrates 80% of the world's phosphate reserves but accounts for just 20% of supply (Figure 41), while countries such as Nigeria, Algeria, and Egypt have built large-scale ammonia and urea production capacity but largely reserved for exports.

¹² Africa Finance Corporation (2025). *State of Africa's Infrastructure Report: Mobilizing Domestic Capital*.



Figure 41: Africa's endowment in phosphates is yet to translate into a global supply position
Phosphates: share of global reserves and production by region and by country (2025)



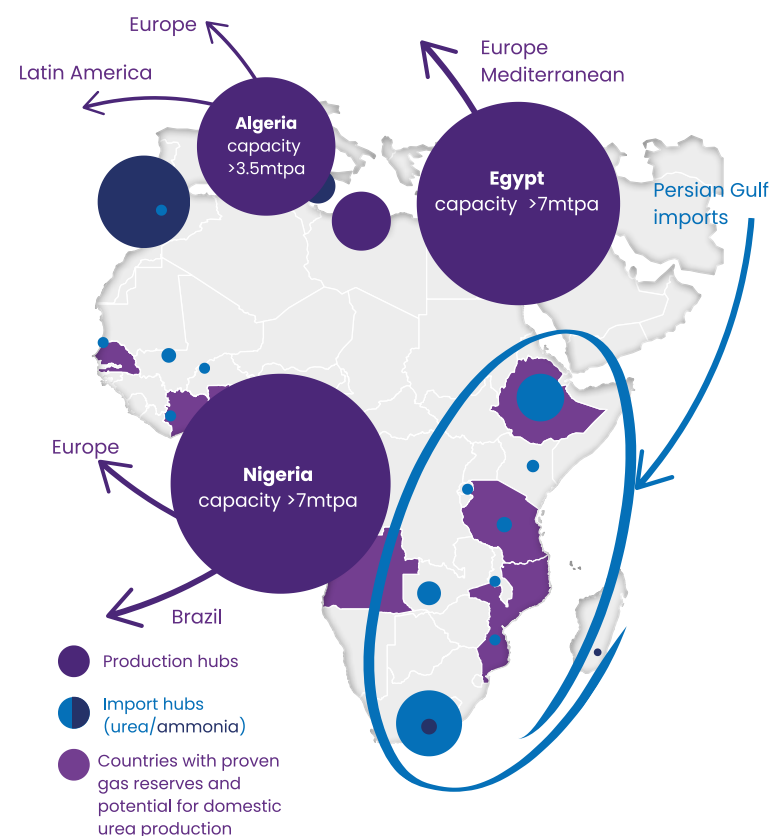
Source: AFC staff calculations based on USGS (2025): Phosphate Rocks Statistics and Information

The next phase is to scale this model beyond isolated success stories into a continent-wide industrial strategy. This requires expanding production capacity in gas-rich economies, strengthening intra-African trade in fertilisers and feedstocks, and developing integrated agro-industrial corridors that connect production with end-use markets.

New gas discoveries and industrial projects are now creating an opportunity to re-orient future projects towards regional supply. Expanding gas reserves across the continent are underpinning a new wave of fertiliser investments aimed at building geographically distributed production hubs (Map 6). Since the last edition of this report, progress has been notable. Zambia commissioned a new urea plant in 2025 based on coal gasification technology, while Angola (AMUFERT) and Ethiopia (Dangote Fertiliser) are advancing large-scale urea projects anchored in domestic gas resources.

Map 6: Export-oriented urea platforms dominate production as East and Southern Africa depend on imports

Africa's urea manufacturing hubs, import hubs, and undeveloped gas markets



Note: The size of the bubbles is proportionate to urea production and import volumes.

Source: AFC Research

4 Metals Value Chains Are Stalling as Energy Constraints and Fragmented Systems Limit Scale

In contrast to refining and fertilisers, metals beneficiation is lagging – and in some cases regressing – despite Africa’s resource abundance. Across aluminium, steel, and ferro-alloys, capacity utilisation remains weak, projects have stalled, and several legacy operations have closed or scaled down.

The constraint is not resources or demand, but the absence of enabling industrial ecosystems – most critically, reliable, and affordable power.¹³ Metals processing is inherently energy-intensive, and without stable electricity systems, competitiveness cannot be sustained.

South Africa’s ferrochrome sector illustrates both the scale of the challenge and the impact of coordinated industrial policy. The Department of Minerals and Petroleum Resources recently indicated only 11 of the country’s 66 ferrochrome smelters would remain operational at current electricity prices.¹⁴ In total, South Africa’s ferrochrome industry requires approximately 15 TWh of electricity. This is equivalent to the entire annual power consumption of neighbouring Mozambique. The introduction of a long-term industrial tariff could restore up to 74% of smelting capacity and preserve more than 11,000 jobs, highlighting how targeted interventions on power pricing can determine whether industrial capacity is lost or sustained.

Getting this right is critical because Africa’s long-term fundamentals for metals processing remain among the strongest globally. The continent combines abundant resource endowments with rapidly growing demand, but unlocking this opportunity will require moving beyond fragmented, country-level approaches. What follows shows that the constraint is systemic. In both steel and aluminium, Africa has the resources, the demand, and in some instances even partial industrial capacity, but value addition at scale will only be possible by aggregating demand, coordinating infrastructure, and aligning industrial policy at the regional level.

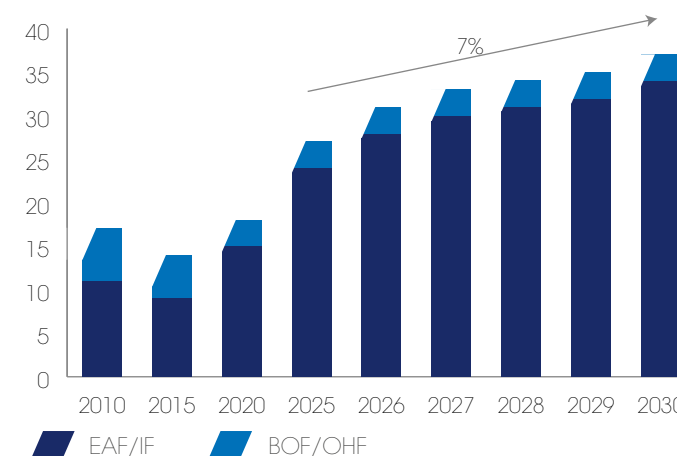
4.1. Steel: Growth Is Increasing – but in the Wrong Form to Support Large-Scale Industrialisation

Africa’s steel production is rising – but the current trajectory does not align with its long-term industrial needs.

Output reached roughly 27 million tonnes in 2024 and is projected to grow to ~37 million tonnes by 2030, implying a robust ~7% CAGR (CRU data, Figure 42). However, CRU analysis reveals that this growth will be driven overwhelmingly by fragmented electric arc furnace (EAF) capacity rather than integrated, ore-based steelmaking. This reflects a system in which demand is not pooled at a continental scale, thereby preventing the development of large, integrated steel complexes despite abundant raw materials.

Figure 42: Africa’s steel growth remains primarily driven by EAF mini-mills

African crude steel production by steelmaking technology, 2010-2030 Mt



BOF = Basic Oxygen Furnace; OHF = Open Hearth Furnace; EAF = Electric Arc Furnace; IF = Induction Furnace

Source: CRU Crude Steel Market Outlook January 2026

¹³ Africa Finance Corporation (2026). Compendium of Africa’s Strategic Minerals.

¹⁴ <https://www.dmr.gov.za/Portals/0/Images/slider/Factsheet-Smelters.pdf>

The expansion of Africa's EAF-based steel sector is a shortcut that does not address long-term steel demand. EAF-based steelmaking requires lower upfront capital, operates at a smaller scale, and adapts well to Africa's fragmented and volatile demand landscape. For construction-grade long products such as rebar and wire rod, this model is effective, and has supported initial capacity growth across the continent.

But EAF-led growth has structural limits that will constrain Africa's steel competitiveness over time.

The first is cost. Steelmaking in Africa – across both EAF and primary routes – is structurally disadvantaged by high and unreliable power, as well as elevated input and logistics costs. CRU data shows purchased electricity accounts for ~15% of steelmaking site costs in Africa versus ~8% globally – and reaches as high as 31% in South Africa (Figure 43). Iron ore accounts for ~44% of costs compared to a global average of ~33%, reflecting inefficiencies in processing, and logistics. These cost pressures are systemic and, on current trajectories, are expected to worsen through 2030.

The second constraint is feedstock – and this goes to the core of Africa's steel strategy. EAF production depends heavily on scrap, yet Africa's scrap availability is structurally limited. Unlike North America, Europe, and parts of Asia, which accumulated large scrap stocks over decades of industrialisation, Africa lacks this legacy base. As a result, the continent cannot follow the global transition toward scrap- and DRI-based steelmaking.

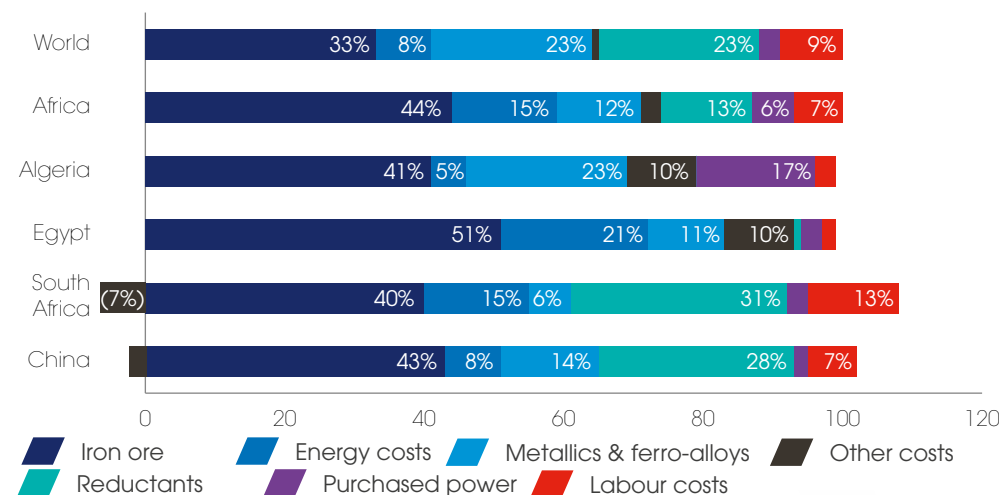
The limits of EAF-based growth are a clear call to reshape Africa's steel strategy.

A recent McKinsey & Company analysis found that by 2035, sub-Saharan Africa will be one of the few regions where primary, ore-based metalics must increase as a share of the steelmaking mix – simply because scrap supply cannot keep pace with demand growth.¹⁵

This also reflects the next stage of Africa's industrialisation. Moving beyond construction-grade long products into higher-value flat steel – used in automotive, machinery, and appliances – requires tighter quality specifications that cannot be consistently met with high scrap content. Scaling these segments will therefore require ore-based inputs such as pig iron, hot-briquetted iron (HBI), or direct-reduced iron (DRI).

Figure 43: Africa's steel competitiveness is constrained by high energy and power costs

Crude steel site cost production by driver in 2025, in US\$/t



Note: Higher iron ore costs in Egypt are due to dependence on imported iron ore.

Source: CRU Asset Platform

This provides a strategic opportunity to align steelmaking with Africa's resource base.

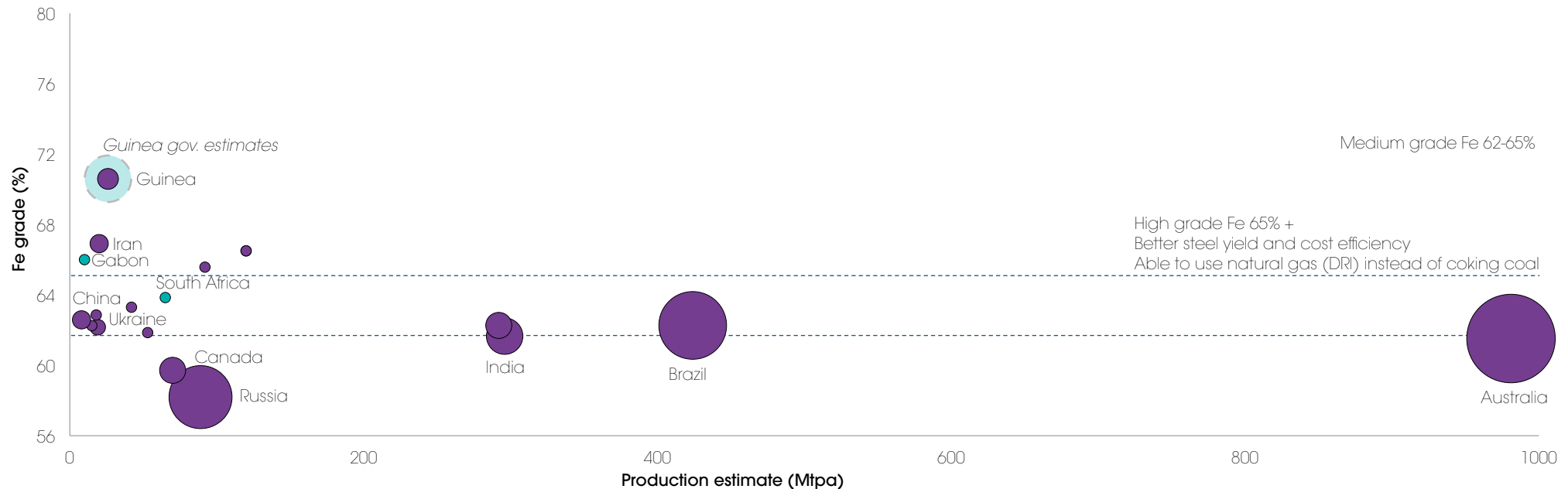
Countries such as Guinea, Gabon, and South Africa host some of the world's highest-grade iron ore deposits (62-66% Fe), well-suited for direct reduction processes (Figure 44). Combined with access to natural gas across large parts of the continent, this creates a pathway for DRI-based steelmaking that bypasses the need for coking coal – one of Africa's key structural constraints.

The timing also reinforces the opportunity. Iron ore supply is entering a new growth cycle, with production recovering to ~100 million tonnes and expected to exceed 200 million tonnes by 2030.¹⁶

¹⁵ McKinsey & Company (February 2026). *The role of Africa in the future green steel value chain*. A presentation delivered on 10 February 2026 during a roundtable convened by AFC during Mining Indaba 2026.

¹⁶ Africa Finance Corporation (2026). *Compendium of Africa's Strategic Minerals*.

Figure 44: Africa's iron ore is among the highest grade globally and ideally suited to DRI steelmaking without coal
Steel production, in million tonnes and reserve grades, in % of Fe content



Note: Bubbles represent the estimated reserve size of deposits; Guinea reserves used include both primary source (Government of Guinea) and secondary source (USGS).
Source(s): USGS, Genmin Group, AFC Research

But capturing this opportunity will require building regional steel corridors anchored in resource complementarities.

Ore-rich countries in West and Central Africa are geographically proximate to major gas producers such as Nigeria, creating the conditions for integrated mine-to-metal industrial systems – if supported by the right power, transport, and policy frameworks.

This ultimately requires a shift in how steel investments are evaluated. While integrated steelmaking carries higher upfront costs, the long-term economic returns from import substitution, industrial development, and ecosystem formation far outweigh the initial premium. Every industrialised economy has followed this trajectory.

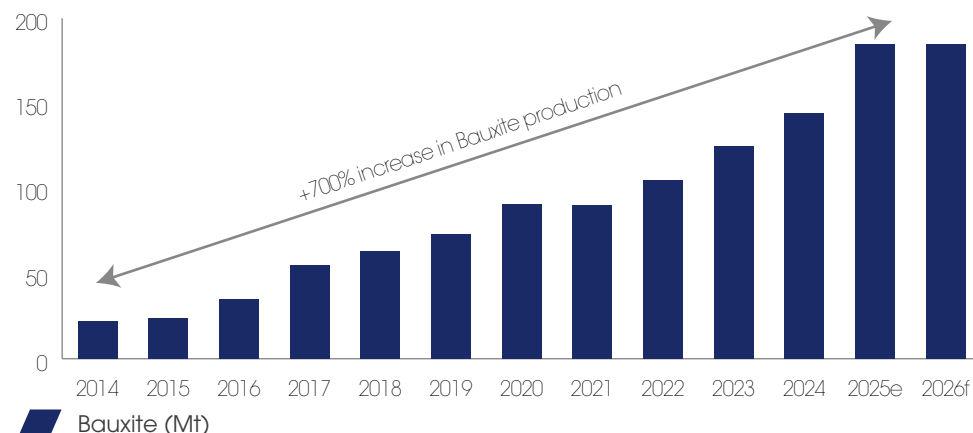
4.2. Aluminium Is Regressing Where Power Systems Cannot Sustain Smelting

Africa's aluminium value chain illustrates a deeper challenge – progress in upstream processing alongside regression in downstream industrial capacity. The continent holds some of the world's largest bauxite reserves, particularly in Guinea, and has made initial strides in alumina refining. Yet this has not translated into a sustained or expanding aluminium smelting base.

In fact, recent developments point to a reversal rather than progress. The closure of the Mozal Aluminium Smelter in Mozambique from 2026 amid rising global aluminium prices underscores the fragility of Africa's smelting industry (Figure 45). The constraint is not technical efficiency, but the economics of power.¹⁷ Data from the International Aluminium Institute (IAI) shows that aluminium smelting consumes approximately 14 MWh per tonne. Africa's existing smelters – Mozal in Mozambique and Hillside in South Africa – operate at roughly 14.2 MWh per tonne, in line with global benchmarks. The issue is therefore not performance, but the scarcity of locations that can deliver affordable electricity at scale and guarantee it for over 20 years, which is required for economic viability.

The contrast with upstream momentum is striking, and recent global disruptions highlight the urgency of closing this gap. The escalation of conflict in the Gulf has taken an estimated 3-3.5% of global primary aluminium production offline, with damage to smelters in the UAE and Bahrain. As a result, LME prices have surged above US\$3,500 per tonne¹⁸ – the highest levels since 2022.

Figure 45: African bauxite production is soaring, ...
Bauxite production, in metric tonnes

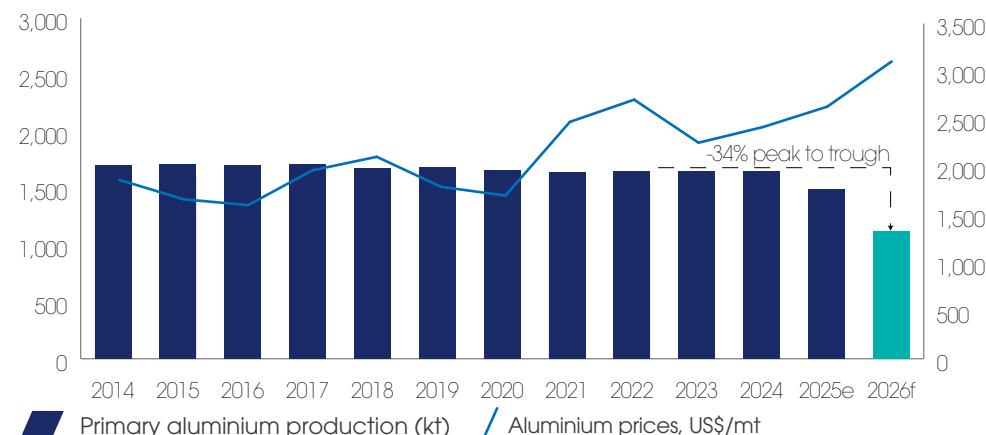


Source: Africa Finance Corporation (2026). *Compendium of Africa's Strategic Minerals*, World Bank Commodity Prices

Africa's industrialisation is a question of execution at scale. The evidence across this section is clear: where demand, resources, infrastructure, and policy align – as in cement, fertilisers, and increasingly refining – value addition takes root and delivers resilience, competitiveness, and macroeconomic stability. Where these systems remain fragmented, as in metals, even strong fundamentals fail to translate into industrial capacity. The next phase of Africa's industrialisation will therefore be defined not by isolated projects but by the ability to build integrated value chains operating at a regional scale.

Africa's position in this context exposes the cost of not industrialising. The continent sits on both sides of the disruption: exporting bauxite into weakening upstream markets as demand softens, while importing finished aluminium products at sharply rising prices. This is the worst of both worlds – and a direct consequence of having no meaningful processing position in the value chain.

... but aluminium output has stalled
Aluminium production in '000 tonnes (right axis) and aluminium prices in US\$/t (left axis)



This requires a shift from national ambition to coordinated regional execution. Aggregating demand, aligning power and transport infrastructure, and leveraging complementarities across gas, minerals, and agricultural systems will be critical to unlocking competitive industries. The opportunity is immediate and actionable: the value chains are known, the resource base is proven, and the cost of inaction is rising. What is now required is deliberate coordination between governments, investors, and industrial players to build the systems that allow Africa to process what it produces – and retain the value it creates.

¹⁷ See AFC (2026), *Compendium of Africa's Strategic Minerals*, Bauxite entry and "Energy Remains a Binding Constraint on Africa's Minerals Value Chains."

¹⁸ <https://www.lme.com/metals/non-ferrous/lme-aluminium>



Digital Infrastructure

From Connectivity to Integrated Digital Systems

- Africa has largely solved for international connectivity – now the opportunity lies in building the missing middle. While subsea capacity has expanded rapidly, terrestrial backbone networks, metro fibre, data centres, and Internet Exchange Points remain underdeveloped, limiting the conversion of bandwidth into economic activity.
- The next phase is about layering: from infrastructure provision to functioning economic systems. Digital transformation depends on the full stack – international gateways, national backbones, metro networks, data infrastructure, and enterprise platforms operating together as an integrated system capable of supporting production, services and trade.
- Connectivity alone does not create productivity or jobs. Despite significant increases in available bandwidth, gaps in middle- and upper-layer infrastructure have constrained the translation of digital access into industrial output, services exports, and employment at scale.
- The “missing middle” represents the largest and most immediate investment opportunity. Scaling fibre backbones, cross-border links, Internet Exchange Points, and data centre capacity can unlock domestic traffic, reduce costs, and enable scalable digital businesses.
- To quantify this “missing middle”, we apply an analytical framework linking growth in fixed broadband subscriptions to digitally delivered services (DDS) exports per capita, assessing how connectivity translates into economic value. The findings point to significant upside: countries that have successfully converted connectivity into productivity – such as Ghana, where DDS exports reach 6.3% of GDP (on par with India and above the Philippines) – illustrate the scale of opportunity. If Africa’s ten largest economies matched this level, DDS exports could increase from ~US\$29 billion to ~US\$127 billion annually, unlocking nearly US\$100 billion in additional value.



Building Digital Ecosystems to Power Productivity, Job Creation and Economic Transformation in Africa

Africa's digital transformation has entered a new phase. The continent has made significant progress in building the foundations of connectivity – international bandwidth has surged, fibre networks have expanded rapidly, and data centre investment is accelerating. Yet this expansion has not translated into proportional gains in productivity, employment, or economic output.

A central paradox now defines Africa's digital economy: infrastructure is being built faster than it is being used.

Despite mobile broadband coverage exceeding 85% of the population, the usage gap has widened to 64%, with nearly one billion people living within network coverage but not using it. Data centre capacity is expanding rapidly, yet outside mature markets utilisation remains low. Across countries, there is no clear relationship between connectivity expansion and growth in digitally delivered services exports. The constraint is no longer primarily physical access; it is the absence of the systems that convert connectivity into economic value.

This chapter identifies this constraint as the “missing middle” – the platforms, services, skills, and institutions that enable firms to use digital infrastructure productively. Without this layer, infrastructure does not translate into productivity gains, export growth, or job creation.

Addressing this constraint requires a fundamental shift in strategy. The priority is no longer to build infrastructure in isolation, but to deliberately develop full-stack digital ecosystems that can integrate connectivity with digital public infrastructure, enterprise platforms, skills, and innovation systems.

Where these layers develop together, digital infrastructure becomes a driver of productivity growth and employment. Where they do not, it remains underutilised capital.

The scale of the opportunity is substantial. If Africa's largest economies matched the digital export intensity already achieved by leading performers on the continent, digitally delivered services exports could increase by up to \$100 billion annually.

Digital infrastructure is therefore no longer a connectivity agenda – it is a core economic strategy, and a primary mechanism through which productivity gains, firm growth, and job creation can be delivered across the economy.

1 Moving from Connectivity to Productivity

Africa's digital infrastructure story is entering a new phase. The 2024 report focused on closing the connectivity gap, documenting the scale of investment required in subsea cables, fibre networks, and mobile infrastructure. The 2025 report advanced the analysis by examining how digital infrastructure is scaling, with expanding data centre capacity, cloud services, and early platform development. This chapter builds directly on that evolution – but shifts the focus to what is missing and should come next.

1.1. A New Growth Model for a New Economic Era

If the first phase was about building connectivity, and the second about scaling infrastructure, the third is about ensuring that connectivity translates into productivity and job creation. The central challenge is no longer access alone; it is whether digital infrastructure is being used in ways that raise output, expand employment, and improve job quality across the economy. Addressing this challenge is critical for how Africa positions its development model going forward.

This shift is critical because it reflects a broader change in the global economy. Rapid advances in automation and technology are compressing traditional industrialisation models and reducing the job intensity of manufacturing, narrowing the window for late industrialisers to replicate past growth experiences.¹ Africa cannot rely on industrialisation alone to generate the scale of jobs required for its growing labour force.

Growth must therefore increasingly come from raising productivity in the sectors that already employ the majority of Africans. SMEs and the informal economy account for between 50-80% of economic activity² and the overwhelming share of employment, spanning agriculture, services, trade, and logistics. The challenge is to increase productivity, incomes, and job quality within these existing firms, while enabling them to scale and generate new employment.

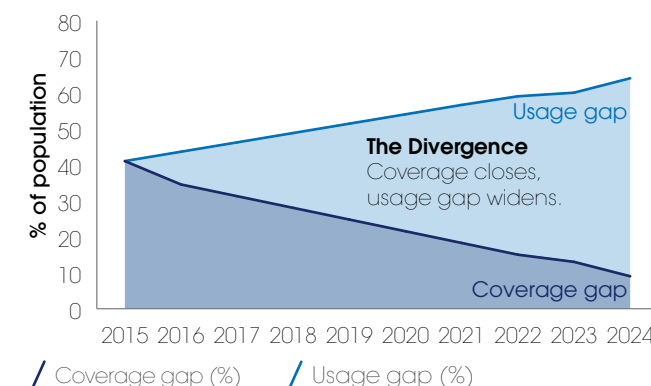
This fundamentally redefines the role of digital infrastructure, taking it beyond mere connectivity. By enabling firms to access markets, reduce transaction costs, improve efficiency, and adopt new technologies, digital infrastructure has become a primary mechanism for delivering productivity gains across the economy.

1.2. The Three Layers Approach is a Key Framework to Analyse Africa's Digital Gap

Globally, digital ecosystems operate across three interdependent layers: infrastructure (cables, fibre, towers, data centres), platforms (payments, cloud, digital identity, data systems), and innovation (firms, applications, and enterprise use).

In Africa, investment to date has been concentrated in the first of these layers, reflecting the historical priority of expanding connectivity. Fibre networks have expanded, subsea cable capacity has increased, and data centre investment is accelerating. Yet access and usage remain far below potential compared to other regions of the world. A persistent usage gap, now reaching 64%, reflects a deeper structural issue: infrastructure is being built faster than it is being used (Figure 46).

Figure 46: Africa's digital future is moving from an infrastructure gap to a systems gap
Mobile internet in Africa: coverage gap vs. usage gap, in %



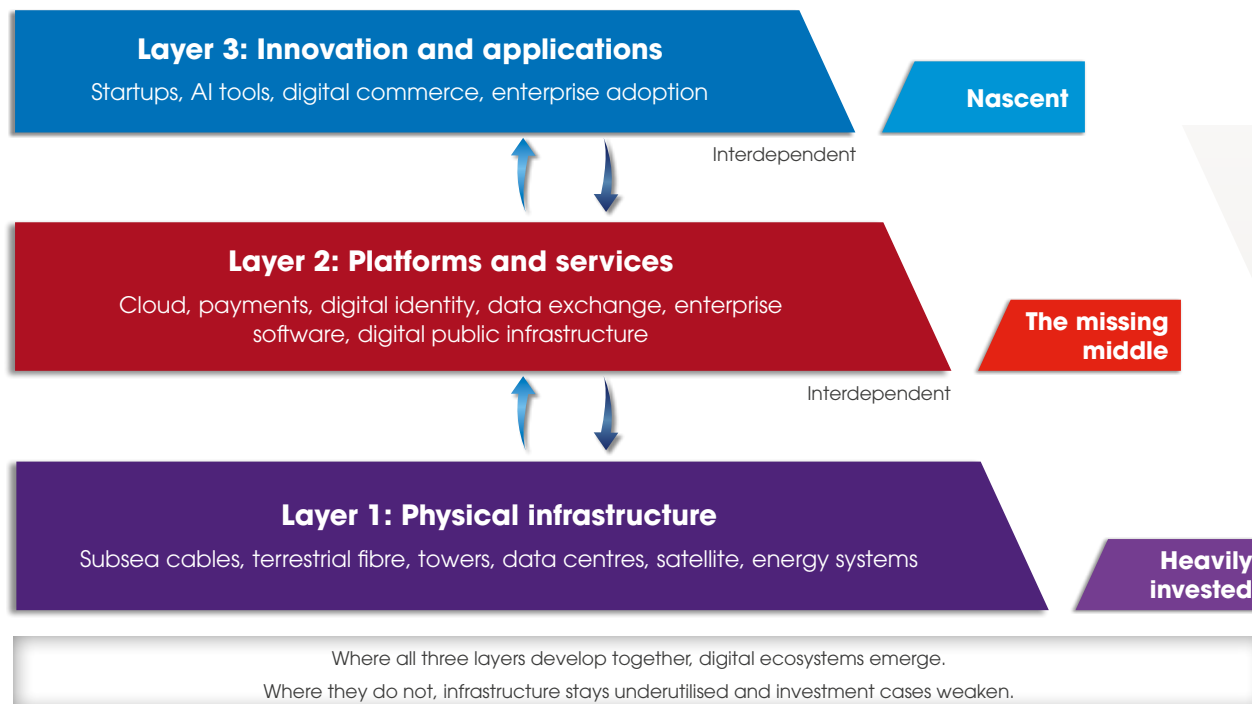
The growing utilisation gap reveals that the constraint no longer lies in physical access alone, but in the absence of the systems that translate connectivity into productive economic use – the platforms, services, skills, and institutions that enable firms to operate digitally at scale. Without this “missing middle”, infrastructure does not generate productivity gains or employment (see Infographic 4).

¹ Coulibaly, Ibrahim and Qureshi, Zia (2024). *Growth, Work and Inequality in the Digital Era: Harnessing Technology for Inclusive Prosperity*. The Brookings Institution.

² UNDP (2023). *Baseline Study on Informal Economy in the African, Caribbean, and Pacific Regions*. Global Report.

Infographic 4: Investments in Africa's digital economy have largely concentrated on the base, leaving the value-generating layers underdeveloped

Africa's digital economy value chain: the three layers framework



What is required, therefore, is a shift in thinking and strategy. The priority is no longer to build infrastructure in isolation, but to develop full digital ecosystems that integrate connectivity with digital public infrastructure, enterprise platforms, skills, and innovation. This creates a coherent system capable of raising productivity, expanding employment, and improving job quality across the economy.



2 Africa's Digital Infrastructure is Expanding, but the Gains Remain Uneven

Africa has made significant progress in building the physical layer of digital infrastructure. International bandwidth has surged, fibre networks have expanded, and data centre capacity is growing across an increasing number of markets. Taken together, these developments mark a step-change in the continent's connectivity backbone.

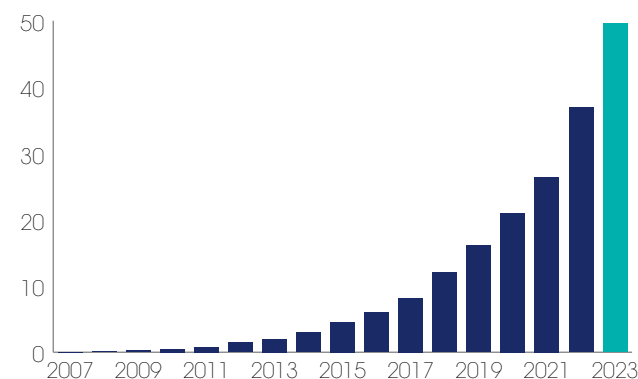
But this progress has been uneven, and its economic impact remains limited.

2.1. While Subsea Cables have Transformed Africa's Global Connectivity, the Impact Remains Concentrated at the Coast

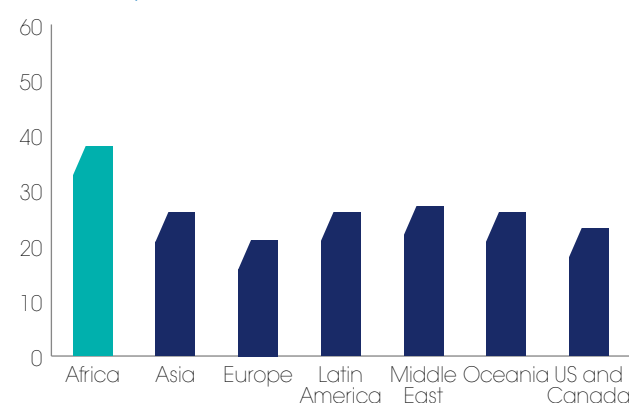
Africa's international connectivity has entered a fundamentally different phase. The completion of the 2Africa system (spanning 45,000 km and with design capacity of 180 Tbps³), alongside Google's Equiano cable (144 Tbps), has added more bandwidth to the continent's shores than all previous generations combined. With 77 cable systems active or under construction,⁴ Africa is the fastest-growing region globally for international internet bandwidth, expanding at 38% annually between 2021 and 2025 (Figure 47).⁵

Figure 47: Africa is the world's fastest-growing region for international internet bandwidth

Total inbound bandwidth into Africa, in Tbps



Compound annual growth rate of international internet bandwidth, in %



Source: Hamilton Research / TeleGeography

³ 2Africa: core system completed in November 2025 (Meta). 45,000 km, design capacity 180 Tbps, up to 16 fibre pairs. Pearls extension to Gulf scheduled for 2026. Red Sea segments delayed. Submarine networks, 2025.

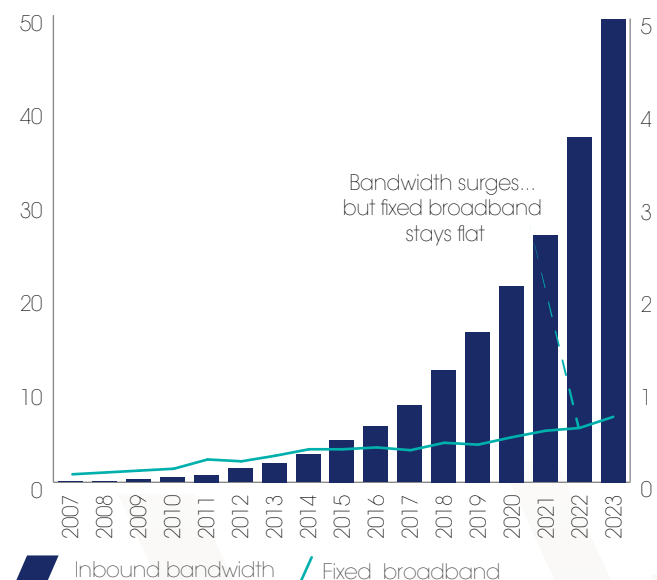
⁴ TeleGeography, 2025 Africa Telecommunications Map, February 2025. 77 cable systems active or under construction.

⁵ TeleGeography, Global Internet Geography, September 2025. Global international bandwidth 1,835 Tbps (mid-2025), 4-year CAGR 24%. Africa: fastest regional growth at 38% CAGR (2021-2025), followed by Middle East at 27%.



Yet this expansion has not translated into widespread domestic connectivity. Despite a sixfold increase in bandwidth and sustained declines in wholesale prices, fixed broadband penetration has only recently crossed one subscription per 100 inhabitants (Figure 48).⁶

Figure 48: Bandwidth access is yet to translate into meaningful broadband penetration
Total inbound bandwidth into Africa in Tbps (left axis) vs. fixed broadband penetration in subscription per 100 inhabitants (right axis)



Source: Hamilton Research / ITU

2.2. Fibre Networks are Expanding, but Remain Concentrated, Fragmented, and Insufficiently Integrated

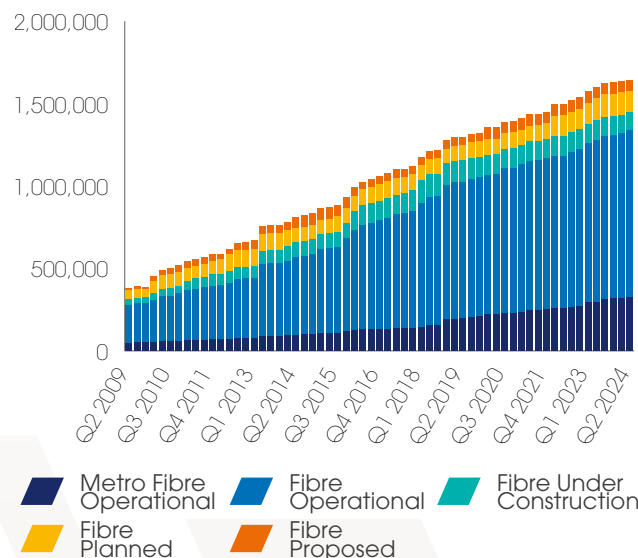
Terrestrial fibre has expanded significantly, reaching 1.3 million route-kilometres by mid-2024, nearly triple its 2014 level.⁷ Today, 62.6% of the population in sub-Saharan Africa – around 733 million people – live within 25 km of a fibre node (Figure 49).⁸

However, this expansion remains uneven. Close to 60% of the population is still more than 10 km from fibre, and deployment has slowed from 244 km per day in 2018-2019 to 159 km per day in 2023-2024.

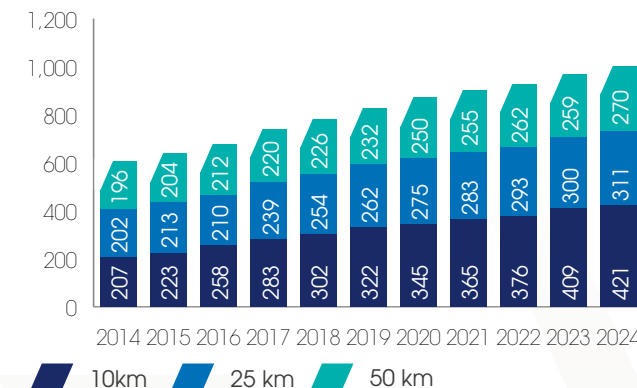
At the same time, network architecture reflects cost optimisation rather than system design. Metro networks account for nearly a quarter of total infrastructure. And the national and cross-border backbones required to distribute capacity inland remain limited, despite recent progress in maximising the use of right of way from other infrastructure, such as railways, transmission lines, and pipelines.⁹

Figure 49: Fibre deployment is slowing and remains concentrated within urban centres

Terrestrial fibre expansion in Africa, in route kilometres



Population within 25 km of fibre node, in million people



Source: Hamilton Research

Two-thirds of Africa's population remains more than 10 km from an operational fibre node – and the pace of deployment is slowing, not accelerating.

⁶ ITU Data Hub, 2024; Ecofin Agency/ITU, November 2025. Africa fixed broadband: fewer than 1 per 100 inhabitants (2024). Globally: 18 per 100. Only Seychelles (31) and Mauritius (27) surpass global benchmarks.

⁷ Hamilton Research, Africa Bandwidth Maps, 2024. Operational fibre: 1,337,158 km (June 2024), 1,025,441 km (2019), 564,091 km (2014). Also confirmed by OECD/AUC, Africa's Development Dynamics 2025, February 2026.

⁸ Hamilton Research, 2024. SSA population within 25 km of fibre node: 62.6% / 733 million (June 2024), 44.0% / 410 million (2014). Note: Hamilton data covers sub-Saharan Africa only; North Africa fibre reach not separately reported. Metro fibre share: 21.6% (2022) increasing to 24.3% (2024). Metro accounted for 45% of new fibre added. Deployment pace: 244 km/day (2018-19) increasing to 159 km/day (2023-24).

⁹ Recent cross-border investments – from the Lake Tanganyika subsea cable and Niger's Trans-Saharan backbone to regional corridors developed by CSquared, Bayobab and Paratus – are beginning to address the cross-border connectivity gap. Yet most routes remain single-path, redundancy is limited, and networks are not yet configured to support resilient, continent-scale connectivity.

2.3. Data Centres are Scaling, but Reveal a Growing Utilisation Gap

Africa's data centre market is entering a new phase of expansion. Installed capacity has reached approximately 360 MW of active IT load, up from 250 MW last year, with a substantial pipeline under construction and planned (Figure 50).¹⁰ Investment is also shifting toward higher-value computational capacity, including infrastructure designed to support AI workloads.

Yet utilisation levels highlight the core constraint. Outside South Africa, only around one-third of installed capacity is fully occupied.¹¹

This reflects a structural issue. The constraint is no longer the absence of infrastructure, but the absence of demand at scale. Without widespread enterprise digitisation, cloud adoption, and data-intensive applications, capacity remains underutilised.

This gap is reinforced by persistent bottlenecks: unreliable and costly power, limited hyperscaler presence, fragmented enterprise adoption, and shortages of specialised talent. Power, in particular, has now overtaken connectivity as the principal constraint on expansion.

2.4. Satellite Access is Expanding, but is Not a Substitute for Terrestrial Systems

Low-earth orbit satellite systems are expanding rapidly across Africa, with services now active in approximately 25 countries. The emergence of direct-to-device connectivity represents a significant technological shift, enabling standard smartphones to connect without specialised terminals, and extending coverage to previously underserved areas. This has clear benefits for expanding access, particularly in remote and low-density regions where terrestrial infrastructure is costly to deploy.

However, early evidence highlights structural limitations. Network capacity is finite, particularly in high-density urban markets. Congestion effects emerge as usage scales faster than available bandwidth. And regulatory fragmentation persists, with licensing regimes differing sharply across countries.

These constraints point to a clear conclusion: satellite connectivity can extend coverage, but cannot deliver the high-capacity, low-cost and scalable connectivity required to support digital platforms, enterprise usage, and data-intensive applications. Satellite is therefore best understood as a complementary layer, filling coverage gaps at the margin. It does not replace the need for dense terrestrial fibre networks and robust data infrastructure.

2.5. Artificial Intelligence Makes Clear that Infrastructure Alone is Not Enough

Artificial intelligence brings these dynamics into sharp focus. AI represents the next phase of the digital economy, but also exposes its core constraint.

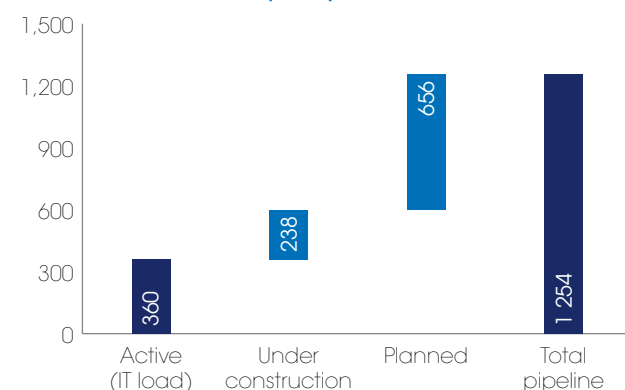
AI does not run on connectivity alone. It requires computational capacity, power, data, platforms, skills, and firms capable of applying it in practice. Where these elements are missing, adoption does not scale.

The constraint has therefore shifted. Earlier phases of digital development were limited by bandwidth. Today, the binding constraints are computational capacity, power, and system integration. This is why data centre capacity can remain underutilised even as demand for AI grows globally.

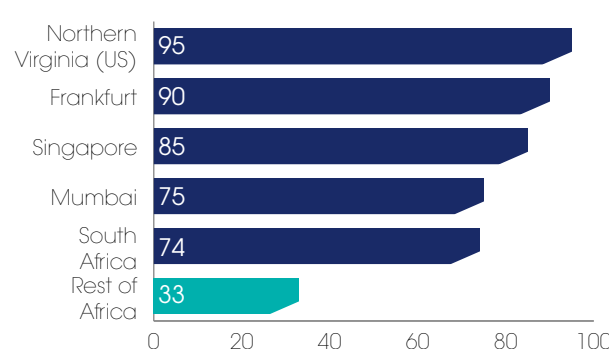
The opportunity lies in applying AI to raise productivity in existing sectors (agriculture, services, logistics, and small businesses) where it can support firm growth and job creation. But this depends on the same enabling conditions identified throughout this section: data availability, skills, platforms, and enterprise adoption. Infrastructure creates value only when it is embedded within a functioning digital ecosystem.

Figure 50: The infrastructure is being built, but the ecosystem required to use it is not yet in place

Africa's data centre capacity, in MW



Data centre utilisation rate, in %



Source: African Actors of Data Center Association (ADCA, 2026). *Data Centres in Africa 2026: The Economic Report*.

¹⁰ ADCA 2026 Economic Report. Active: 360 MW; under construction: 238 MW; planned: 656 MW. Africa accounts for 0.6% of global DC capacity. 220-230 facilities across 38 countries.

¹¹ ADCA 2026. Outside South Africa: around one-third of built capacity fully occupied. In South Africa: 74%. Operators building on 10-20 year horizons. Occupancy ramp-up slower than global hubs.

3 Building the Missing Middle is the Key to Unlocking Africa's Digital Value Creation

Africa's digital infrastructure is no longer the primary constraint. What determines whether connectivity generates economic value is not the infrastructure itself, but what sits on top of it, namely, the platforms, services, skills, and institutions that allow firms to operate digitally, scale, and compete.

This layer is the "missing middle". It is this that converts connectivity into output, linking infrastructure to firms, markets, and economic activity.

Without the missing middle, digital infrastructure remains underutilised. With it, the same infrastructure becomes a driver of productivity growth, export expansion, and job creation.

3.1. From Connectivity to Productivity: the Broken Conversion

To better understand where value is – and is not – being created, this report develops a simple analytical lens that links connectivity expansion to digital export outcomes.

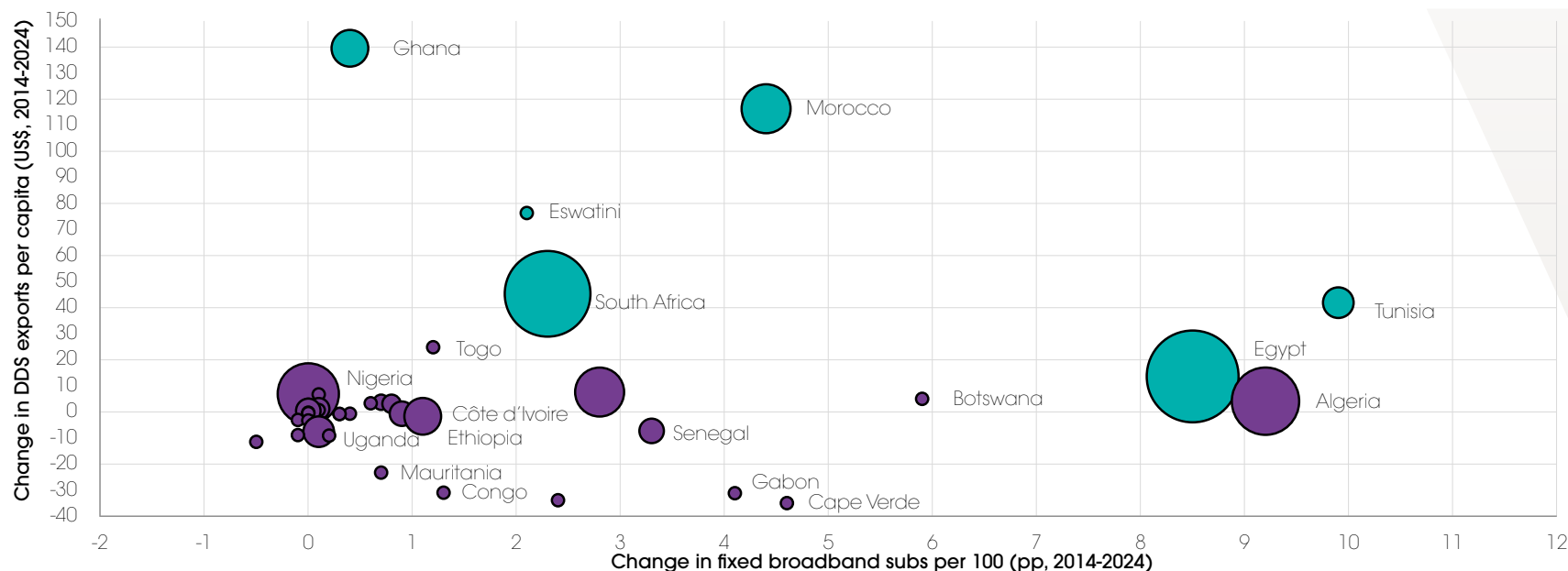
Our analysis of 46 African countries over the period 2014-2024 compares changes in fixed broadband subscriptions – a proxy for access to high-quality connectivity – with changes in digitally delivered services (DDS) exports per capita, which capture the extent to which economies are using digital infrastructure to produce and export services. This approach provides a way to move beyond measuring infrastructure deployment alone to assessing whether connectivity is translating into economic output.

Across our sample, countries that expanded connectivity most rapidly did not, in most cases, generate corresponding growth in DDS exports (Figure 51). This relationship holds across multiple indicators, including internet adoption, mobile broadband penetration, and fixed broadband expansion. In each case, no meaningful relationship seems to emerge between infrastructure expansion and export performance.

While connectivity measures the scale of infrastructure investment, DDS exports measure whether that infrastructure is being translated into tradable economic value. The absence of a relationship between the two indicates that expanding access, on its own, is not sufficient to drive export growth or productivity gains.



Figure 51: In most cases, countries that expand digital connectivity do not generate corresponding growth in DDS output
Change in fixed broadband subscriptions per 100 inhabitants vs. change in DDS exports per capita (2014-2024)

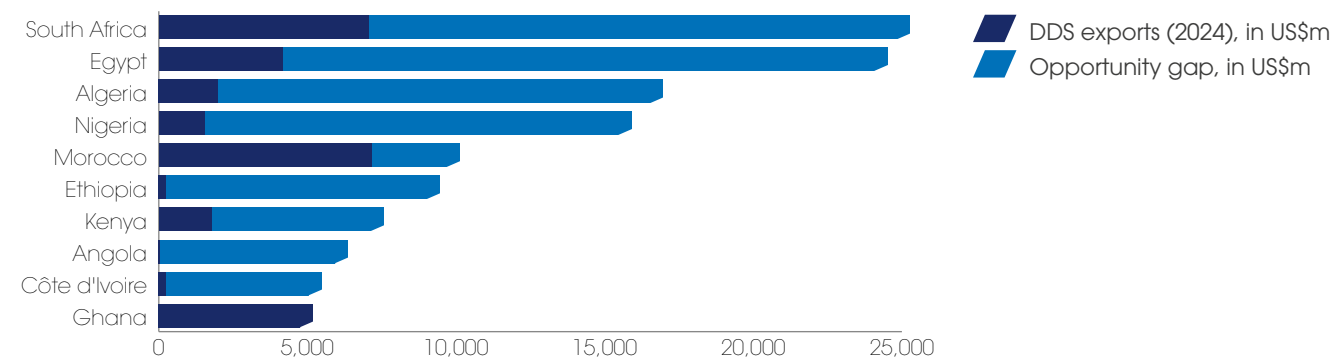


Note: DDS includes cross-border exports of IT, financial telecom, business process, and IP services delivered remotely via digital networks (UNCTAD/WTO definition). DDS captures cross-border (Mode 1) exports of DDS only. It does not capture domestic digital economic activity, digital goods trade, or services delivered via commercial presence (Mode 3). A country with a thriving domestic digital economy (e.g. mobile money, e-government) may show low DDS exports. The size of the bubbles represents GDP in 2024, in US\$ billion.

Sources: AFC staff calculations based on ITU World Telecommunication/ICT Indicators Database and UNCTAD Digitally Delivered Services Database. GDP and population data is sourced from World Bank and UN estimates, respectively.

The economic implications of the missing middle are substantial, and best illustrated by countries that have successfully embarked on converting connectivity to productivity. For example, Ghana's DDS exports now represent 6.3% of GDP, a ratio comparable to India and above the Philippines. If Africa's 10 largest economies matched this benchmark, total exports would rise from approximately \$29 billion today to \$127 billion – an increase of nearly \$100 billion annually (Figure 52).

Figure 52: Bridging Africa's digital services gap is a US\$100 billion opportunity
DDS export gap: Africa's 10 largest economies vs. Ghana's benchmark of 6.3% DDS-to-GDP ratio



Source: AFC staff calculations

3.2. Nigeria's MainOne: How Infrastructure can Enable Platform Development

Where connectivity has been translated into economic value, the pattern is consistent. Countries that have achieved this conversion have built:

- Digital public infrastructure (payments, identity, data exchange) that enables scale.
- Regulatory frameworks that support cross-border digital trade.
- Skills pipelines aligned to global demand.
- Enterprise-grade infrastructure that guarantees service reliability.
- Anchor firms and platforms that generate demand and connect to global markets.

These elements operate not in isolation, but as a coherent system.

As the MainOne experience demonstrates, infrastructure enables platforms, platforms enable applications, and applications generate the demand that sustains further infrastructure investment. Where these layers develop together, digital ecosystems emerge. Where they do not, infrastructure remains underutilised capital.

What is required, therefore, is not to deprioritise infrastructure investment, but to rebalance the strategy toward utilisation.

Digital public infrastructure, enterprise platforms, skills development, and innovation ecosystems are not secondary to cables and data centres – they are what determine whether those assets will generate returns.

The priority for the next phase is therefore clear: to deliberately build full-stack digital ecosystems that connect infrastructure to economic use.

Box

6

MainOne: how a single cable created an ecosystem

The MainOne submarine cable was financed with early-stage capital from AFC and the Pan-African Infrastructure Development Fund. When it went live in Lagos in July 2010, it delivered approximately 7,000 km of subsea fibre from Portugal to West Africa. Wholesale bandwidth prices fell sharply, and over the following decade international bandwidth costs dropped by an estimated 90%.

What followed illustrates how each infrastructure layer activates the next.

Connectivity → Platform. Bandwidth reached the coast, but no distribution network existed to carry it inland. MainOne built 1,200 km of metro fibre and established MDXi, a Tier III data centre subsidiary – converting raw international capacity into locally hosted, usable services.

Platform → Innovation. Reliable, low-latency connectivity became the foundation on which Lagos's technology ecosystem grew. Flutterwave, Paystack, Moniepoint, OPay, and Andela all built their businesses on the infrastructure MainOne helped establish. By 2024, Nigeria's ICT sector was contributing 17.7% of real GDP (NBS).

Innovation → Infrastructure. Ecosystem growth generated the data traffic and cloud demand that justified the next investment wave. In 2022, Equinix – the world's largest data centre operator – acquired MainOne for \$320 million, marking its first African entry. New subsea cables (Equiano, 2Africa, DARE1) are now landing across the region, drawn by the demand created by the first cable's ecosystem.

The pattern is circular: a single cable investment activated a platform layer, which catalysed an innovation ecosystem, which generated demand for more infrastructure.

4 Building the Innovation Layer: Where Economic Returns and Jobs Materialise

The 2025 report focused on the infrastructure and platform layers of Africa's digital economy. This chapter extends the analysis to the third layer: the innovation and application layer, which comprises the firms, tools, and business models that use digital infrastructure to generate output, raise productivity, and create jobs.

This distinction is critical. Infrastructure can be built and platforms deployed, but without widespread adoption by firms, particularly SMEs, economic returns remain limited. The innovation layer is therefore not an optional complement; it is the point at which digital infrastructure becomes economically meaningful.

4.1. Innovation is Scaling, but Unevenly and with Increasing Concentration

Africa's technology ecosystem is maturing. In 2025, startups raised approximately \$4.1 billion across 569 deals, with a notable shift toward debt financing (up 63% year-on-year). This reflects a transition from venture-led expansion toward more structured, cash-flow-based financing.

At the same time, exit activity is increasing. A growing share of acquisitions is now led by African corporates and financial institutions, indicating that innovation is beginning to be absorbed domestically rather than exported. This deepens local capital markets and strengthens the feedback loop between infrastructure, platforms, and enterprise growth.

However, this progress remains highly concentrated. Nigeria, Kenya, South Africa, and Egypt continue to account for the majority of both venture funding and digital infrastructure deployment. These markets benefit from a reinforcing cycle:

- Stronger infrastructure → higher utilisation.
- Higher utilisation → more platform development.
- Stronger platforms → greater startup activity.
- More innovation → increased demand for infrastructure.

Markets without this critical mass struggle to attract either capital or infrastructure, creating a widening digital divide within the continent.

Digital ecosystems are self-reinforcing, and without deliberate intervention, they will deepen geographic divergence.

Conclusion: From Building Infrastructure to Using It

Africa has made significant progress in building digital infrastructure. Over the past decade, the continent has expanded international bandwidth, extended fibre networks, and begun scaling data centre capacity. The coverage gap has narrowed rapidly.

But the central challenge has shifted.

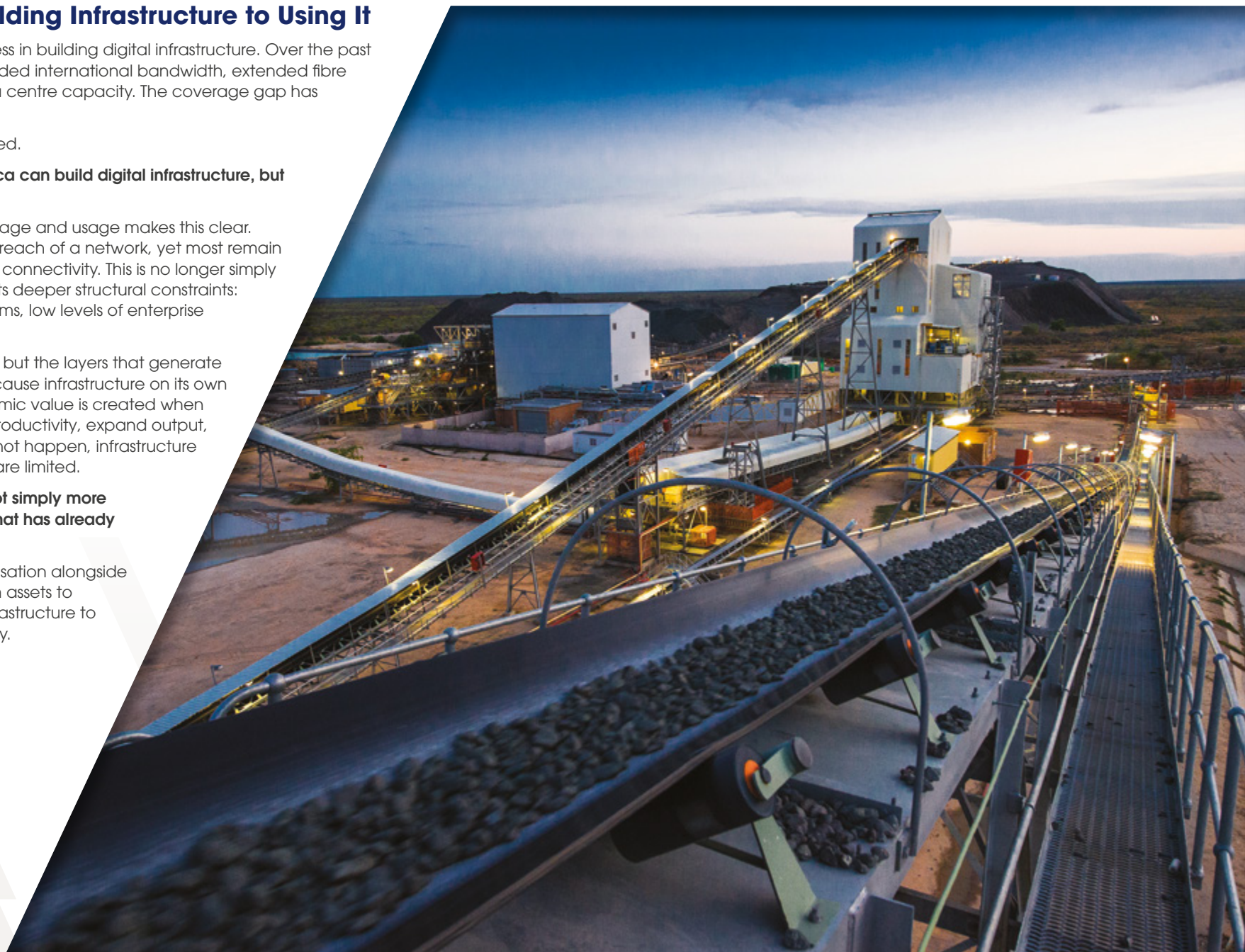
The issue is no longer whether Africa can build digital infrastructure, but whether it can use it productively.

The widening gap between coverage and usage makes this clear. More people than ever live within reach of a network, yet most remain offline or underutilise the available connectivity. This is no longer simply a question of affordability. It reflects deeper structural constraints: limited platforms, weak data systems, low levels of enterprise digitisation, and shortages of skills.

In effect, Africa has built the base, but the layers that generate value remain thin. This matters because infrastructure on its own does not generate growth. Economic value is created when firms use digital tools to improve productivity, expand output, and create jobs. Where this does not happen, infrastructure remains underutilised and returns are limited.

The priority for the next phase is not simply more infrastructure – it is better use of what has already been built.

This requires an equal focus on utilisation alongside connectivity, thereby moving from assets to ecosystems, and from building infrastructure to enabling firms to use it productively.



Statistical Annex

**Table 4: Framework for assessing African transport corridors**

Corridor	Primary Scope	Soft Infrastructure					Hard Infrastructure			Interventions and Priority Projects	
		Authority	Corridor Agreement	Policy			OSBPs (open)	Inland logistics	Railways		Pipeline
				Private	Public	Partnerships					
Abidjan–Ouagadougou Corridor 1,200km	Côte d’Ivoire, Burkina Faso, Mali	Committee only		Port, Railway	UEMOA customs union and ECOWAS trade regime reduce tariffs and harmonise customs rules for corridor countries	2	3	Metre gauge (1,238km) between Abidjan and Ouagadougou, operated by SITARAIL (AGL) connected to dry ports and fuel storage	Abidjan–Yamoussoukro–Bouaké Petroleum Products Pipeline	Trade facilitation and border crossing Railway rehabilitation	
Beira Corridor 1,500km	Mozambique, Zimbabwe, Zambia	Committee only	Beira Development Corridor Agreement	Port, Railway, Pipeline	SADC Protocol on Trade reduces tariffs and harmonises trade procedures among member states using the corridor	0	1	Machipanda Line (Mozambique) Mutare–Harare Line (Zimbabwe) Kafue–Lion’s Den (planned)	CPMZ Petroleum Products Pipeline (Beira–Feruka) connected to NOICPetroleum Products Pipeline (Feruka–Harare)	OSPB and border crossing	
Central Corridor 2,500km	Tanzania, Rwanda, Burundi, Uganda, DRC	Central Corridor Transit Transport Facilitation Agency (CCTTFA)	Central Corridor Transit Transport Facilitation Agreement	Port	East African Community Single Customs Territory	7	4	Metre gauge (1,251km) between Dar es Salaam and Kigoma, with branch lines to Mwanza and Mpanda. Standard gauge (627km) between Dar es Salaam and Dodoma with ongoing expansions to Mwanza, Kigoma and Burundi.	EACOP Oil Export Pipeline	SGR completion in Tanzania and extension to Burundi; Burundi border crossings	
Cotonou–Niamey Corridor 1,040km	Benin, Niger	Committee only		Port	UEMOA customs union and ECOWAS trade regime reduce tariffs and harmonise customs rules for corridor countries	1	2	Metre gauge (438km) central line between Cotonou and Parakou.	Niger–Benin Oil Export Pipeline	Trade facilitation and border crossing Railway rehabilitation and extension to Niger	
Dakar–Bamako Corridor 1,320km	Senegal, Mali	Committee only		Port	UEMOA customs union and ECOWAS trade regime reduce tariffs and harmonise customs rules for corridor countries	0	2	Metre gauge (1,375km) line between Dakar and Bamako is out of service.		OSPB and border crossing Railway rehabilitation	
DESSU Corridor 850km	Djibouti, Ethiopia, South Sudan, Uganda (DESSU)	DESSU Corridor Authority launched in 2026	DESSU Corridor Agreement signed in 2026		COMESA trade framework and bilateral transit agreements support tariff reduction and coordinated customs procedures between Ethiopia and Djibouti	0	6	Standard gauge (756km) between Djibouti and Addis Ababa		OSPB and border crossing	
Lagos–Abidjan Corridor 1,030km	Nigeria, Benin, Togo, Ghana, Côte d’Ivoire	Abidjan–Lagos Corridor Management Authority (ALCoMA) launched in 2026	Lagos–Abidjan Corridor Treaty	Port, Toll road	UEMOA customs union and ECOWAS trade regime reduce tariffs and harmonise customs rules for corridor countries	3	5	–	Planned West African Gas Pipeline	OSPB and border crossing Highway construction	
Lamu (LAPSSET Corridor 1,900km	Kenya, Ethiopia, South Sudan	LAPSSET Corridor Development Authority (LCDA)	Juba Commitments		Kenya participates in EAC customs integration but some corridor partners are outside the bloc	1	0	Planned SGR		OSPB and border crossing Road linkages	
Lobito Corridor 2,150km	Angola, Zambia, DRC	Lobito Corridor Transport Facilitation Agency (LCTTFA)	Lobito Corridor Transit Transport Facilitation Agreement	Port, Railway		0	2	Cape gauge (1,344km) between Lobito and operated Lobito Atlantic Railway (LAR); SNCC network in DRC requires rehabilitation		Railway rehabilitation (DRC) and extension (Angola–Zambia)	
Maputo Corridor 555km	Mozambique, South Africa	Maputo Corridor Logistics Initiative (MCLI)	Maputo Corridor Agreement	Port, Toll road	SADC regional trade framework	0	3	Cape gauge Ressano Garcia line (88km) in Mozambique is operated by Caminhos de Ferro de Moçambique (CFM) and links to Transnet’s network in South Africa.	ROMPCo Gas Pipeline	OSPB and border crossing	



Corridor	Primary Scope	Soft Infrastructure				Hard Infrastructure				Interventions and Priority Projects
		Authority	Corridor Agreement	Policy		OSBPs (open)	Inland logistics	Railways	Pipeline	
				Private	Public Partnerships					
N'Djamena–Douala Corridor 1,800km	Cameroon, Chad	Committee only		Railway, Port	CEMAC customs union harmonises tariffs and customs systems	0	3	CAMRAIL metre gauge (1,200km) is operated by AGL between Douala and Ngaoundere	Chad–Cameroon Oil Export Pipeline	Trade facilitation OSPB and border crossing Railway extension to Chad
Nacala Corridor 1,200km	Mozambique, Malawi, Zambia	Nacala Development Corridor Management Committee	Nacala Development Corridor Agreement	Railway, Port	SADC regional trade framework	4	1	Cape gauge (872km) is operated by Vale International		Railway extension to Zambia
North–South Corridor 2,750km	DRC, Zambia, Zimbabwe, Botswana, South Africa	Committee only		Port, Toll road	Tripartite Free Trade Area (COMESA–EAC–SADC) aims to reduce tariffs and harmonise trade rules across eastern and southern Africa	2	6	Integrated cape gauge network from Zambia to South Africa via Zimbabwe and Botswana		Trade facilitation OSPB and border crossing Railway connectivity (Kafue–Lion’s Den; Mmamabula–Lephalale; Mosetse–Kazungula–Livinstone)
Northern Corridor 1,200km	Kenya, Uganda, Rwanda, South Sudan	Northern Corridor Transit and Transport Coordination Authority (NCTCA)	Northern Corridor Transit and Transport Agreement (NCTA)	Port, Toll road	East African Community Single Customs Territory	7	7	Kenya Railways metre gauge (1,900km) and Mombasa–Naivasha SGR (700km)	KPC’s Petroleum Products Pipeline (Mombasa–Kisumu/ Eldoret)	SGR extension to Uganda
Tanzania–Zambia/ DRC Corridor 1,950km	Tanzania, Zambia, Malawi	Committee only				1	2	TAZARA cape gauge (1,860km)	TAZAMA Pipeline (Dar es Salaam–Ndola)	Trade facilitation and border crossing Railway rehabilitation
Trans-Kalahari Corridor 1,500km	Namibia, Zambia, Botswana, Zimbabwe	Trans-Kalahari Corridor Secretariat	Walvis Bay–Ndola–Lubumbashi Development Corridor Agreement		SACU eliminates tariffs among Namibia, Botswana and South Africa	0	2	TransNamib network limited to Namibia only		OSPB and border crossing Railway extension to Botswana
Walvis Bay Corridor (Trans-Capri) 1,600km	Namibia, South Africa, Zambia, Botswana, Zimbabwe	Walvis Bay Corridor Group (WBCG)	Walvis Bay–Ndola–Lubumbashi Development Corridor Agreement		SACU customs union and SADC trade framework enable tariff-free trade and simplified customs procedures for corridor traffic	1	2	TransNamib network limited to Namibia only		OSPB and border crossing Railway extension to Zambia/Zimbabwe

Table 5: Selected pipeline of Independent Transmission Projects (ITPs) in Africa

Project	Country	Developer	Capacity	Length	Est. Cost	Status
CEC Copperbelt Network	Zambia/DRC	Copperbelt Energy Corporation	220/66/11 kV	1,109 km	—	Operational
Amari Power Transmission	Uganda	Gridworks (BII)	220/132 kV	Substations only	\$50M	Financial close reached in March 2026
Lessos-Loosuk Transmission Line	Kenya	Africa50/ PowerGrid India	400 kV	180 km	\$311M (combined)	Under development
Kibos-Kakamega-Musaga Line	Kenya	Africa50/ PowerGrid India	220 kV	72 km	See above	Under development
South Africa ITP (Phase 1)	South Africa	Multiple (competitive tender)	—	14,000 km total (Phase 1: 1,164 km)	—	RFQ bidders announced Dec 2025
Chimuara-Nacala (LTEC Phase II & III)	Mozambique	Gridworks/EDM	400/220 kV	460 km	~\$450M	Development; Development funding secured from IFC and DFC
Mbale-Bulambuli-Kween	Uganda	Gridworks (BII)	HV	80 km	—	Agreement signed
Degehabur-Kebridehar	Ethiopia	Gridworks/EEP	132 kV	206 km	~\$400M (combined)	Agreement signed Feb 2026
Hurso-Ayisha	Ethiopia	Gridworks/EEP	400 kV	198 km	See above	Agreement signed Feb 2026
Kalumbila-Kolwezi Interconnector (KKIP)	Zambia – DRC	Enterprise Power DRC	330 kV	190 km	\$250M	EPC tender complete
Soyo-Inga-Cabinda	Angola – DRC	SOMAGEC/ Meridia Energy	400 kV	—	\$1.3bn (combined with Lauca-Kolwezi)	MoU signed (Jan 2025); studies complete
Lauca-Kolwezi	Angola – DRC	SOMAGEC/ Meridia Energy	—	1,200 km	See above	Under development
Mafala-Jamba-Cassinga	Angola	SOMAGEC/Ducab	220 kV	—	—	Under development
Hydro-Link Angola-DRC Interconnector	Angola – DRC	Hydro-Link/ Mitrelli Group	—	1,150 km	\$1.5bn	MoU signed (Jun 2025); feasibility stage

Source: AFC Research

**Table 6: Domestic Capital Pools**

2025 or latest available year	Total assets		Banking Sector		Non-commercial Banking	
			Commercial Banks		Sovereign Wealth Funds	
			Pension	Insurance	Public Development Banks	
				US\$ bn		
Africa	2,117.40	615	441.3	163.7	274.8	
<i>Africa, excl. South Africa</i>	<i>1,591.6</i>	<i>162.6</i>	<i>86.5</i>	<i>163.7</i>	<i>257</i>	
Algeria	194.4	nd	3.17	13.3	nd	
Angola	31	1.3	0.5	4.0	0.5	
Benin	9	CIPRES*	0.4	n/a	1.7	
Botswana	11.2	12.4	1.5	3.8	0.6	
Burkina Faso	13.2	CIPRES*	0.5	n/a	n/a	
Burundi	nd	nd	0.1	n/a	0.1	
Cabo Verde	nd	0.04	0.09	n/a	n/a	
Cameroon	BEAC*	CEMAC*	1	n/a	0.0	
Central African Rep.	BEAC*	CEMAC*	0.01	n/a	n/a	
Chad	BEAC*	CEMAC*	0.05	n/a	n/a	
Comoros	nd	CIPRES*	nd	n/a	n/a	
Congo, D.R.	16.8	CIPRES*	0.18	n/a	n/a	
Congo, Rep.	BEAC*	CEMAC*	0.14	n/a	n/a	
Côte d'Ivoire	46.3	3.3	1.97	n/a	4.2	
Djibouti	nd	0.5	0.04	terminated	n/a	
Egypt	510.1	3.1	12	12.0	18.5	
Equatorial Guinea	BEAC*	CEMAC*	0.03	0.2	n/a	
Eritrea	nd	nd	nd	n/a	n/a	
Eswatini	1.8	3.4	0.47	0.5	0.1	
Ethiopia	35.1	nd	0.45	46.3	1.2	
Gabon	BEAC*	CEMAC*	0.28	1.9	0.5	
Gambia, The	nd	nd	0.02	n/a	n/a	
Ghana	42.5	9.3	1.4	2.4	0.5	
Guinea	nd	CIPRES*	0.1	0.7	n/a	
Guinea Bissau	0.6	CIPRES*	0.01	n/a	n/a	
Kenya*	65.2	19.6	10.3	n/a	0.3	
Lesotho	nd	1.0	0.4	n/a	0.2	
Liberia	nd	0.1	0.06	n/a	n/a	
Libya	nd	nd	0.2	68.4	n/a	
Madagascar	4.9	CIPRES*	nd	n/a	n/a	
Malawi	4.2	3.1	2.2	n/a	0.1	
Mali	11.5	CIPRES*	0.15	n/a	1.5	
Mauritania	nd	nd	0.02	n/a	0.2	
Mauritius	59.2	4.8	3.5	1.2	0.3	
Morocco	211.4	35.9	27.9	1.8	60.7	
Mozambique	nd	0.3	0.3	n/a	n/a	
Namibia	10.5	17.2	6.1	n/a	0.7	
Niger	3.4	CIPRES*	0.1	n/a	n/a	
Nigeria	116.3	20.1	2.8	2.9	5.2	
Rwanda	5.9	1.6	0.9	0.3	0.6	
São Tomé and Príncipe	nd	nd	0.0	n/a	n/a	
Senegal	20.4	CIPRES*	1	1.2	0.8	
Seychelles	nd	0.3	0.1	n/a	0.2	
Sierra Leone	nd	nd	nd	n/a	n/a	
Somalia	nd	nd	nd	n/a	n/a	
South Africa	525.7	448	354.8	n/a	17.8	
South Sudan	nd	nd	nd	0.2	n/a	
Sudan	nd	nd	nd	n/a	n/a	
Tanzania	33.5	8.8	0.56	n/a	0.6	
Togo	6.4	CIPRES*	0.37	n/a	n/a	
Tunisia	64.3	1.2	3.5	n/a	4.3	
Uganda	16.2	6.9	0.46	n/a	0.5	
Zambia	nd	7.1	0.69	n/a	7.6	
Zimbabwe	6.2	2.8	0.67	16.0	0.4	

nd = no data; n/a = not applicable

Commercial Banks. Source(s): Country financial stability reports. *BEAC countries collectively hold ~US\$40 billion in commercial banking assets.

Pensions. Source(s): World Bank, ARSEG, NBFIRA, ASEL, CNPS, OECD, CBE, NRP, INS, RBA, FSD, NASSCORP, RBM, MoF, IFC, ASEL, Bank of Namibia, Bank of Tanzania, FENCOM, NBR, SP, FSCA, CNSS, URBRA, NPSA, IPEC.

* CEMAC asset number and is sourced from the BEAC's Financial Stability Report covering the investment portfolio of social security funds in Cameroon, CAR, Chad, Rep. of Congo, Equatorial Guinea and Gabon. Assets totalled CFA 1,038.1 bn at the end of 2023 and 1,122.6 bn at the end of 2024 (~US\$2 bn).

* CIPRES asset number and is sourced from a World Bank's 2022 Technical Note and covers Benin, Burkina Faso, Cameroon, Central African Republic, Togo, Congo Rep, Côte d'Ivoire, Gabon, Guinea, Comoros, Guinea Bissau, Equatorial Guinea, Madagascar, Mali, Niger, D.R. Congo, Senegal and Chad. Assets totalled CFA 3,581 bn at the end of 2020. To provide the best update possible, the CIPRES asset number that is accounted for in Africa's total capital pools dataset is of CFA 2,201.7 bn only as it excludes CEMAC countries and Côte d'Ivoire, for which more recent numbers are available.

Insurance. Source(s): NAICOM, ARSEG, CBE, TanzanInvest, IRA, DGT, NICGH, RBISA, ACAPS, UAR, FTUSA, Bank of Namibia, MoF, DGIIN, CNC, IAZ, CIWA, NBFIRA, FSC, BEAC, NBE.

SWF. Source: Global SWF (2023) updated where possible by AFC Research based on individual funds' disclosures over 2024-25.

PDBs. Source(s): Xu, Jiajun, Régis Marodon, Xinshun Ru, Xiaomeng Ren, and Xinyue Wu. 2021. "What are Public Development Banks and Development Financing Institutions?—Qualification Criteria, Stylized Facts and Development Trends." China Economic Quarterly International, volume 1, issue 4: 271-294. DOI: <https://doi.org/10.1016/j.ceqi.2021.10.001>; Updated by AFC Research where possible using individual banks' disclosures over 2024-25. Data for Algeria National Investment Fund was not available at the time of publication.

Reserves. Source: IMF International Liquidity Database/Dataset.

Note(s): This dataset is published as part of the State of Africa's Infrastructure Report 2026 and reflects AFC's commitment to fostering greater transparency and knowledge-sharing around the continent's domestic capital markets.

The data is made publicly available to encourage stakeholder engagement in refining, expanding, and updating the underlying datasets. We welcome feedback, corrections, and contributions from regulators, market participants, researchers, and other stakeholders to improve the accuracy and completeness of this important resource. Any changes to the dataset will be restated into next year's State of Africa's Infrastructure Report 2027. While every effort has been made to ensure the quality and reliability of the data presented, Africa Finance Corporation (AFC) does not guarantee its accuracy, completeness, or fitness for any particular purpose. AFC shall not be held liable for any decisions made or actions taken based on this dataset. Use of the data is at the user's own risk.

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**Table 7: Transport & Logistics Infrastructure**

	Roads				Railways			Ports	Airports
	Paved Network 2024, or latest year available	Density	IMF Road Mean Speed score	Operating lines 2024	Density	Containers Throughput 2024, or latest year available	Air Freight 2023, or latest year available		
000 km	km/100km ²	km/'000 people	km	km/'000 km ²	km/mn people	TEUs	tonnes		
Africa	818	2.8	0.55	n/a	78,783	2.6	52.8	45,370,000	2,586,000
Algeria	117	4.9	2.53	88	4,286	1.8	92.8	1,827,788	42,400
Angola	13.7	1.1	0.37	78	2,752	2.2	74.9	709,221	30,000
Benin	3.3	2.9	0.23	63	438	3.9	31.0	650,000	nd
Botswana	10.5	1.9	4.25	91	886	1.6	357.2	n/a	1,496
Burkina Faso	4	1.5	0.18	63	517	1.9	22.5	n/a	28,185.50
Burundi	1.7	8.1	0.15	51	n/a	n/a	n/a	n/a	nd
Cabo Verde	0.9	23.1	1.78	nd	n/a	n/a	n/a	89,382	nd
Cameroon	10.2	2.2	0.36	56	983	2.1	34.6	653,000	nd
Central African Rep.	0.7	0.1	0.14	61	n/a	n/a	n/a	n/a	nd
Chad	1.2	0.1	0.06	63	n/a	n/a	n/a	n/a	nd
Comoros	0.5	29.7	0.65	nd	n/a	n/a	n/a	no data	nd
Congo DR	3.3	0.1	0.03	62	4,007	1.8	37.9	50,000	nd
Congo Rep	2.7	0.8	0.44	63	795	2.3	128.6	1,219,164	nd
Côte d'Ivoire	8.5	2.7	0.27	78	639	2.0	20.5	1,646,304	31,998
Djibouti	0.8	3.4	0.68	69	97	4.2	84.1	1,324,569	4,492
Egypt	124.9	12.5	1.09	83	9,570	9.6	83.6	8,581,339	338,600
Equatorial Guinea	2.5	9.0	1.37	74	n/a	n/a	n/a	6,000	nd
Eritrea	1.6	1.3	0.46	62	115	1.0	33.1	no data	nd
Eswatini	1.5	8.7	1.22	69	301	17.5	244.6	n/a	nd
Ethiopia	17.7	1.6	0.14	61	659	0.6	5.1	n/a	713,875
Gabon	2	0.8	0.82	60	648	2.5	260.8	185,000	11,951
Gambia, The	1.2	12.2	0.46	53	n/a	n/a	n/a	no data	nd
Ghana	25.5	11.2	0.75	56	262	1.2	7.8	1,701,246	40,774
Guinea	2.8	0.9	0.16	50	541	2.2	37.6	306,000	nd
Guinea Bissau	1	3.4	0.45	60	n/a	n/a	n/a	no data	nd
Kenya	25.4	4.5	0.46	57	2,475	4.3	44.7	2,005,076	379,500.60
Lesotho	1.8	5.9	0.78	60	n/a	n/a	n/a	n/a	nd
Liberia	1.1	1.2	0.21	66	245	2.5	44.6	no data	nd
Libya	34	1.9	4.65	90	n/a	n/a	n/a	465,168	nd
Madagascar	5	0.9	0.16	51	673	1.2	21.6	220,700	nd
Malawi	4.4	4.7	0.21	75	920	9.8	43.6	n/a	4,876
Mali	6.5	0.5	0.27	72	0	0.0	0.0	n/a	nd
Mauritania	2.8	0.3	0.55	77	728	0.7	144.9	185,290	nd
Mauritius	2.4	119.1	1.89	nd	n/a	n/a	n/a	468,254	nd
Morocco	45.2	10.1	1.20	95	2,309	5.2	61.2	11,789,130	77,900
Mozambique	8.3	1.1	0.25	78	2,584	3.3	76.8	666,263	13,748.30
Namibia	8.2	1.0	2.79	99	2,687	3.3	906.8	146,051	3,936
Niger	5	0.4	0.19	69	n/a	n/a	n/a	n/a	9,500
Nigeria	60	6.6	0.26	55	3,800	4.2	16.7	2,100,000	195,700
Rwanda	1.6	6.5	0.11	47	n/a	n/a	n/a	n/a	16,101.53
São Tomé and Príncipe	0.3	26.0	1.08	nd	n/a	n/a	n/a	no data	nd
Senegal	6.7	3.4	0.36	71	657	3.4	36.3	881,289	38,624
Seychelles	0.5	111.7	4.29	nd	n/a	n/a	n/a	nd	11,554
Sierra Leone	1	1.5	0.12	64	192	2.7	22.7	no data	nd
Somalia	2.8	0.5	0.16	58	n/a	n/a	n/a	no data	nd
South Africa	159.4	13.1	2.52	100	20,953	17.3	331.5	4,303,748	490,200
South Sudan	0.3	0.0	0.03	59	0	0.0	0.0	n/a	nd
Sudan	8	0.4	0.16	72	600	0.3	12.0	268,315	nd
Tanzania	14	1.6	0.21	57	4,319	4.9	64.8	1,075,555	29,800
Togo	2.1	3.9	0.23	63	94	1.7	10.1	2,006,435	14,517.60
Tunisia	17.5	11.3	1.44	78	1,797	11.6	147.3	491,955	nd
Uganda	6.2	2.9	0.12	64	258	1.7	7.2	n/a	64,254
Zambia	10	1.4	0.49	73	2,109	2.8	101.8	n/a	18,054
Zimbabwe	18.5	4.8	1.13	83	3,145	8.1	192.5	n/a	15,887

nd = no data; n/a = not applicable

Source(s): National sources including governments, ministries and road development agencies, and airport authorities, using the latest year available. IMF Road Mean Speed Scores are extracted from the IMF's Road Quality and Mean Speed Score Working Paper (May 2022); Containers Throughput data is compiled from national ports authorities and the UNCTAD Data Hub.

Note: This dataset is published as part of the State of Africa's Infrastructure Report 2026 and reflects AFC's commitment to fostering greater transparency and knowledge-sharing around the continent's logistics infrastructure.

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Table 8: Energy

	Installed Power Generation Capacity 2025		Electricity Consumption 2023	Electrification Rate 2023	Clean Cooking Access Rate 2023	System losses 2023 or latest year available	Transmission density 2023 or latest year available
	GW	MW/'000 capita	kWh/capita		percent		km/million people
Africa	262.9	0.17	731.7	63.37	40.71	22	357.64
North Africa	117.6	0.53	1,845	94.58	99.5	17	654.64
Algeria	26.0	0.6	1,546.3	99.7	100	9	759.11
Egypt	61.9	0.5	1,482.5	100	100	20	523.43
Libya	11.2	1.5	3,676.5	73.2	nd	nd	nd
Morocco	12.2	0.3	990.2	100	98	18	782.70
Tunisia	6.2	0.5	1,531.4	100	100	22	553.31
Southern Africa	84.1	0.35	1,112.5	64.94	44.14	21	815.90
Angola	6.6	0.2	368.6	51.1	50	11	147.97
Botswana	1.0	0.4	1,421.3	76	66	nd	nd
Comoros	0.1	0.1	130.5	89.8	10	nd	nd
Eswatini	0.2	0.2	1,181.8	86.4	50	13	1,081.41
Lesotho	0.1	0.0	372.9	57.3	54	nd	nd
Madagascar	0.8	0.0	68.3	39.4	2	27	166.59
Malawi	0.5	0.0	75.1	15.6	2	21	122.37
Mauritius	0.8	0.7	2,364.8	100	99	nd	nd
Mozambique	3.0	0.1	391.9	36	7	26	1.13
Namibia	0.8	0.3	1,161.3	56.7	48	39	3,974.42
Seychelles	0.1	1.1	3,996.9	100	100	nd	nd
South Africa	62.9	1.0	2,824.0	87.7	90	nd	nd
Zambia	4.0	0.2	663.5	51.1	9	11	596.06
Zimbabwe	3.0	0.2	553.8	62	31	22	437.29
West Africa	30.5	0.07	239.4	55.33	19.94	22	123.93
Benin	0.2	0.0	110.1	57	6	24	128.33
Burkina Faso	0.7	0.0	125.8	21.7	17	16	63.78
Cabo Verde	0.2	0.4	852.3	98.6	84	nd	nd
Côte d'Ivoire	3.0	0.1	349.2	72.4	44	15	236.52
Gambia	0.2	0.1	160.5	66.9	2	nd	nd
Ghana	5.7	0.2	557.9	89.5	33	12	187.99
Guinea	1.3	0.1	190.9	51.1	1	19	108.44
Guinea-Bissau	0.0	0.0	80.6	40.5	1	nd	nd
Liberia	0.1	0.0	84.8	32.5	1	32	249.07
Mali	0.8	0.0	171.0	54.5	1	23	83.35
Mauritania	0.7	0.1	298.0	50.3	49	nd	nd
Niger	0.3	0.0	52.2	20.1	5	47	52.86
Nigeria*	14.8	0.1	148.3	61.2	26	14	52.99
Senegal	1.9	0.1	394.9	74.2	35	18	75.99
Togo	0.3	0.0	214.0	59.2	13	nd	nd
Sierra Leone	0.3	0.0	40.2	35.5	1	nd	nd
Eastern Africa	22.4	0.05	150.1	49.84	14.36	20	128.24
Burundi	0.2	0.0	25.3	11.6	0	19	212.92
Djibouti	0.2	0.2	622.9	65.2	10	nd	nd
Eritrea	0.2	0.1	116.9	54.4	12	nd	nd
Ethiopia	7.4	0.1	109.5	55.4	7	23	154.40
Kenya	3.2	0.1	189.4	76.2	32	23	168.06
Rwanda	0.5	0.0	75.8	63.9	9	nd	nd
Somalia	0.5	0.0	28.9	50.3	5	nd	nd
South Sudan	0.1	0.0	59.1	5.4	0	nd	nd
Sudan	4.0	0.1	211.5	66	71	22	20.02
Tanzania	4.1	0.1	122.9	48.3	10	15	111.27
Uganda	2.0	0.0	89.1	51.5	2	19	102.77
Central Africa	8.3	0.05	311.1	52.16	25.63	28	65.51
Cameroon	1.8	0.1	220.0	72	31	22	116.91
Central African Republic	0.1	0.0	23.4	17.6	1	30	32.27
Chad	0.5	0.0	13.7	12	10	29	49.07
Congo, D.R.	3.6	0.0	116.7	22.1	5	31	63.81
Congo, Rep.	0.8	0.1	300.5	51.3	40	nd	nd
Equatorial Guinea	0.6	0.3	472.2	66.9	22	nd	nd
Gabon	1.0	0.4	969.7	94.1	91	nd	nd
São Tomé and Príncipe	0.0	0.2	372.5	81.3	5	nd	nd

nd = no data; n/a = not applicable

Source(s): AFC Research; UNSTATS (2023 electricity consumption data); IEA, IRENA, UNSD, World Bank, WHO. 2025. Tracking SDG 7: The Energy Progress Report. World Bank, Washington DC. © World Bank.

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Note(s): Power generation capacity includes grid-connected capacity only.

* Nigeria's off-grid and captive generation capacity is significant and estimated anywhere between 20 and 100 GW. It is not reflected here.

**Table 9: Digital Infrastructure**

	Infrastructure		Access		Technology		Digitally Deliverable Services (DDS)	
	Subsea Cable Connections*	Internet Exchange Points (IXPs)	Internet Access	Data Affordability as a share of GNI per capita**	Mobile Broadband Subscriptions	Fixed Broadband Subscriptions	DDS exports 2024	DDS per capita 2024
	total		percent		per 100 people		US\$m	US\$
Algeria	8	nd	77.4	0.5	109.6	13	1,995.0	43
Angola	4	2	41	3.1	33.4	0.36	44.1	1.16
Benin	3	1	34.0	6.9	57.3	0.28	75.7	5.24
Botswana	n/a	1	57.5	1.4	135.1	7.44	239.1	94.85
Burkina Faso	n/a	2	28	8.8	56.8	0.85	227.3	9.65
Burundi	n/a	2	8.6	25.2	12.1	0.02	55.0	3.92
Cabo Verde	3	1	74.7	1.6	95.1	8.31	59.0	112.35
Cameroon	5	3	46.3	5.7	17.4	2.13	681.7	23.41
Central African Rep.	n/a	nd	13.80	53.7	5.3	0.02	26.9	5.04
Chad	n/a	1	12.6	11.8	17.3	nd	51.2	2.52
Comoros	2	nd	32.5	7.4	108.4	0.39	17.9	20.66
Congo DR	2	4	19.7	18.8	30.1	0.03	7.0	0.06
Congo Rep.	2	2	47.3	5.3	59.3	1.27	116.0	18.32
Côte d'Ivoire	7	1	41.4	3.0	108	1.60	246.6	7.72
Djibouti	12	1	65.3	5.7	34.8	1.47	80.5	68.89
Egypt	10	3	74.6	1.6	75	11.7	4,154.8	35.7
Equatorial Guinea	1	nd	63.3	nd	1.2	0.1	56.5	29.8
Eritrea	0	nd	14.3	nd	34	0.17	nd	nd
Eswatini	n/a	1	63.4	4.6	116.3	2.51	120.0	96.58
Ethiopia	n/a	1	22	4.8	38.6	0.59	237.7	1.80
Gabon	4	1	69	2.7	85.7	4.69	10.6	4.16
Gambia, The	1	1	49.5	8.7	90.6	0.52	1.8	0.65
Ghana	6	2	72.2	3.1	65.4	0.66	5,184.5	150.59
Guinea	1	2	33.3	5.2	53.5	0.01	47.2	3.20
Guinea Bissau	1	1	30	10.2	80.3	0.39	25.5	11.59
Kenya	6	7	35.0	4.1	79.3	3.04	1,766.9	31.31
Lesotho	n/a	nd	51.8	8.4	62	0.38	3.5	1.50
Liberia	1	1	32.2	12.6	42.3	0.27	nd	nd
Libya	4	nd	82	0.4	128	4.52	700.0	94.83
Madagascar	3	1	19	12.5	28.2	0.12	449.5	14.06
Malawi	n/a	2	19.0	8.5	44	0.09	190.5	8.80
Mali	n/a	1	36.8	9.4	61	0.77	224.1	9.15
Mauritania	1	nd	45.8	2.9	70	0.95	44.6	8.63
Mauritius	3	1	73.3	0.5	145.7	27.97	1,679.0	1,320.85
Morocco	9	2	91.2	1.5	98.3	7.30	7,160.5	188.03
Mozambique	3	1	20.5	6.4	30	0.14	37.4	1.08
Namibia	2	1	64.9	2.8	51.7	2.83	nd	nd
Niger	n/a	nd	16	13.9	33	0.11	112.3	4.15
Nigeria	8	6	41	1.6	41.4	0.08	1,546.9	6.65
Rwanda	n/a	1	31.7	1.9	71.6	0.60	74.0	5.19
São Tomé and Príncipe	1	nd	59.1	4.4	44.6	2.99	2.5	10.58
Senegal	4	1	60.1	4.7	108.9	4.04	459.3	24.82
Seychelles	2	1	87.8	1.4	82.4	31.6	542.7	4,161.2
Sierra Leone	1	nd	25	6.1	29.1	nd	17.8	2.060
Somalia	5	nd	27.9	4.0	13	0.72	nd	nd
South Africa	9	11	78.4	1.3	130.3	5.35	7,051.9	110.17
South Sudan	n/a	nd	6.70	24.2	6.4	nd	nd	nd
Sudan	5	1	18.60	6.6	59.9	0.06	nd	nd
Tanzania	4	6	31	4.8	37.3	0.25	474.0	6.91
Togo	3	1	39.5	9.5	45.3	1.42	319.8	33.61
Tunisia	6	1	76.5	1.4	86.2	14.97	1,172.4	95.49
Uganda	n/a	1	8.9	6.1	39.8	0.21	284.6	5.69
Zambia	n/a	2	17	3.2	62.4	0.79	226.4	10.62
Zimbabwe	n/a	2	41.6	12.9	71.3	1.94	39.8	2.39

nd = no data; n/a = not applicable

Source(s): AFC Research; ITU Data Hub; TeleGeography; World Bank Development Indicators/World Bank; Internet Society Pulse

* International subsea cables only.

** The data affordability basket refers of the cheapest mobile broadband plan providing at least 5 GB of monthly data as a share of GNI per capita. The UN Broadband Commission sets an affordability target below 2% of monthly GNI per capita.



Table 10: Value Addition

	Exports	
	Average (2022-25) US\$ bn	Export Intensity \$/capita
Africa	650	452
Algeria	54	953
Angola	41	838
Benin	4	274
Botswana	6	1,967
Burkina Faso	7	463
Burundi	nd	nd
Cabo Verde	nd	nd
Cameroon	5	170
Central African Republic	nd	nd
Chad	5	195
Comoros	nd	nd
Congo	9	1,253
Cote d'Ivoire	21	869
Dem. Rep. of the Congo	27	290
Djibouti	5	5,091
Egypt	47	434
Equatorial Guinea	4	1,572
Eritrea	1	280
Eswatini	2	1,596
Ethiopia	5	60
Gabon	12	4,687
Gambia	1	359
Ghana	21	893
Guinea	11	1,008
Guinea-Bissau	nd	nd
Kenya	8	158
Lesotho	1	424
Liberia	1	353
Libya	33	4,031
Madagascar	3	62
Malawi	1	46
Mali	6	203
Mauritania	4	959
Mauritius	2	1,592
Morocco	45	1,302
Mozambique	8	229
Namibia	7	2,291
Niger	2	73
Nigeria	57	234
Rwanda	2	139
São Tomé and Príncipe	nd	nd
Senegal	7	536
Seychelles	1	8,172
Sierra Leone	1	229
Somalia	1	52
South Africa	115	1,797
South Sudan	1	83
Sudan	4	59
Tanzania	8	145
Togo	2	208
Tunisia	20	1,696
Uganda	8	258
Zambia	12	605
Zimbabwe	8	596

nd = no data; n/a = not applicable

Source(s): AFC Compendium of Strategic Minerals 2026, World Steel Association, UNCTAD, UNCTADstat database.

Note(s): Sections with latest available year may not sum to total Africa. Exports refers to goods and services.

* Guinea ore is set to grow significantly as Simandou ramps into full production.

** Mozambique aluminium production set to go to 0 following Mozal closure.

	Primary Metals	
	Ore 2025e or latest available year '000 tonnes	Metal 2025e or latest available year '000 tonnes
Africa	185,200 (Bauxite) 98,000e (Iron ore)	26,558 (Steel) 1,447 (Aluminium)
Algeria	2,000 (Iron ore)	4,520 (Steel)
Angola	n/a	285 (Steel)
Cameroon	n/a	57 (Aluminium)
Cote d'Ivoire	105 (Bauxite)	nd
Egypt	n/a	295 (Aluminium)
Ghana	1,779 (Bauxite)	10 731 (Steel)
Guinea	183,000 (Bauxite)	50 (Aluminium)
Kenya	172 (Iron ore)*	245 (Steel)
Liberia	n/a	351 (Alumina)
Libya	5,205 (Iron ore)	1,750 (Steel)
Malawi	n/a	nd
Mauritania	1 (Iron ore)	872 (Steel)
Morocco	14,308 (Iron ore)	nd
Mozambique	46 (Iron ore)	nd
Nigeria	5 (Bauxite)	1,415 (Steel)
Sierra Leone	200 (Iron ore)	375 (Aluminium)**
South Africa	333 (Bauxite)	1,200 (Steel)
Tanzania	11,757 (Iron ore)	nd
Tunisia	66,000 (Iron ore)	720 (Aluminium)
Uganda	83 (Bauxite)	4,717 (Steel)
	67 (Iron ore)	750 (Steel)
	n/a	73 (Steel)
	437 (Iron ore)	nd

	Fertilisers	
	Nitrogen molecules '000 tonnes	Phosphorous molecules '000 tonnes
Africa	8,000 (Ammonia)	51,800 (P rock) 9,028 (P acid)
Algeria	2,000	2,000 (P rock)
Egypt	4,000	5,500 (P rock)
Morocco	nd	36,000 (P rock)
Nigeria	2,000	7,548 (P acid)
Senegal	nd	nd
South Africa	nd	2,800 (P rock)
Tunisia	nd	523 (P acid)
		2,200 (P rock)
		355 (P acid)
		3,300 (P rock)
		425 (P acid)

	Oil Refining Capacity 2024 or latest available year '000 bpd
Africa	4,143
Algeria	677
Angola	80
Chad	20
Congo	21
Côte d'Ivoire	75
Egypt	893
Gabon	25
Ghana	55
Liberia	10
Libya	666
Niger	20
Nigeria	1,125
Senegal	30
South Africa	210
South Sudan	10
Sudan	100



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