NAVIGATING THE ENERGY TRANSITION IN THE CARIBBEAN





THE ACCOUNTANCY PROFESSION ENABLING CLIMATE RESILIENCE

The Caribbean region—home to more than 700 islands and approximately 20 million people—is on the frontline of the climate crisis. Rising temperatures, intensifying storms, and sea-level rise pose significant risks to communities, economies, and ecosystems. At the same time, the region faces a pressing need to transition from its carbon-intensive energy systems to more resilient, renewable energy sources.

This transformation is essential not only for reducing greenhouse gas emissions but also for enhancing energy affordability, security and economic growth. However, the transition requires an estimated \$5–7 billion in upfront investment. Without sufficient financial means and infrastructure development, Caribbean nations risk being locked into fossil fuel dependency and high and volatile costs. Progress in unlocking climate finance remains slow, limiting the opportunities to access renewable energy and energy efficiency projects.

Accountants and finance professionals have a critical role to play in addressing these challenges. Their expertise in corporate governance, reporting, providing independent objective assurance, risk management, and financial planning is vital to driving decarbonization and attracting climate-aligned investment. Yet the region's limited availability of high-quality sustainability information and disclosure to support investment decisions and risk analysis can hinder capital flows into climate and energy projects.

Advancing the energy transition and climate resilience in the Caribbean will depend on coordinated efforts across the public and private sectors with people at the center, so that the transition itself is sustainable. This includes effective stakeholder engagement and communications, mobilizing capital and technical support through multilateral development banks, such as the World Bank and Caribbean Development Bank, and enabling public policy, regulatory environments, and sustainable finance frameworks that incentivize private sector engagement.

The Caribbean's experience reflects the broader opportunities and challenges of achieving a just transition in the Global South. This report explores how accountants can lead on climate action, supporting communities, businesses and governments in navigating this transition through their business leadership and advisory roles. It also underscores the accountancy profession's capacity to promote regional integration and knowledge sharing to strengthen progress across the Caribbean. The insights in this report were informed by the expert contributions from

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- **Dr. Thackwray "Dax" Driver**, President and CEO of the Energy Chamber of Trinidad and Tobago.

This report is part of a series of regional deep dives addressing the unique sustainable development and climate action issues faced in different regions, the essential strategies for achieving sustainability and climate objectives, and the pivotal role of the accountancy profession and professional accountants in the public and private sectors.

The Accountancy Profession Enabling Africa's Transformation, published with the Pan African Federation of Accountants (PAFA), outlined five areas the accountancy profession can influence to achieve transformation in Africa.



THE CARIBBEAN CONTEXT

Economic Landscape: The region is diverse and characterized by small domestic markets, high dependence on tourism and commodity exports, limited human resources, and underdeveloped infrastructure. Many Caribbean economies are also highly indebted. However, the region has significant economic potential and growth opportunities, which can also be driven by decarbonization.

Climate Vulnerabilities: Contributes less than 1% to global CO₂ emissions (World Population Review, Carbon Footprint by Country) but faces disproportionate and significant risks from extreme weather events, including hurricanes, rising sea levels, and coastal erosion. Climate risk adaptation and resilience are crucial to dealing with



Island nations possess abundant natural resources, such as the wind, sun, and in some cases geothermal and hydro potential, which can be harnessed to provide affordable, clean, and resilient local energy. The cost-effectiveness of deploying green energy technologies and the constraints vary across the Caribbean. the Caribbean's high vulnerability to extreme weather events and safeguarding critical sectors such as tourism, agriculture, and fisheries. Climate resilience will also help lower public liabilities associated with responding to the aftermath of significant weather events, breaking the negative feedback loop that arises in responding to weather events, which escalates public debt.

Energy Transition Targets: The Caribbean Community and Common Market (CARICOM) Energy Report Card for 2022 highlighted that all 16 countries surveyed have established renewable energy targets. However, only 7 countries have active Energy Policies or Energy Action Plans. Current renewable energy performance is increasing at just above 12% but is well below the target of 47% renewable energy generation by 2027.

Current Energy Landscape: The region faces increasing energy demand and needs to expand capacity for both generation and distribution. The region's energy is highly carbonized, with fossil fuels accounting for around 90 percent of the electricity supply. The associated infrastructure is increasingly costly to maintain. An abundance of natural energy resources, including solar, wind, geothermal, hydro, tidal and wave, and the implementation of technologies such as smarter grids, present an opportunity to transition away from fossil fuels. A growing renewable energy development sector is emerging, but it requires financing.

CURRENT RENEWABLE ENERGY PERFORMANCE VS. 2027 TARGET

CARICOM aims for 47% renewable energy by 2027. 2022 performance was at 12%, signaling the urgent need for progress.



CHALLENGES TO ENERGY TRANSITION IN THE CARIBBEAN

- 1. High Dependency on Imported Fuels: Bar a couple of energy-rich countries, around 87% of the region's energy needs are met through imports, leading to high costs and vulnerability to oil price volatility, collectively increasing climate transition risks. Energy instability and high electricity prices present headwinds to economic growth.
- 2. Aging Infrastructure: Significant investments are needed to modernize the energy supply and grids. With a large share of existing thermal generation capacity in the region scheduled to retire over the next 5-10 years, mobilizing financing needs to happen quickly to avoid locking investment into carbon-intensive infrastructure. Building robust and smarter utility infrastructure is critical to climate resilience. Regional integration, such as through grid interconnectivity, can also play an important role in improving grid resilience and optimizing renewable energy resources.
- **3. Regulatory Barriers:** A lack of comprehensive green energy policies and outdated or unclear regulatory frameworks can hinder the development and integration

of renewable energy and battery energy storage system technology. Consistent and effective green energy policies and regulatory frameworks are crucial in creating an attractive investment climate, enabling energy companies to create incentives to encourage public and private participation and financing of renewable energy projects (see CARILEC Position Paper on Regulation and Energy. <u>Transition</u>).

- 4. Limited Access to Finance: Small-scale energy investments and high project costs can restrict progress without greater collaboration and partnerships to reduce the overall cost through economies of scale and de-risking. Scaling up finance requires better information, greater transparency, and innovative financing arrangements. Successes in some countries offer lessons for neighboring nations.
- 5. A Lack of Energy Modeling and Benchmarking: Energy modeling and analysis are needed to evaluate and benchmark a country's energy system, including supply, demand, storage, and feasible technologies, and to invest

in the best decarbonization options and assess the role of lower-carbon fossil fuels to deal with variability and resilience.

6. Capacity and Systemic Barriers: Decisions related to energy have long-term consequences and must be backed by thorough analysis and a clear understanding of the key issues and facts pertaining to energy and the transition among key decision-makers and influencers. Education and communication are essential for a sustainable energy transition. Training and development of accounting and finance professionals in sustainability reporting and assurance can greatly enhance the quality of discussions, decisions, and accountability surrounding the energy transition.

The fossil fuel-producing countries of Trinidad and Tobago, Guyana, and Suriname also have specific considerations in reducing the carbon intensity of their production and ensuring their long-term future in the context of a climate transition and decarbonization.

UNLOCKING OPPORTUNITIES OF THE ENERGY TRANSITION

For most Caribbean nations, given that energy is a significant part of their economies, the transition offers significant opportunities.

- Workforce Development: Expanding the pool of trained professionals by reaching historically underrepresented groups in the energy and financial sectors.
- Access to Capital: Changing the traditional energy business model provides opportunities to rethink how to mobilize domestic investment.
- **Regional Collaboration:** Has historically led to synergistic outcomes across the region. The energy transition requires strong regional collaboration and is fostering regional knowledge sharing and partnerships at all levels. For example, CARILEC (an association of electric energy providers and stakeholders operating in the electricity industry in the Caribbean and other parts of the Americas) has a CFO working group dedicated to addressing the challenges and opportunities highlighted in this report. ICAC is developing a regional approach to integrating sustainability reporting and assurance into the work of accounting and finance professionals.
- **Demand for New Jobs, Skills, and Education:** The transition offers significant opportunities for economic diversification, supported by educational and learning initiatives to prepare the workforce for the future energy and technology needs.



A ROADMAP TO CARIBBEAN ENERGY TRANSITION

UTILITY SPOTLIGHT

FortisTCI's (Turks and Caicos), a subsidiary of Fortis Inc, provides electricity to 98% of the country (18,000 customers). Its energy transition plan (*"Going Green Onelsland@ATime"*) involves:

- Targeting 33% renewable energy integration by 2040 in the context of a forecasted energy increase of 8.1 percent in 2024 (over 2023).
- Reducing dependence on fossil fuels.
- Lowering electricity costs over time at the same time as delivery reliability.
- Meeting energy growth with environment-friendly sources.
- Feasibility studies and investments to diversify the energy mix including:
 - Using wind as an energy source
 - Solar photovoltaic (PV) land availability study
 - Solar microgrid with battery storage (multiple sites)

FØRTIS TCI

- Natural gas capability (only feasible at one site)
- Evolving technology, such as smarter grids.



RESILIENT NATIONAL ENERGY TRANSITION STRATEGY

With the Government of the Turks and Caicos Islands. FortisTCI developed a 22-year plan including a 33% renewable energy integration target by 2040. The <u>Resilient National Energy Transition</u> <u>Strategy</u> also recommends immediate actions to accelerate the TCI's energy transition including pursuing energy efficiency programs, accelerating implementation of mutually agreed legislation, piloting utility scale solar PV and battery energy storage system (BESS), and further study of wind resource.



FORTISTCI PROPERTY, North Caicos

The NC Microgrid Solar Plus BESS will provide 30% green energy to North and Middle Caicos Islands and reduce fuel usage.

THE ROLE OF THE WORLD BANK IN THE CARIBBEAN

The World Bank is partnering with Caribbean governments to invest around USD 500 million in renewable energy projects to catalyze the clean energy transition by 2025. In addition to raising finance, the World Bank is helping to address implementation capacity and regionally compatible climate transition legislation.

The World Bank's projected investment needed to meet the region's reduction targets as set out in Nationally Determined Contributions is around 12.1% of regional GDP (2020) or \$2.2 Bn by 2030. This investment cannot be delivered solely by public finance and requires attracting private sector investment into climate and energy investments in the region.

The World Bank and other multilateral development banks, including the <u>Caribbean Development Bank</u>, play an important role in providing finance and working with national governments to enable the derisking of private sector investment targeting climate change adaptation and mitigation. Collaboration between multilateral development partners and governments enables innovative models of public-private partnerships and encourages foreign and domestic investment.

For more information, see The Caribbean's Clean Energy Potential: From Fuel Trap to Resilient Hub.

GREENING THE FINANCIAL SYSTEM IN THE CARIBBEAN

The financial sector and accountancy profession are critical to enabling the climate transition. The slow pace of action is partly due to insufficient data and transparency that support the assessment and management of climate risk. However, various initiatives and opportunities are being established to finance the climate transition in the region and more broadly.

- Financing solutions to mobilize capital, including green, social, sustainability and sustainability-linked (GSSS) bonds and blended finance.
 - The Dominican Republic is the only Caribbean country to have issued a Framework for Green, Social and Sustainable Bonds, although other Caribbean countries are now advancing sustainable finance frameworks. Sustainable finance framework development in the Caribbean is highlighted in The Surge of GSSS Bonds in Latin America and the Caribbean, Facts and Policy Implications, OECD. Around \$1.5 billion in green bonds have been issued in the Caribbean since 2014 (equating to 10 thematic bonds). However, no Eastern Caribbean Currency Union member state has registered its first GSSS issuance.
 - Blended financing arrangements enable risk sharing. Bringing together private capital, such as from banks, with financing and guarantees from multilateral development banks and governments helps de-risk investments. The World Bank and Eastern Caribbean Central Bank Green Finance Strategy Project is designed to overcome the challenges of GSSS issuance, including the development of sustainable finance frameworks and addressing technical and institutional capacity in member governments and within the corporate community.
- 2. A range of financial products is being developed to address the financial risks of natural disasters. Disaster risk financing strategies, such as Jamaica's risk financing framework as part of its comprehensive Natural Disaster Risk Financing Policy, are designed to provide access to financial resources in the event of a natural disaster. The optimum mix of approaches depends on the types of risks faced and the frequency and severity of disaster events and can include market-based risk transfer products (for risk transfer), contingent financing products, and budget reserves (for risk retention). The Caribbean Catastrophe Risk Insurance Facility (CCRIF) pioneers parametric insurance, delivering payouts within days of disasters.
- 3. The Bridgetown initiative, a policy proposal announced by the Barbadian Prime Minister at COP27, called for reform in global financing to address loss and damage expenses related to climate impacts. The proposal includes immediate emergency funding from the IMF for countries, harnessing the power of private sector savings to drive climate efforts and combat environmental degradation, and a significant expansion of multilateral lending to governments by \$1 trillion.



- 4. High-quality carbon credits can play a role in global emissions reduction. Guyana's low carbon development strategy and the operationalization of the REDD+ mechanism (the UN initiative to incentivize developing countries to slow forest destruction and enhance forest carbon stocks) includes the Carbon Credits Purchase Agreement through which Hess will purchase \$750 million of carbon credits between 2022 and 2032 from the Government of Guyana as part of Hess's commitment to achieve net zero scope 1 and 2 GHG emissions on an equity basis by 2050. Guyana has also announced the first carbon credits for use in the UN Airline Compliance Programme.
- 5. The Republic Financial Holdings Ltd. announced in 2024 that it has achieved just over 67% of its pledge to lend and invest US\$200 million in climate financing by the end of 2025. Barbados has been the leading subsidiary, lending over US\$57 million, followed by Trinidad and Tobago, where the bank has lent US\$35.6 million towards the US\$200 million goal. To support renewable energy and energy efficiency in Guyana and Ghana, there have been loans of US\$17.6 million and US\$13.5 million, respectively.

ROLE OF THE PUBLIC SECTOR

Climate adaptation and mitigation investments and strengthening public finances are inextricably linked. Bolstering strategic public investments will help mobilize private sector investment. Improving public financial management and robust public sector accrual-based accounting are the foundation for improving accounting and analysis to enable informed decisions to manage tradeoffs between debt sustainability and climate and development objectives.

Government public expenditure reviews need to incorporate a climate lens to assess current spending in relation to responding to climate risk and prioritizing expenditure to mitigate climate risk and enable the climate transition.

A coherent financing framework and strategy, and public policies and regulation that align incentives and fiscal policy with climate and development objectives, help to provide the conditions to crowd in private finance.

Public finance professionals help advance national energy transitions by:

- Collaborating with national statistical offices to collect relevant climate data and connecting this data to other data sets, including energy and financial data, to determine risk profiles of investments and to drive financing decisions.
- Climate budget tagging (which aligns budget allocations with climate objectives).
- Conducting climate expenditure reviews.
- Engaging in policy and regulatory planning to prioritize and incentivize climate mitigation.
- Tapping into international climate finance.
- Enabling strategic public investments that attract private capital to bolster the green transition.
- Improving transparency through climate finance tracking and reporting.

Monitoring the progress and outcomes of sustainable financing and investment activities by accounting and reporting on sustainability impacts and natural resources is crucial for transparency on and accountability for the long-term impacts of government decisions. Sustainability reporting in the public sector is gaining momentum, with the IPSASB taking the lead in developing sustainability reporting standards, starting with a public sector-specific <u>Climate-related Disclosures standard</u>.





KEY ROLES FOR ACCOUNTANTS ENABLING THE CLIMATE TRANSITION IN THE CARIBBEAN

Accountancy and finance professionals enable companies to develop board and management governance accountability, develop risk mitigation strategies and business cases to seize opportunities, implement robust processes in measurement and reporting, and facilitate financing.

Governance, Strategic Planning, and Risk Assessment

- Incorporating climate-related matters into internal governance, board and management priorities, and business strategy.
- Assess the strategic, operational, and financial implications of climate change to:
 - Steer organizations towards the opportunities for decarbonization and reducing GHG emissions in operations and the supply chain.
 - Understand the risks, liability, and reputational implications of inaction.
- Assist companies and governments in setting climate targets and metrics that are transparent, realistic, and monitored.
- Quantify activities and develop systems for tracking and reporting emissions data and related financial impact assessments.
- Develop climate transition plans that address both climaterelated physical and transition risks, as well as opportunities (e.g., optimizing the utilization of marine vessels, reducing methane leaks, electrification, shifting to renewable energy, and facilitating access to energy markets across nations), and design initiatives to deliver against targets. Transition plans capture a company's strategy for transitioning to a lower-carbon economy, including actions and resources (e.g., financial, human capital, and technological) and the trade-offs in different dimensions such as affordability, reliability, and sustainability.

Reporting and Transparency

- Provide management and investors with the information needed to understand the current and prospective impact of climate-related risks and opportunities on the organization and its financial performance and prospects. The adoption of the IFRS Sustainability Disclosure Standards issued by the International Sustainability Standards Board (ISSB), supported by the Greenhouse Gas Protocol as the global standard to measure greenhouse gas emissions, enables consistent and comparable information on climate risks and opportunities. Together with <u>high-quality assurance</u>, improving the quality of reporting increases confidence and helps to open access to financing by enabling robust risk pricing.
- Strengthen governance and controls to improve the quality and maturity of data and reporting processes. Robust practices in measuring and reporting climate-related matters connected to financial performance are needed for both external disclosures and at a project level.
- Specific considerations for energy industry reporters and the effects of regulatory decisions on their financial reporting. Rate regulation is common in the utility sector and can have a significant effect on a company's longterm financial performance and the reliability of financial statements concerning the impact of regulatory assets and liabilities. The International Accounting Standards Board has an ongoing project on <u>Rate-Regulated Activities</u>.

Advancing High-Quality Corporate Sustainability Reporting and Assurance Preparedness



Building Trust in Sustainability Reporting and Preparing for Assurance: Governance and Controls for Sustainability Information provides a roadmap for organizing and enhancing governance and control systems and outlining steps to align sustainability and financial reporting in terms of quality, timing, and connectivity, and addresses challenges in sustainability reporting.

Mobilizing Financing

- Raise awareness of investable opportunities and advise on the use of green finance and instruments through green bonds, sustainability-linked loans, and publicprivate partnerships, and align sustainable financing arrangements to business strategy and objectives.
- Establish suitable sustainable financing frameworks and criteria aligned with market best practices.
 Consistency and alignment of taxonomies and investment frameworks are crucial in helping financial institutions and companies mobilize capital for investment activities to meet climate targets.
- Establish suitable KPIs and metrics and implement governance and control mechanisms to track and

report on financial instrument performance and ensure adherence to financing agreements.

• Leverage international climate funds like the Green Climate Fund and local financing opportunities to bridge financing gaps.



Sustainable Debt and The Role of Professional Accountants in Business and the Public Sector, provides additional information on sustainable finance products and the key considerations in securing and ensuring confidence in sustainability debt instruments.

Other Considerations

Carbon Border Adjustment Mechanisms (CBAMs)

CBAMs could undermine the competitiveness of commodity exports to the EU, UK, and other countries by increasing the cost of carbon intensive goods. If a carbon price on production is levied within Caribbean nations, the CBAM will not be applied on the imports into the EU and UK. In this scenario, tax accountants will have a role in restructuring tax systems and ensuring carbon taxes or levies accrue to governments in the Caribbean.

Insurance and Risk Management

Access to insurance has become increasingly difficult, particularly in hurricane-affected areas. If insurance can be sourced, its cost has been the highest it has ever been. Accounting and finance professionals can apply their expertise in risk management frameworks, ensuring risk identification, reduction, and mitigation strategies, enabling insurance accessibility and affordability. **Professional accountancy organizations** have an opportunity to enable regional integration, helping to share knowledge and expertise within the Caribbean. This includes leveraging existing capabilities within the region, building and mobilizing the expertise and experience of finance and accounting professionals in the energy industry who can help structure investment opportunities in utilities, advise on energy and infrastructure projects, and help forge partnerships with relevant groups, including the business community and energy solutions providers.

KEY TERMS

Climate adaptation: Taking action to prepare for and adjust to the current and projected impacts of climate change.

Mitigating climate change: Reducing the flow of heat-trapping greenhouse gases into the atmosphere. This involves cutting greenhouse gases from main sources such as power plants, factories, cars, and farms. Forests, oceans, and soil also absorb and store these gases, and are an important part of the solution.

Renewable energy: Energy derived from natural sources that are replenished at a higher rate than they are consumed. Sunlight and wind, for example, are such sources that are constantly being replenished.

An energy transition (or energy system transformation): A major structural change to energy supply and consumption in an energy system. Currently, a transition to sustainable energy is underway to limit climate change. As much sustainable energy is renewable it is also known as the renewable energy transition.

A green economy: A low carbon, resource efficient and socially inclusive. In a green economy, growth in employment and income are driven by public and private investment into such economic activities, infrastructure and assets that allow reduced carbon emissions and pollution, enhanced energy and resource efficiency, and prevention of the loss of biodiversity and ecosystem services.

Sources: GCA, EEA, UN, UNEP

ABOUT IFAC

IFAC, by connecting and uniting its members, makes the accountancy profession truly global. IFAC member organizations are champions of integrity and professional quality, and proudly carry their membership as a badge of international recognition. IFAC and its members work together to shape the future of the profession through learning, innovation, a collective voice, and commitment to the public interest.



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ABOUT ICAC

The Institute of Chartered Accountants of the Caribbean (ICAC) was established on October 28, 1988, bringing together accountants within the English–speaking Caribbean. The founding members of the ICAC were Bahamas, Barbados, Belize, Guyana, Jamaica, St. Lucia, and Trinidad & Tobago.

Today, with a network of over 4,000 professionals, the ICAC has grown to become the leading regional organization dedicated to advancing the interest of accountants and professionals in the finance industry within the Caribbean and parts of Latin America.