

Arbitration in East Africa's Renewable Energy Projects: Resolving Disputes in a Rapidly Evolving Sector

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Abstract

This chapter provides an overview of the legal and regulatory framework of renewable energy projects in East Africa and examines the role of arbitration and other dispute resolution mechanisms in this rapidly evolving sector. It highlights key factors of disputes, including construction delays, regulatory changes, and tariff adjustments, and reviews notable case studies from across the region. Drawing on comparative insights from European renewable energy disputes,

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the chapter recommends that regulatory stability, proactive stakeholder engagement, and robust, locally accessible dispute resolution mechanisms are essential for sustainable energy growth and enhanced investor confidence.

Keywords

Renewable energy projects · East Africa · Ethiopia, Kenya, Rwanda, Tanzania, Uganda · Dispute resolution · Risk mitigation · Legal and regulatory frameworks · Public-private partnerships (PPP) · International arbitration · Foreign direct investment

1 Introduction

At the 28th Conference of the Parties to the United Nations Framework Convention on Climate Change (COP 28), held on 30 November 2023, member states collectively pledged to implement a range of measures to reduce greenhouse gas emissions, including a commitment to triple global renewable energy capacity by 2030.¹ This pledge is in line with the 2015 Paris Agreement, under which member states committed to pursue efforts to limit global temperature rise to 1.5 °C.²

East Africa has emerged as a key player in Africa's renewable energy transition, with its abundant natural resources and supportive regulatory frameworks attracting significant foreign direct investment. In 2023 alone, the continent secured over USD 10 billion in project finance for wind and solar power generation, with East African countries leading several pioneering large-scale renewable energy initiatives.³ However, the complexity of these projects, involving multiple stakeholders and significant capital investment, has given rise to various disputes that require effective resolution mechanisms.

This chapter provides an analysis of renewable energy development and dispute resolution in East Africa. It begins by examining the diverse renewable energy landscape in the region, including significant wind, solar, geothermal, and hydro-power projects (Sect. 2). The chapter then analyzes the legal and regulatory frameworks across five East African countries (Sect. 3), before looking at dispute resolution mechanisms and risk mitigation strategies. This includes an examination of common dispute types, notable arbitration cases, and comparative insights from

¹UNFCCC, 'COP28 Agreement Signals "Beginning of the End" of the Fossil Fuel Era' (*UN Climate Change News*, 13 December 2023) <https://unfccc.int/news/cop28-agreement-signals-beginning-of-the-end-of-the-fossil-fuel-era> accessed 10 July 2025.

²UNFCCC, 'The Paris Agreement' (2016) https://unfccc.int/sites/default/files/resource/parisagreement_publication.pdf accessed 10 July 2025.

³UNCTAD, 'World Investment Report 2024: Investment Facilitation and Digital Government' (*United Nations*, 2024) https://unctad.org/system/files/official-document/wir2024_en.pdf accessed 10 July 2025.

European renewable energy disputes (Sect. 4). The chapter concludes with perspectives on future developments in the sector (Sect. 5).

2 The Renewable Energy Project Landscape in East Africa

The renewable energy infrastructure in East Africa is dynamic and expanding, driven by abundant natural resources, rising energy demands from growing populations, and supportive government policies. Significant investments in wind, solar, geothermal, and hydropower projects are driving the region's transition toward sustainable energy and enhanced regional electrification.

2.1 Wind and Solar Energy Projects

East Africa is harnessing its abundant wind corridors and high solar irradiance to develop large-scale wind and solar energy projects. A standout example is Kenya's Lake Turkana Wind Power Project (LTWP), located in Marsabit County. As the largest wind farm in Africa, LTWP comprises 365 wind turbines with a total capacity of 310 MW, supplying approximately 15% of Kenya's electricity needs.⁴ The project has significantly reduced Kenya's dependence on fuel imports from neighboring countries while enhancing energy security and sustainability. Beyond energy production, LTWP drives social impact through its NGO, Winds of Change, which implements community-focused initiatives such as employability programs, improved access to health care and clean water, and drought and food relief efforts.

Ethiopia is also making significant strides in wind energy as part of its broader green energy agenda. The Ashegoda Wind Farm, located in the northern Tigray region, features 84 turbines generating 120 MW—enough to power over 100,000 homes. Meanwhile, the Aysha Wind Farm Project in the Somali region, nearing completion, will include 48 turbines with a capacity of 390 MW. This project is expected to enhance power distribution in underserved areas and generate foreign currency through energy exports to Djibouti, a country already benefitting from Ethiopian green energy.⁵

Solar energy developments are equally impressive. In Uganda, the Soroti Solar Power Station, a 10 MW facility with 32,680 photovoltaic panels, is one of the country's largest grid-connected solar farms. It supports rural electrification and powers approximately 40,000 homes in the station's vicinity.⁶ Rwanda's Agahozo-

⁴East African Development Bank, 'An Update of Lake Turkana Wind Power Project' <https://eadb.org/news-events/press-releases/an-update-of-lake-turkana-wind-power-project/> accessed 10 July 2025.

⁵Power Technology, 'Power Plant Profile: Aysha Wind Farm, Ethiopia' (October 2024) <https://www.power-technology.com/data-insights/power-plant-profile-aysha-wind-farm-ethiopia/?cf-view> accessed 10 July 2025.

⁶Power Technology, 'Power Plant Profile: Access Power-Soroti Solar PV Park, Uganda' (October 2024) <https://www.power-technology.com/marketdata/power-plant-profile-access-power-soroti-solar-pv-park-uganda/?cf-view> accessed 10 July 2025.

Shalom Youth Village Solar Farm, equipped with 28,360 photovoltaic panels and an 8.5 MW capacity, increases the country's energy output by 6%. It also exemplifies social impact by contributing electricity to the national grid while supporting community development initiatives.⁷ Ethiopia's Metehara Solar Plant, a 100 MW project, underscores the growing focus on utility-scale solar projects in the East African region.⁸

2.2 Geothermal and Hydropower Development

East Africa's unique position along the Great Rift Valley makes it a global hotspot for geothermal energy. Leading the region, Kenya's Olkaria Geothermal Plant generates more than 800 MW, providing a stable and reliable energy supply.⁹ Future expansions, such as the Olkaria VI geothermal power project (140 MW), are set to further enhance capacity.¹⁰ Ethiopia is also capitalizing on its geothermal resources through the Aluto-Langano Geothermal Power Station (72 MW), located within the dormant Aluto volcano. This project is poised to significantly strengthen Ethiopia's renewable energy portfolio.¹¹

Hydropower, although occasionally controversial, remains a cornerstone of East Africa's renewable energy landscape. Ethiopia's Grand Ethiopian Renaissance Dam (GERD) on the Blue Nile River, which was completed and officially inaugurated in September 2025, will generate over 6000 MW, making it Africa's largest hydroelectric power plant. GERD is also set to position Ethiopia as a major electricity exporter to neighboring countries.¹² In Uganda, key infrastructure projects such as the Karuma Hydropower Project (600 MW)¹³ and the Isimba Hydropower Plant (183 MW)¹⁴ are bolstering energy security and enhancing export potential. Meanwhile, Tanzania's Julius Nyerere Hydropower Project (2115 MW), partially operational and under construction across the Rufiji River in the Morogoro area, is poised

⁷Shelby Sullivan, 'The Power of the Sun' (*The Agahozo Shalom Youth Village*, 11 February 2015) <https://www.asyv.org/stories/2015/2/11/the-power-of-the-sun> accessed 10 July 2025.

⁸Global Energy Monitor, 'Metehara Solar Farm' (May 2025) https://www.gem.wiki/Metehara_solar_farm accessed 10 July 2025.

⁹KenGen, 'Geothermal' <https://www.kengen.co.ke/index.php/business/power-generation/geothermal.html> accessed 10 July 2025; Mitsubishi Power, 'Geothermal Power for Sustainable Development in Kenya' (28 February 2017) <https://power.mhi.com/case/kenya> accessed 10 July 2025.

¹⁰Global Energy Monitor, 'Olkaria 6 Geothermal Power Plant' (March 2025) https://www.gem.wiki/Olkaria_6_geothermal_power_plant accessed 10 July 2025.

¹¹Global Energy Monitor, 'Aluto Langano Geothermal Power Plant' (March 2025) https://www.gem.wiki/Aluto_Langano_geothermal_power_plant accessed 10 July 2025.

¹²International Hydropower Association (IHA), 'Ethiopia-Grand Ethiopian Renaissance Dam (GERD)' <https://www.hydropower.org/sediment-management-case-studies/ethiopia-grand-ethiopian-renaissance-dam-gerd> accessed 10 July 2025.

¹³Uganda Electricity Generation Company, 'Karuma Hydropower Station' <https://www.uegcl.com/power-plants/karuma-hydropower-project/> accessed 10 July 2025.

¹⁴Uganda Electricity Generation Company, 'Isimba Hydropower Station' <https://www.uegcl.com/power-plants/isimba-hydropower-station/> accessed 10 July 2025.

to transform the region. In addition to providing renewable energy, it is expected to secure water resources for various uses.¹⁵

3 Legal and Regulatory Overview

The development of renewable energy projects in East Africa has been driven by supportive regulatory frameworks and government policies, including feed-in tariffs, tax incentives, and public-private partnership (“PPP”) laws. Additionally, East African countries have enacted robust arbitration legislation, reinforcing its role as a preferred mechanism for resolving disputes in the energy sector.

3.1 Ethiopia

Ethiopia's energy sector is primarily governed by the Energy Proclamation No. 810/2013, which establishes the Ethiopian Energy Authority (EEA) under the Council of Ministers.¹⁶ The proclamation defines energy as “electric power generated from hydropower, solar, wind, geothermal or other sources.” As the regulatory body, the EEA is responsible for issuing generation licenses, reviewing national grid tariffs, and approving power purchase agreements (“PPAs”).

Electricity in Ethiopia is managed by two key entities. The first one, Ethiopian Electric Power (EEP), established by Regulation No. 302/2013 (amended by Regulation No. 381/2016), oversees the sale and purchase of bulk electricity, as well as power generation and transmission.¹⁷ The second one, Ethiopian Electricity Utility (EEU), is responsible for the distribution and retail infrastructure in the country, purchasing electricity from EEP and supplying it to consumers.

The exploration, exploitation, and development of geothermal resources in Ethiopia are regulated by the Geothermal Proclamation No. 981/2016, supplemented by the Geothermal Resources Regulation No. 453/2019.¹⁸ These regulations provide for the licensing of geothermal projects by the EEA and grant tax and duty exemptions to geothermal license holders.

Ethiopia has also introduced a framework for private sector participation in renewable energy through the Public Private Partnership Proclamation No. 1076/2018, which facilitates privately funded infrastructure projects.¹⁹ This framework

¹⁵Marc Howard, ‘Tanzania Commissions First Julius Nyerere Hydroelectric Unit but Grid Questions Linger’ (*African Energy Newsletter*, 14 March 2024) <https://www.africa-energy.com/news-centre/article/tanzania-commissions-first-julius-nyerere-hydroelectric-unit-grid> accessed 10 July 2025.

¹⁶Energy Proclamation No 810/2013 (Ethiopia).

¹⁷Ethiopian Electric Power Establishment Council of Ministers Regulation No 302/2013 (Ethiopia); Ethiopian Electric Power Establishment Council of Ministers (Amendment) Regulation No 381/2016 (Ethiopia).

¹⁸Geothermal Resources Development Proclamation No 981/2016 (Ethiopia).

¹⁹Public Private Partnership Proclamation No 1076/2018 (Ethiopia).

has encouraged investments in renewable energy, including projects such as the Aysha Wind Farm Project, discussed in Sect. 2.1.

In 2020, Ethiopia became a signatory to the 1958 United Nations Convention on the Recognition and Enforcement of Foreign Arbitral Awards (the “**New York Convention**”).²⁰ In 2021, it enacted a new Arbitration Act, applicable to arbitrations seated in Ethiopia.²¹ However, Ethiopia has not ratified the 1966 Washington Convention on the Settlement of Investment Disputes between States and Nationals of Other States (the “**ICSID Convention**”).

3.2 Kenya

Kenya’s regulatory framework for renewable energy is built on a combination of national policies, regulations, and institutions aimed at promoting and overseeing the development of renewable energy sources such as wind, solar, geothermal, and hydropower. A key piece of legislation is the Energy Act of 2019 (the “**Energy Act**”), which established the Rural Electrification and Renewable Energy Corporation to spearhead the development and promotion of renewable energy.²²

The Energy Act also introduced specific mechanisms to incentivize investment in the sector, including the renewable energy feed-in-tariff (FIT) scheme. This scheme allows electricity generated from renewable sources to be sold to an off-taker at a guaranteed predetermined tariff for a specified period, providing financial certainty for investors.²³ In addition, the Kenyan government has adopted competitive procurement policies for renewable energy capacity, such as the Renewable Energy Auction Policy and the Feed-in-Tariff Policy, which apply to electricity generated from small hydro, biomass, and biogas projects.²⁴

Regulatory oversight is primarily entrusted to the Energy and Petroleum Regulatory Authority (EPRA), which is responsible for regulating the production, conversion, distribution, supply, marketing, and use of renewable energy.²⁵ EPRA has also issued guidelines on green hydrogen and its derivatives, establishing a

²⁰UNCITRAL, ‘Ethiopia Accedes to the Convention on the Recognition and Enforcement of Foreign Arbitral Awards’ (*United Nations*) https://uncitral.un.org/en/Ethiopia_NYC accessed 10 July 2025.

²¹Arbitration and Conciliation, Working Procedure Proclamation No 1237/2021 (Ethiopia).

²²The Energy Act No 1 of 2019 (Kenya).

²³Anderson Kehbila and others, ‘Stakeholders’ Perspectives on the Effectiveness of the Feed-in Tariff and Renewable Energy Auction Policies in Kenya’ (*Stockholm Environment Institute*, December 2024) <https://www.sei.org/wp-content/uploads/2024/12/feed-in-tariff-renewable-energy-auction-policies-kenya-sei2024-053.pdf> accessed 10 July 2025.

²⁴Ministry of Energy, ‘Feed-in-Tariffs Policy on Renewable Energy Resource-Generated Electricity (Small-Hydro, Biomass and Biogas)’ (3rd Revision, January 2021) <https://communications.bowmanslaw.com/REACTION/emdocuments/fitPolicy.pdf> accessed 10 July 2025.

²⁵Energy and Petroleum Regulatory Authority, ‘Our Mandate, Vision, Mission & Values’ <https://www.epra.go.ke/our-mandate-vision-mission-values> accessed 10 July 2025.

regulatory and strategic framework for the development and deployment of green hydrogen projects in Kenya.²⁶

Geothermal energy exploration and development fall under the mandate of the Geothermal Development Company (GDC), a wholly state-owned entity responsible for managing Kenya's geothermal resources.²⁷ The Public Private Partnerships Act of 2013 further provides a framework for leveraging private capital to support renewable energy development. Through this Act, the GDC has partnered with independent power producers to develop various geothermal projects, including the Menengai Geothermal Power Project.²⁸

Regarding dispute resolution, Kenya's Arbitration Act of 1995, as amended in 2009, is based on the United Nations Commission on International Trade Law (UNCITRAL) Model Law on International Commercial Arbitration. Additionally, Kenya is a party to the New York Convention and has ratified the ICSID Convention, reinforcing its commitment to international arbitration as a mechanism for resolving investment disputes.

3.3 Rwanda

In Rwanda, the Ministry of Infrastructure is responsible for setting the overall policy and strategy for the energy sector.²⁹ In 2015, it launched the Rwanda Energy Policy, outlining the government's commitment to diversifying the energy mix through hydropower, geothermal, solar, and methane gas resources. The policy also emphasizes the need for a clear legal and regulatory framework specifically designed to promote renewable energy, including revising existing legislation and enacting new laws to support the sector.³⁰

Rwanda does not have a single national energy law; instead, the regulatory framework for renewable energy is spread across various laws, including the Rwanda Utilities Regulatory Agency (RURA) Act,³¹ the Electricity Act,³² and the Investment Code.³³

²⁶ See Energy and Petroleum Regulatory Authority, 'Kenya's Guidelines on Green Hydrogen and Its Derivatives' (May 2024) <https://www.epra.go.ke/sites/default/files/Documents/Guidelines-on-Green-Hydrogen-and-its-Derivatives.pdf> accessed 10 July 2025.

²⁷ Geothermal Development Company, 'Our Story' <https://www.gdc.co.ke/our-story/> accessed 10 July 2025.

²⁸ Geothermal Development Company, 'Menengai Geothermal Project' <https://www.gdc.co.ke/menengai/> accessed 10 July 2025.

²⁹ Rwanda Utilities Regulatory Authority, 'Electricity' <https://www.rura.rw/index.php?id=65/1000#:~:text=The%20Law%20N%C2%B021,of%20electricity%20regulation%20in%20Rwanda> accessed 10 July 2025.

³⁰ Rwanda Utilities Regulatory Authority, 'Overview' https://www.rura.rw/index.php?id=137/1000#:~:text=RURA%20has%20the%20mandate%20to,supply%20fairly%20to%20all%20consumers.https://rura.rw/fileadmin/Documents/Energy/RegulationsGuidelines/Rwanda_Energy_Policy.pdf accessed 10 July 2025.

³¹ Law No 39/2001 of 13 September 2001 (later replaced by Law No 9/2013 of 1 March 2013 (Rwanda).

³² Law No 21/2011 of 23 June 2011 governing Electricity in Rwanda (Rwanda).

³³ Law No 006/2021 of 05 February 2021 on Investment Promotion and Facilitation (Rwanda).

The Rwanda Utilities Regulatory Authority (RURA) is the primary regulatory body responsible for licensing both renewable and nonrenewable energy projects. Under the Electricity Act, RURA has the authority to establish regulations governing the purchase and sale of electricity, as well as set tariff thresholds for renewable energy. Additionally, the Electricity Act and the Investment Code provide a transparent licensing process, ensuring compliance with environmental standards and offering incentives to investors in the renewable energy sector.

To attract investment, Rwanda enacted the Public-Private Partnership (PPP) Law in 2016, which facilitates private sector participation in infrastructure and service development, including renewable energy projects. The country has also ratified international agreements such as the United Nations Framework Convention on Climate Change (UNFCCC) and the Paris Agreement, reinforcing its commitment to sustainable energy development.

In terms of dispute resolution, Rwanda's Law on Arbitration and Conciliation in Commercial Matters (Law No. 005/2008) governs domestic and international arbitration and is influenced by the 2006 UNCITRAL Model Law.³⁴ Rwanda is also a signatory to the New York Convention and has ratified the ICSID Convention, ensuring the enforceability of arbitral awards and providing robust protection for investors.

3.4 Tanzania

Tanzania's National Energy Policy of 2015 aims to increase the share of renewable energy in electricity generation. It provides for the establishment of FITs and outlines a framework for integrating renewable energy into the national grid.³⁵

The Electricity Act of 2008 is the primary legislation governing renewable energy. It mandates the Energy and Water Utilities Regulatory Authority (EWURA), established under the EWURA Act, to issue licenses, review, and set electricity tariffs. The Act also allows independent power producers (IPPs) to participate in electricity supply. To facilitate power purchase agreements, EWURA has developed model PPAs for both renewable and nonrenewable energy generation projects exceeding 10 MW.³⁶

For small-scale renewable energy projects, the Electricity (Development of Small Power Projects) Rules of 2019 regulate procedural and regulatory aspects for projects with a capacity between 100 kW and 10 MW.³⁷ These rules are supplemented

³⁴Law No 005/2008 on Arbitration and Conciliation in Commercial Matters (Rwanda).

³⁵The National Energy Policy 2025 (Tanzania).

³⁶Energy and Water Utilities Regulatory Authority, 'Electricity Power Purchase Agreements' <https://www.ewura.go.tz/pages/power-purchase-agreements> accessed 10 July 2025.

³⁷The Electricity Act, 2019 GN No 380 (Tanzania).

by the Electricity (Standardized Small Power Projects Tariff) Order of 2019, which establishes standard tariffs for electricity generated by small power projects.³⁸

Additionally, the Rural Energy Act of 2005 supports the development of renewable energy by establishing a special-purpose rural energy fund, which can cofinance projects alongside development partners.³⁹ The Public-Private Partnership (PPP) Act also plays a crucial role in attracting foreign investment to the sector.⁴⁰

These regulatory measures have facilitated the growth of small-scale renewable energy projects in Tanzania. In terms of dispute resolution, Tanzania enacted a new Arbitration Act in 2020, replacing the Arbitration Ordinance of 1931. The Act applies primarily to mainland Tanzania, with limited exceptions concerning the stay of proceedings and the enforcement of arbitral awards. Tanzania is also a signatory to the New York Convention and has ratified the ICSID Convention, reinforcing its commitment to international arbitration and investor protection.

3.5 Uganda

Uganda's legal framework for renewable energy is primarily governed by the Electricity Act of 1999, as amended in 2022, and the Biofuels Act of 2020. These are supplemented by the Energy Policy 2023, which sets out the country's roadmap for the energy sector.

The Electricity Act regulates electricity generation companies, including those operating renewable energy projects.⁴¹ It established the Electricity Regulatory Authority (ERA), which is responsible for tariff setting, licensing, and overseeing power producers. The ERA is also mandated to establish standardized FITs for renewable energy systems with a capacity of up to 50 MW.⁴²

The Biofuels Act governs the licensing of production, storage, and transportation of fuels derived from biomass.⁴³ Additionally, the legal framework includes the Public Private Partnership Act of 2015, which has played a key role in attracting investment in renewable energy projects, such as the Nyagak III Small Hydropower Project.⁴⁴

In 2023, the government approved the Revised Energy Policy for Uganda, replacing the previous version.⁴⁵ The policy emphasizes the need to diversify the

³⁸The Electricity Act (Standardized Small Power Projects Tariff) Order, 2019 GN No 464 (Tanzania).

³⁹The Rural Energy Act 2005 (Tanzania).

⁴⁰Public Private Partnership Act CAP 103 2018 (Tanzania).

⁴¹The Electricity Act, 1999 CA 145 (Uganda).

⁴²Electricity Regulatory Authority, 'ERA Revises Renewable Energy Feed-in-Tariffs' (23 January 2024) <https://www.era.go.ug/era-revises-renewable-energy-feed-in-tariffs/> accessed 10 July 2025.

⁴³The Biofuels Act, 2020 (Uganda).

⁴⁴Uganda Electricity Generation Company, 'Nyagak III Hydro Power Project' <https://www.uegcl.com/projects/nyagak-iii-hydropower-project/#:~:text=The%206.6%20MW%20Nyagak%20III,Amei%20Parish%2C%20Paidha%20Sub%20County> accessed 10 July 2025.

⁴⁵International Energy Agency, 'Uganda 2023 Energy Policy Review' (2023) <https://www.iea.org/reports/uganda-2023> accessed 10 July 2025.

energy mix by incorporating renewable sources such as thermal, solar, and nuclear power to meet domestic demand and facilitate exports. It also introduces financial incentives, including FITs, tax exemptions, and duty waivers, to encourage the growth and adoption of renewable energy.

Uganda has ratified international agreements such as the Paris Agreement, reinforcing its commitment to transitioning from fossil fuels to renewable energy. The country is also a signatory to the New York Convention and the ICSID Convention. Its arbitration framework is governed by the Arbitration and Conciliation Act of 2000, which applies to both domestic and international arbitration and is based on the UNCITRAL Model Law.

4 Dispute Resolution and Risk Mitigation

4.1 Factors Giving Rise to Disputes in Renewable Energy Projects

Renewable energy projects in East Africa are critical to addressing the region's growing energy demands and advancing sustainability goals. However, their inherent complexity, coupled with the involvement of a diverse range of stakeholders—including governments, private investors, contractors, and local communities—often leads to disputes arising from multifaceted challenges.

A primary source of contention is construction delays, which are a frequent and significant cause of disputes. These delays may result from a variety of factors, including supply chain disruptions, inadequate local infrastructure, and challenges related to land acquisition or community opposition. For instance, logistical hurdles in remote project locations often hinder the timely delivery of essential equipment, such as wind turbines or solar panels, causing costly setbacks. Such delays can spark disputes between contractors and developers over key contractual provisions, including liquidated damages, performance guarantees, and the allocation of risks linked to unforeseen circumstances.

The renewable energy sector in East Africa operates within a dynamic legal and regulatory environment (see Sect. 3 above), where frequent changes to government policies can significantly impact project viability. Modifications to FITs, licensing requirements, or tax incentives often disrupt the financial models underpinning these projects, particularly those structured around PPPs or long-term agreements. Such policy shifts can lead to disputes between investors and host governments, especially when they undermine the expected returns on investment, creating uncertainty and eroding investor confidence.

Another common source of contention is tariff adjustments under PPAs. These long-term contracts are vital for ensuring the financial sustainability of renewable energy projects, as they provide predictable revenue streams. However, disputes can arise if tariffs are renegotiated due to macroeconomic factors like inflation, currency depreciation, or political pressures to reduce electricity costs. Additionally, delays in payments by state-owned utilities, discrepancies in electricity off-take levels, or

disputes over the interpretation of PPA terms further strain relationships between developers and off-takers.

The high capital requirements of renewable energy projects in East Africa often lead to intricate financing arrangements involving diverse stakeholders, including developers, lenders, and governments. These arrangements, while essential to project execution, can give rise to disputes over issues such as delayed disbursements, unforeseen cost overruns, or disagreements on the allocation of risks within financing agreements. In addition, political or economic instability in the region can erode investor confidence, amplifying the likelihood of financing-related disputes.

Last but not least, environmental and social considerations are increasingly integral to the successful implementation of renewable energy projects. Disputes may emerge over environmental impact assessments (EIAs), compliance with local and international environmental standards, or conflicts with communities affected by project activities. In East Africa, many renewable energy initiatives are situated in ecologically sensitive or culturally significant areas, heightening the need to balance development objectives with environmental preservation and community interests.

4.2 Insights into Renewable Energy-Related Disputes in East Africa

Stakeholders in East African renewable energy projects are typically well-versed in dispute resolution. Financing, procurement, construction, and PPAs for these projects often include multitier dispute resolution clauses, integrating mechanisms such as negotiation, adjudication, expert determination, mediation, and arbitration to ensure efficient and timely resolution of disputes.

In addition, international organizations, such as the African Development Bank (AfDB), the World Bank, and private equity firms, have played a critical role in providing financing and technical expertise to several renewable energy projects to mitigate risks and increase the chances of success. Even so, there have been some notable disputes arising from renewable energy projects in East Africa which highlight the challenges and risks of the sector.

One such dispute involved the *Great Lakes Energy Company NV (GLE)* and the Kabulasoke solar power project in Uganda.⁴⁶ GLE, a renewable energy company, entered into investment and ancillary agreements with local partners in Uganda to develop a 20 MW solar photovoltaic (PV) farm in the Gomba District. Under these agreements, GLE agreed to provide funding to the local partners, who held the power generation license, in exchange for shares in the project company. GLE also undertook to provide engineers for the construction of the solar plant. A dispute arose when the local partners accused GLE of inflating the cost of engineering and

⁴⁶ *Great Lakes Energy Company NV (GLE) v. MSS Xsabo Power Ltd and others*, LCIA Case No 204602.

construction by USD 6 million. As a result, the investors terminated the agreement and revoked GLE's share allotment.

GLE initiated LCIA arbitration proceedings under the arbitration clause in the investment agreement, seeking repayment of its investment and damages for wrongful termination. The LCIA arbitral tribunal ruled in favor of GLE, which then successfully enforced the award in Uganda under the New York Convention and Uganda's Arbitration and Conciliation Act.⁴⁷

Another dispute arose in the *Kinangop Wind Park* project in Kenya.⁴⁸ An independent power producer entered into a PPA with the Kenya Power and Lighting Company, the off-taker, to supply power from its wind farm to the national grid. The USD 150 million project, touted as the first independent large-scale wind farm in East Africa, was financed with equity. The Kenyan government issued a letter of support, committing to indemnify the investor against losses arising from political events. However, protests from landowners—who objected to inadequate community engagement, compensation issues, and the manner in which land was leased—disrupted the project shortly after construction commenced.⁴⁹

Unable to proceed, the investor terminated the project and initiated ICC arbitration against Kenya under the arbitration clause contained in the letter of support. The investor claimed USD 310 million in damages, alleging that Kenya had failed to address a political event triggered by the protests. The ICC arbitral tribunal dismissed the claim, ruling that no political event had occurred within the meaning of the letter of support.⁵⁰

In the *KivuWatt* case,⁵¹ the Government of Rwanda awarded a concession to an investor for the development of a methane extraction and power generation plant on Lake Kivu, which straddles the border between Rwanda and the Democratic Republic of Congo. The concession included a 25-year power PPA under which the electricity generated would be sold to Rwanda Energy Group (REG), the off-taker and national electricity distributor. While the first phase of the project was completed, the second phase faced delays.

REG initiated UNCITRAL arbitration proceedings, claiming damages due to the investor's delays in commissioning the plant, which forced Rwanda to purchase

⁴⁷ *Great Lakes Energy Company NV (GLE) v. MSS Xsabo Power Ltd and others*, (Arbitration Cause 14 of 2024; Arbitration Cause 75 of 2023) [2024] UGCommC 75 (18 April 2024).

⁴⁸ *Kinangop Wind Park Ltd vs. Republic of Kenya*, ICC Case No 21728/TO.

⁴⁹ Business & Human Rights Resource Centre, 'Kinangop Wind Park's Suit against Kenya Govt. for Alleged Failure to Stop Local Community's Opposition to Project Dismissed' (16 July 2018) <https://www.business-humanrights.org/fr/derni%C3%A8res-actualit%C3%A9s/kinangop-wind-parks-suit-against-kenya-govt-for-alleged-failure-to-stop-local-communitys-opposition-to-project-dismissed/> accessed 10 July 2025.

⁵⁰ Africa Arbitration, 'Kenya wins a US\$ 311,649,022 million arbitration claim for the Kinangop Wind Park Project' <https://africaarbitration.org/2018/07/07/kenya-wins-a-us-311649022-million-arbitration-claim-for-the-kinangop-wind-park-project/> accessed 10 July 2025.

⁵¹ *Rwanda Energy Group (took over from Energy Utility Corporation Limited) v KivuWatt*, UNCITRAL

more expensive replacement power from imported fuel oil generation.⁵² The investor counterclaimed, seeking to set aside the outcome of an expert determination that had rejected its request for a tariff increase under the PPA. The investor argued that the increase was necessary to compensate for additional costs incurred due to a change in the laws of Rwanda during construction. The arbitral tribunal dismissed both claims.⁵³

Beyond commercial arbitration, investors in renewable energy projects have also brought investment treaty claims against states under the ICSID Convention and the dispute settlement provisions of investment treaties.

For example, in the *WalAm Energy* case,⁵⁴ an investor obtained a license from the Government of Kenya, granting it exclusive rights to explore and develop geothermal resources. However, Kenya later declared the license forfeited on the basis that the investor had failed to meet its obligations and lacked the capacity to conduct the required exploration and development. The investor initiated an ICSID arbitration, alleging that Kenya's actions violated customary international law and amounted to wrongful expropriation. The arbitral tribunal rejected these claims, ruling that the forfeiture should be assessed in light of Kenya's domestic legislation governing license issuance.

Some East African states, including Kenya, Burundi, Tanzania, and Uganda, are signatories to the Energy Charter Treaty (ECT), albeit with observer status.⁵⁵ To date, no arbitration has been initiated under the ECT against an East African state. However, the treaty has faced increasing criticism from other countries, with concerns that its investment protection provisions could limit governments' ability to reform their energy policies and regulations, particularly in the renewable energy sector.⁵⁶

4.3 Dispute Mitigation and Resolution

Dispute mitigation and resolution are critical to the smooth implementation and long-term success of renewable energy projects in East Africa. As outlined above,

⁵² Cosmo Sanderson, 'Rwandan State Entity Loses Power Plant Claim' (*Global Arbitration Review*, 10 August 2022) <https://globalarbitrationreview.com/article/rwandan-state-entity-loses-power-plant-claim> accessed 10 July 2025.

⁵³ *ibid.*

⁵⁴ *WalAm Energy Inc v. Republic of Kenya*, ICSID Case No ARB/15/7 Award (10 July 2020).

⁵⁵ International Energy Charter, 'Members and Observers to the Energy Charter Conference' (March 2024) <https://www.energycharter.org/who-we-are/members-observers/> accessed 10 July 2025.

⁵⁶ Lea Di Salvatore, Nathalie Bernasconi-Osterwalder & Lukas Schaugg, 'Despite Consensus on the ECT's Incompatibility with the Global Climate Agenda, Claims that it is well-suited for the Clean Energy Transition Persist' (*Investment Treaty News*, 8 October 2021) <https://www.iisd.org/itn/2021/10/08/malgre-le-consensus-quant-a-lincompatibilite-du-tce-avec-lagenda-climatique-mondial-les-arguments-selon-lesquels-il-est-approprie-pour-la-transition-vers-une-energie-propre-persiste-lea-di-salvatore-n/> accessed 10 July 2025.

these projects, which often involve complex agreements, significant investments, and diverse stakeholders, can be derailed by disputes over construction delays, regulatory changes, or community opposition. Effective strategies for mitigating and resolving disputes are essential not only to safeguard project timelines and budgets but also to foster investor confidence and strengthen regional energy ambitions. Drawing lessons from European renewable energy disputes can provide valuable guidance for addressing these challenges in East Africa.

4.3.1 Dispute Mitigation Strategies

Mitigation begins with comprehensive risk assessment and robust contract drafting. Contracts must clearly define roles, responsibilities, and risk allocations, particularly for critical issues like construction delays, regulatory risks, and tariff adjustments. Incorporating adaptive clauses, such as force majeure provisions or tariff adjustment mechanisms, allows parties to navigate unforeseen circumstances more effectively.

Early stakeholder engagement is equally crucial. Transparent communication with local communities, regulators, and other stakeholders helps preempt disputes related to land acquisition, environmental impact, and community opposition. Governments play a pivotal role by ensuring regulatory predictability, offering investment incentives, and establishing clear public-private partnership (PPP) frameworks.

4.3.2 Key Mitigation Measures

As highlighted in Sect. 4.1, disputes in East Africa's renewable energy projects often stem from a range of recurring challenges. Addressing these challenges requires a strategic and multifaceted approach to dispute mitigation.

Construction delays, which frequently arise from supply chain disruptions, inadequate infrastructure, and issues like land acquisition or community opposition, necessitate meticulous planning. Robust contractual frameworks are essential to clearly outline responsibilities and address provisions such as liquidated damages and performance guarantees, helping to mitigate the risks of delays and their associated conflicts. Of course, with a surge in the development and use of new, untested technologies, the emergence of new, unconventional market players, and the development of innovative financing mechanisms, these trends introduce significant additional risks. This marks a fundamental shift in the way projects are approached, demanding even greater foresight, adaptability, and collaboration among stakeholders to effectively manage uncertainties and potential disruptions.

Regulatory instability, including frequent changes to feed-in tariffs, licensing requirements, or tax incentives, disrupts project viability and undermines investor confidence. Governments must focus on ensuring policy consistency and honoring contractual commitments to maintain stability and continuity in the renewable energy sector.

Tariff adjustments under PPAs represent another critical area of concern. Macroeconomic factors, such as inflation and currency depreciation, often drive renegotiations that strain relationships between developers and off-takers. Well-drafted PPAs should incorporate flexible mechanisms to accommodate economic fluctuations while ensuring equitable risk allocation. Furthermore, issues such as delays in utility

payments and disputes over the interpretation of PPA terms must be addressed proactively to reduce tensions.

The significant capital requirements of renewable energy projects often lead to complex financing arrangements involving multiple stakeholders. These arrangements can give rise to disputes over delayed disbursements, unforeseen cost overruns, or disagreements about risk allocation. Establishing clear, equitable financing terms and including contingency mechanisms can minimize these conflicts and foster effective collaboration among stakeholders.

Environmental and social considerations also pose significant challenges. Many projects are located in ecologically sensitive or culturally significant areas, creating the potential for disputes over environmental impact assessments or community opposition. Navigating these issues successfully requires a proactive and inclusive approach. Early stakeholder engagement, transparent communication, and the integration of sustainability measures into project planning and execution are critical. Addressing environmental and social concerns not only minimizes disputes but also fosters local support, regulatory compliance, and project acceptance. Conversely, neglecting these aspects can result in delays, increased costs, and strained relationships with key stakeholders, ultimately jeopardizing the long-term success of renewable energy initiatives.

4.3.3 Dispute Resolution Mechanisms

For disputes that cannot be avoided, efficient resolution mechanisms are essential to ensure the smooth continuation of energy projects. Arbitration remains the preferred method for resolving international energy disputes due to its flexibility, confidentiality, and enforceability under treaties such as the 1958 New York Convention.⁵⁷ In addition to arbitration, amicable negotiations, mediation, and expert determination⁵⁸ are effective tools for preserving long-term relationships between stakeholders, offering opportunities for collaborative solutions and minimizing adversarial outcomes.

Regional arbitration centers, such as the Kigali International Arbitration Centre (KIAC)⁵⁹ and the Nairobi Centre for International Arbitration (NCIA),⁶⁰ play a critical role in resolving disputes locally. These institutions offer accessible, cost-effective alternatives to foreign jurisdictions while maintaining international standards of excellence. Strengthening these centers through capacity building and the possible adoption of specialized arbitration rules for energy disputes can enhance

⁵⁷ Convention on the Recognition and Enforcement of Foreign Arbitral Awards (adopted 10 June 1958, entered into force 7 June 1959) 330 UNTS 3 (New York Convention).

⁵⁸ See Bernd Ehle, 'Expanding the Toolbox: Expert Determination as a Mechanism for Resolving Construction Disputes in Africa' (*Africa Construction Law*, 26 July 2023) <https://africakonstructionlaw.org/expanding-the-toolbox-expert-determination-as-a-mechanism-for-resolving-construction-disputes-in-africa/> accessed 10 July 2025.

⁵⁹ Kigali International Arbitration Centre (KIAC) <https://kiac.org.rw/> accessed 10 July 2025.

⁶⁰ Nairobi Centre for International Arbitration (NCIA) <https://ncia.or.ke/> accessed 10 July 2025.

their ability to handle complex cases, promoting regional expertise and reducing reliance on foreign tribunals.

The energy industry is characterized by complex, high-stakes agreements such as PPAs, engineering, procurement, and construction (EPC) contracts, and joint venture arrangements. Arbitration offers the flexibility to tailor the dispute resolution process to the unique requirements of these agreements. For example, parties can appoint arbitrators with specific expertise in energy law, technical matters, or financial disputes, ensuring that the tribunal is well-equipped to understand the intricacies of energy-related issues. This results in more informed and practical decisions that align with the sector's complexities.

Confidentiality is a critical advantage of arbitration in the energy sector. Many disputes involve commercially sensitive information, including pricing structures, proprietary technologies, and strategic plans. Arbitration ensures that such details remain private, mitigating the risk of reputational damage or public scrutiny that could arise from court proceedings.

Enforceability is another cornerstone of arbitration's appeal. Given the international nature of many energy projects, disputes often span multiple jurisdictions. Arbitration awards, enforceable in over 170 countries under the New York Convention, provide stakeholders with a reliable mechanism to secure compliance. This global enforceability is particularly important in the energy sector, where substantial financial investments and long-term commitments are at stake.

By fostering expertise and creating specialized rules tailored to the energy industry—such as expedited procedures for urgent disputes or provisions for multi-party arbitration—regional centers like KIAC and NCIA can further enhance their capabilities. These advancements would solidify their roles as critical hubs for dispute resolution, supporting East Africa's growing energy sector and bolstering investor confidence in the region's ability to handle complex, high-value disputes.

4.3.4 Lessons from European Renewable Energy Disputes

While the contexts and challenges of renewable energy projects differ across regions, some experiences from European renewable energy disputes can offer useful insights that East Africa may adapt to its own unique circumstances. For instance, cases in Europe involving the retroactive withdrawal of feed-in tariffs have underscored the critical importance of regulatory stability. Ensuring consistency in policies and honoring contractual commitments can help attract and retain investment, fostering confidence among stakeholders.

European disputes have also illustrated the benefits of equitable risk allocation. Poorly defined responsibilities often resulted in disputes over construction delays or cost overruns. Allocating risks to the parties best equipped to manage them—whether through performance guarantees, joint venture structures, or hybrid financing models—can help minimize similar issues in East Africa, ensuring that risks are addressed fairly and efficiently.

Moreover, sustainability and community engagement have proven to be increasingly vital in Europe. Integrating social and environmental considerations into project planning and operations has been shown to reduce opposition and improve

project acceptance. These approaches highlight the importance of a holistic strategy that aligns development goals with local community benefits and environmental preservation, which is particularly relevant to the East African context.

By drawing on these experiences and tailoring them to its own realities, East Africa can strengthen its ability to mitigate and resolve disputes in renewable energy projects. Prioritizing regulatory predictability, equitable risk allocation, and proactive stakeholder engagement will be key to achieving this goal. Additionally, continued investment in regional arbitration frameworks and the development of local expertise can bolster investor confidence and further support East Africa's renewable energy ambitions, positioning the region as a leader in sustainable energy development.

5 Conclusion and Future Outlook

East Africa's renewable energy sector has shown remarkable growth and potential, characterized by innovative projects in wind, solar, geothermal, and hydropower technologies. The region's commitment to sustainable energy development is evident in its diverse portfolio of projects, from Kenya's Lake Turkana Wind Power Project to Ethiopia's Grand Ethiopian Renaissance Dam. This growth has been supported by evolving regulatory frameworks and increasing sophisticated dispute resolution mechanisms, positioning East Africa as a key player in Africa's renewable energy transition.

Despite significant progress and achievements, challenges remain, including financing gaps, infrastructure constraints, grid capacity, and regulatory hurdles persist. Addressing these issues will be critical to sustaining growth in the renewable energy sector. Collaboration between governments, private investors, and international organizations will play a vital role in overcoming these barriers. As East Africa continues to attract significant foreign investment and prioritize sustainable energy policies, the region is well positioned to lead Africa's clean energy transition, contribute meaningfully to global climate goals, and drive regional economic development.

Experience with dispute resolution in the sector has highlighted both challenges and opportunities. Notable cases, such as those arising from the Great Lakes Energy, Kinangop Wind Park, and WalAm Energy projects, have demonstrated the importance of robust dispute resolution mechanisms and the critical role of arbitration in resolving complex disputes. These cases underscore the need for careful attention to project structuring, stakeholder engagement, and risk allocation. The development of regional arbitration centers, including KICAC and NCIA, further strengthens the dispute resolution framework by providing accessible and specialized forums for energy-related disputes.

Looking ahead, the success of East Africa's renewable energy sector will depend on several key factors: continued regulatory harmonization across the region, strengthening of local dispute resolution capacity, effective management of environmental and social impacts, and innovative approaches to project financing. The

region's commitment to renewable energy development, coupled with its growing expertise in handling complex energy disputes, suggests a promising future for sustainable energy growth in East Africa, despite the challenges that lie ahead.

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