

BELIZE

ENERGY REPORT CARD (ERC) FOR 2021



INTRODUCTION

This document presents Belize's Energy Report Card (ERC) for 2021.

The ERC provides an overview of the energy sector performance in Belize. The ERC also includes energy efficiency, technical assistance, workforce, training and capacity building information, subject to the availability of data.

This ERC includes data and information that was provided by government ministries, agencies, or departments, with responsibility for energy, utilities, and statistical offices.

The data collected was supplemented by internet research, author calculations and inferences.

This data is a collection from a variety of public sources and, as such, is for general information only. It is not intended for decision-making purposes, and therefore reliance placed on the information herein is strictly at the user's risk.



Horizon 2030 Belize: Planning Our Future Together 2010-2030^[4]

National Development Plan/
Overall Country Development Strategy

Belize National Energy Policy Framework (2012)^[5]

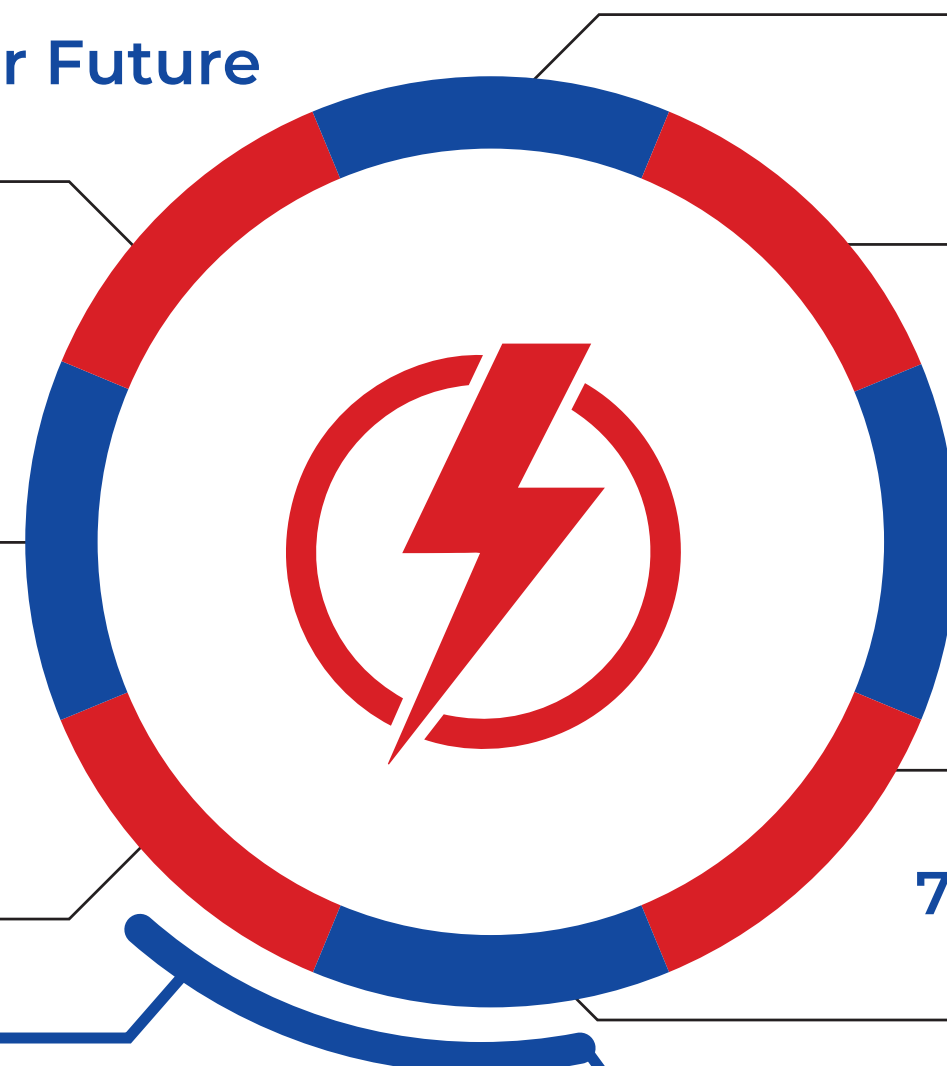
National Energy Policy

Belize Sustainable Energy Strategy & Action Plan² (2015)

Renewable Energy (RE) Policy

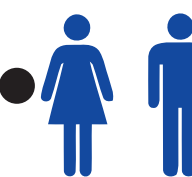
National Determined Contributions (NDC)

A 63% increase in GHG removals related to the Agriculture, Forestry and Other Land Use (AFOLU) sector and an increase of renewable energy projects for grid connected electricity generation.



POPULATION (CENSUS/PROJECTION)

430,191^[1]



\$8,304.90^[2]

GDP (USD) PER CAPITA



75%^[2]

Debt as % of GDP



0.683^[3]

Human Development Index



75% gross generation of electricity from renewable energy sources by 2030^[6]

RE Target



ENERGY PERFORMANCE STANDARDS/
APPLIANCE LABELLING :

Belize Energy Efficiency Labelling Scheme (EELS)^[7]



No. of Persons Employed in Energy Sector³

Not Available



Total Installed Conventional Capacity (MW)

54.4^[8]



Total Installed RE (MW)

79.6^[8]



Electricity System Losses (%)

12.8%^[8]



Energy Use (kWh) Per Capita

1,346.37^[8]



Fuel and Oil Imports as % of GDP

3%^[8]



Oil Imports as % of GDP

Not Available⁴ [8]



Electric Vehicle Stock

Not Available⁵



Climate Change Policy

National Climate Change Policy, Strategy, and Master Plan^[9]



Total Oil Import (BOE) per day

Not Available⁴ [8]



Total Oil Export (BOE) per day

203^[8]

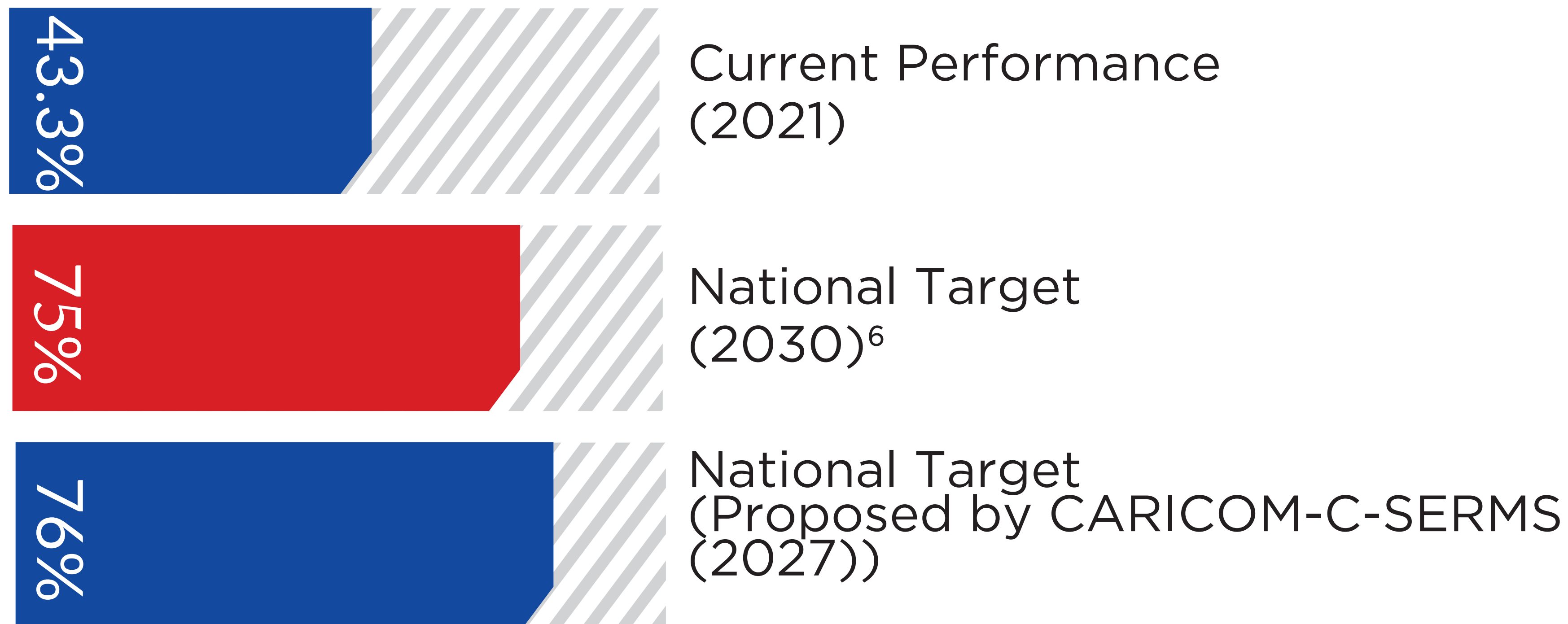


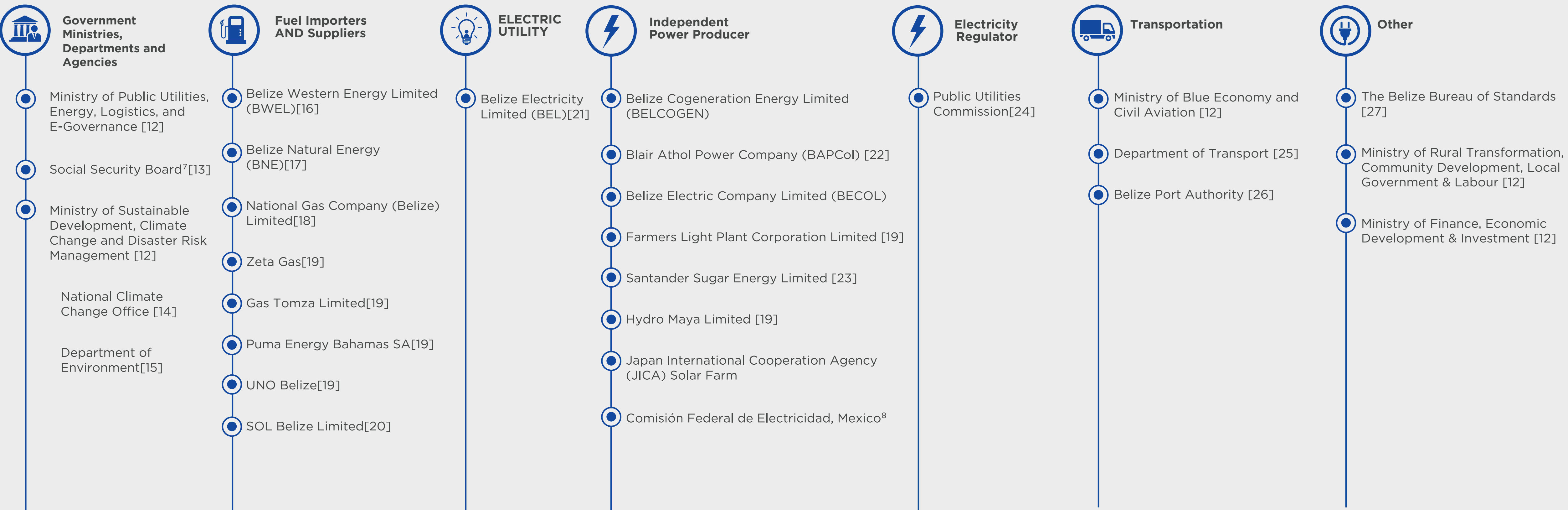
Energy Intensity (BTU/\$)

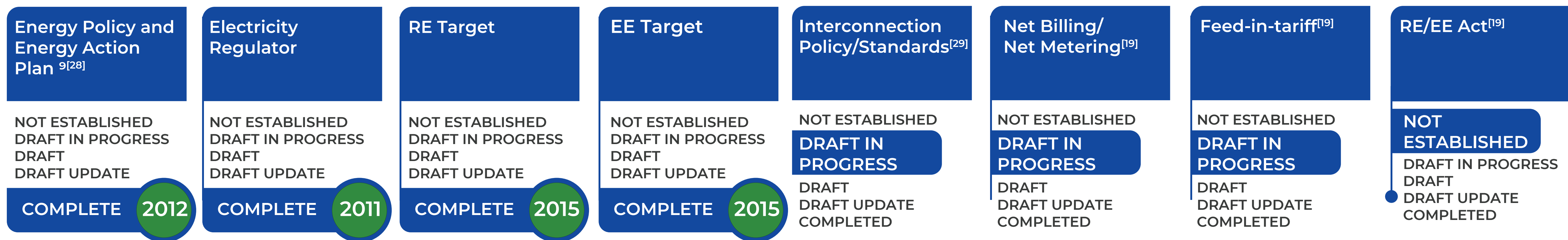
9,049.12^[8]

1. Population Mid-Year Estimate
2. Belize does not have a National RE Policy, however the Belize Sustainable Energy Strategy and Action Plan lays out plans and actions to unlock Belize's RE and EE potential.
3. Data was not available on the workforce in Belize
4. Belize does not import crude oil.
5. The Transport Department has indicated that there are electric vehicles on the road, however the agency has indicated that their registration system does not distinguish vehicle types.

Performance Against Targets





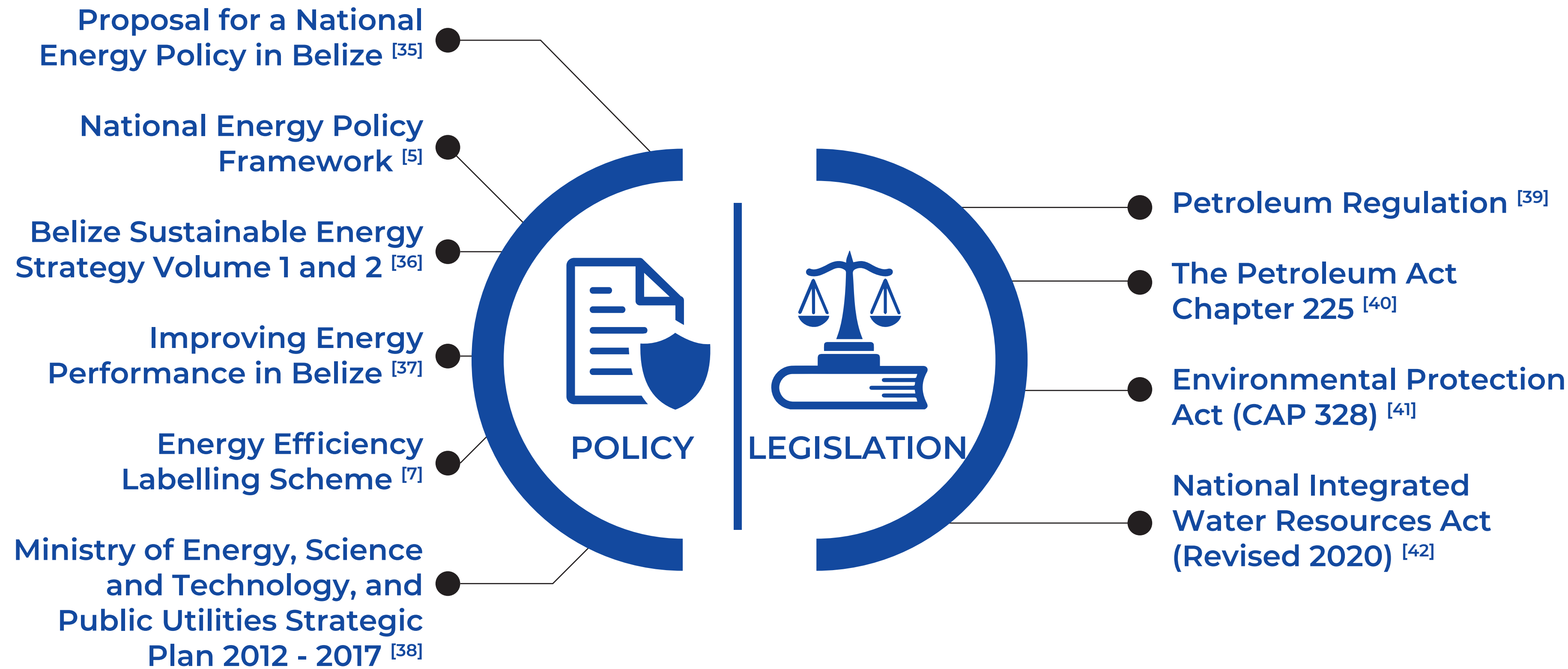


9. The process for the updating/revision of the National Energy Policy of Belize began in 2021 and is expected to be completed by the end of 2022.

Policies and Legislation Relevant to the Energy Sector

KEY ACHIEVEMENTS

PLR Framework Timeline For Electricity Sector



2003	Revised Electricity Subsidiary Act
2003	Revised Public Utilities Commission Act ^[30]
2015	Belize Sustainable Energy Strategy and Action Plan (2015) ^[31]
2018	Belize Consolidated Project Plan (2018) ^[32]
2020	Revised Electricity Act ^[33]
2020 (Revised)	Public Utilities Commission Act ^[34]



LEGISLATION

Motor and Vehicles and Road Traffic Act ^[44]

Civil Aviation Act (CAP 239) ^[45]

Public Roads Act (CAP 232) ^[46]

Habours and Merchant Shipping Act (CAP 234) ^[47]

Belize City By-Laws (CAP 85) ^[48]

Belize Port Authority Act (CAP 233) (2000) ^[49]

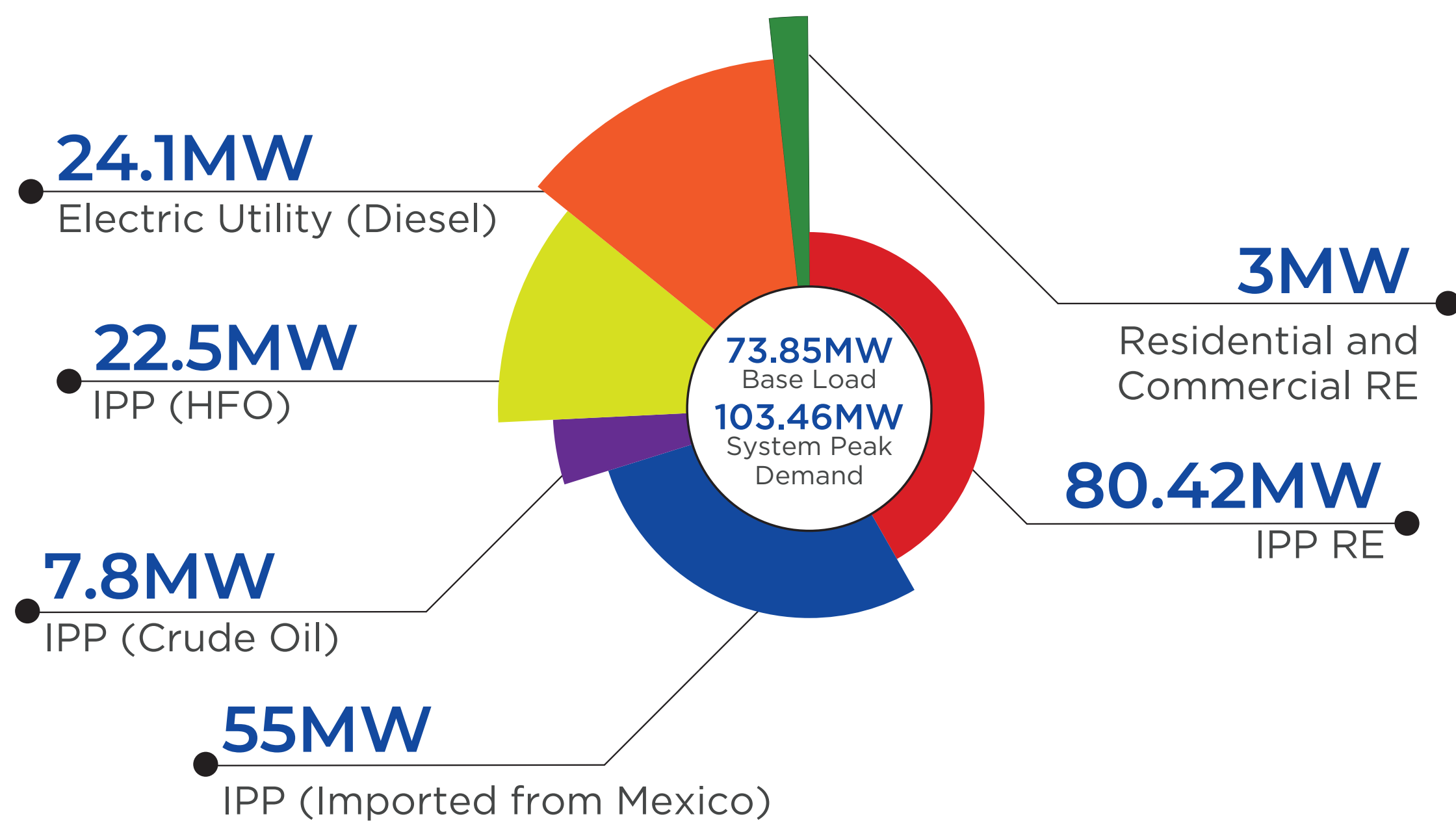
Belize Airport Authority (BAA) Act (CAP 238) (2011) ^[50]



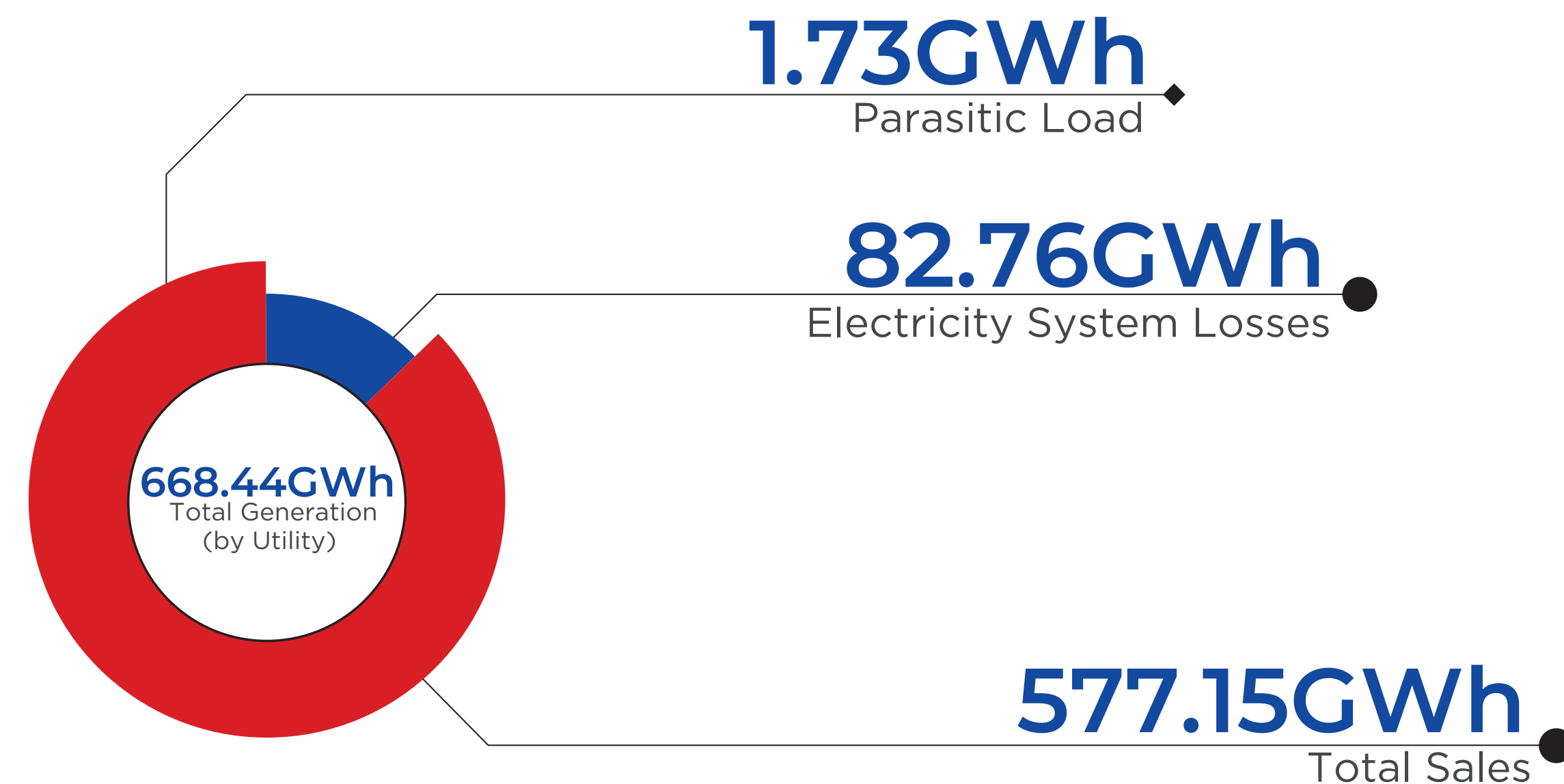
POLICIES

Comprehensive National Transportation
Master Plan for Belize ^[43]

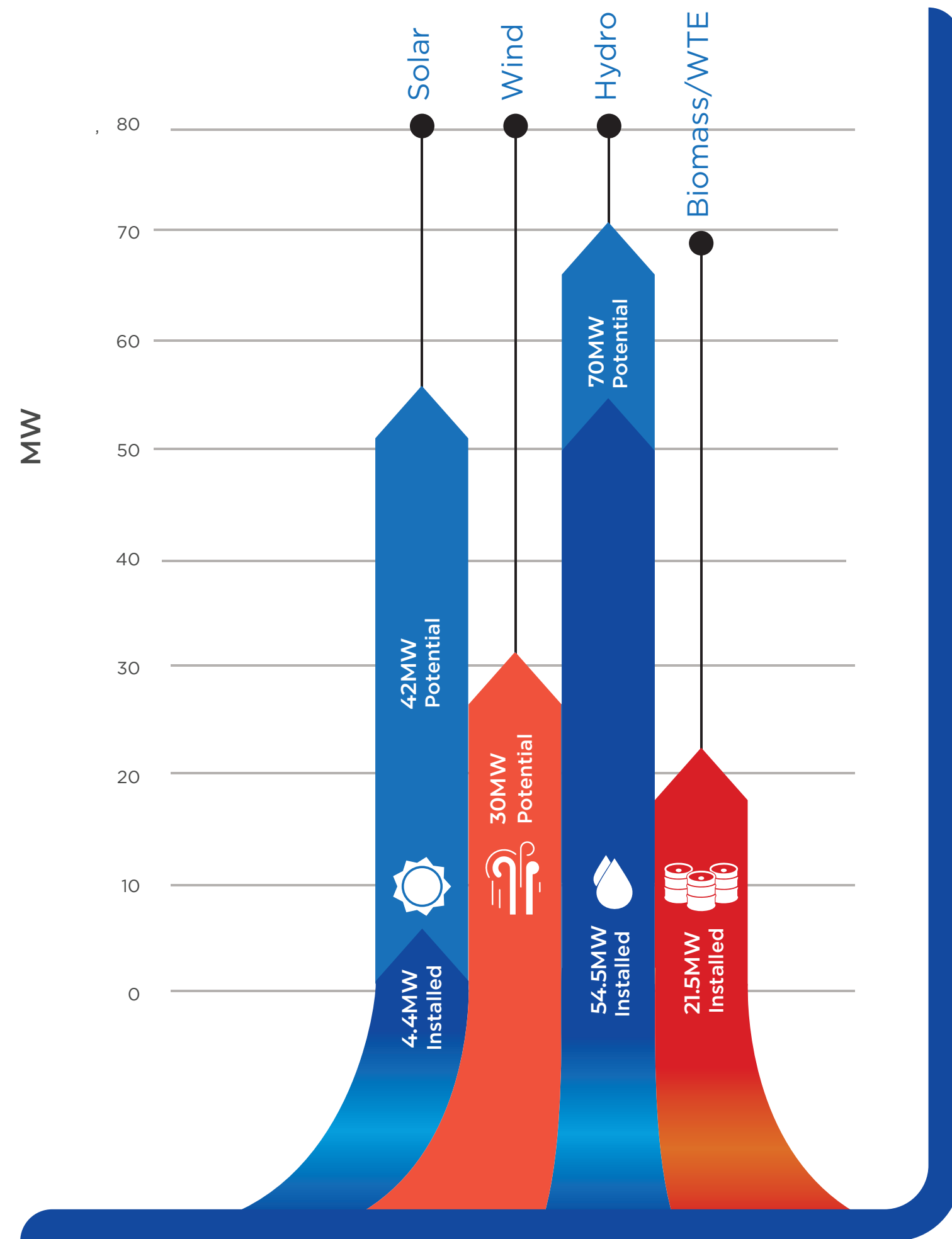
Installed Capacity (MW)



Energy Consumption (GWh)



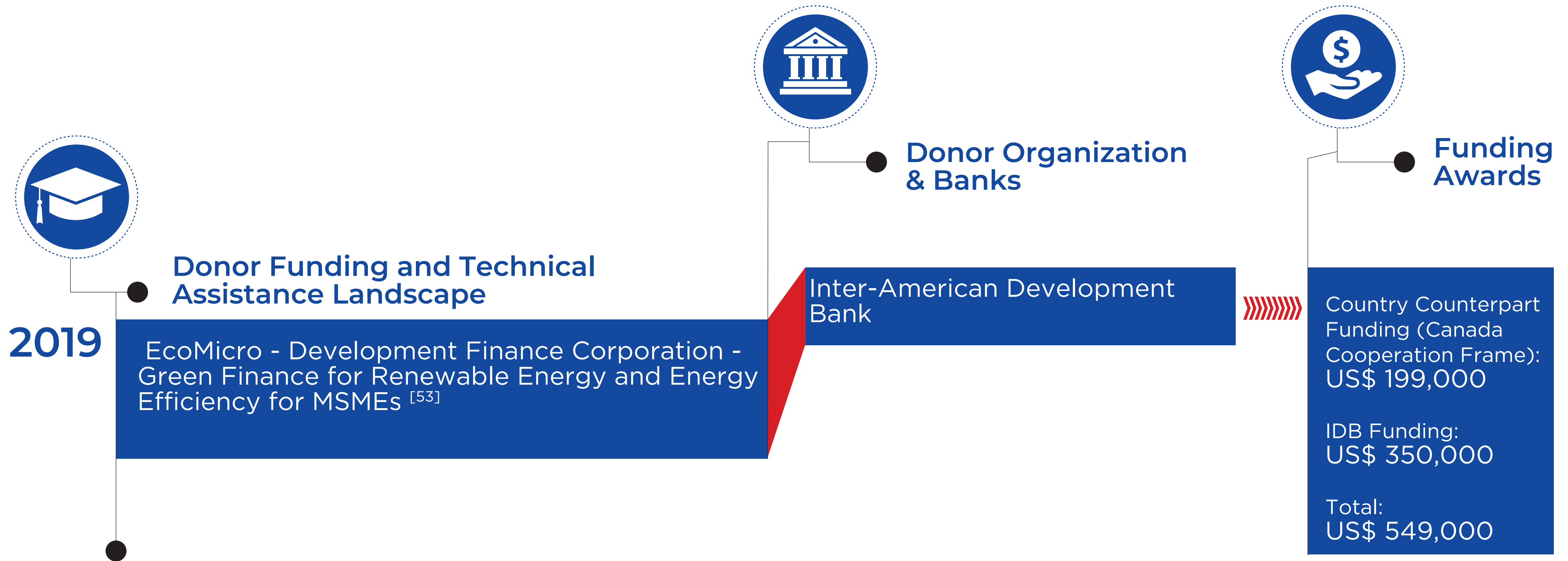
Renewable Energy Resources (MW)



Electricity Tariffs

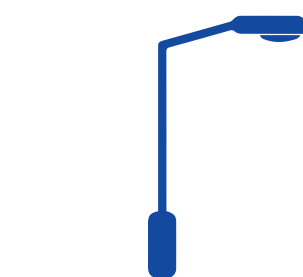
RATE CLASS	MONTHLY CONSUMPTION/DEMAND	RATE (US/kWH)
SOCIAL RATED	0-60	\$0.11
	Min Charge	\$2.50
RESIDENTIAL TARIFFS	0-50	\$0.16
	51-200	\$0.19
	>201	\$0.22
	Min Charge	\$5.00
COMMERCIAL 1	0-50	\$0.17
	51-200	\$0.19
	> 201	\$0.22
	Min Charge	\$5.00
COMMERCIAL 2	0-10,000	\$0.21
	10,001-20,000	\$0.20
	>20,001	\$0.19
	Service Charge	\$75.00
INDUSTRIAL/ LARGE POWER 1	Energy (kWh)	\$0.15
	Demand Charge (kVA)	\$17.91
	Service Charge	\$125.00
INDUSTRIAL/ LARGE POWER 1	Energy (kWh)	\$0.13
	Demand Charge (kVA)	\$11.50
	Service Charge	\$125.00
STREETLIGHTS	Energy (kWh)	\$0.23

Technical Assistance Projects



Energy Efficiency Projects

Renewable Energy Projects



STREET LIGHTING



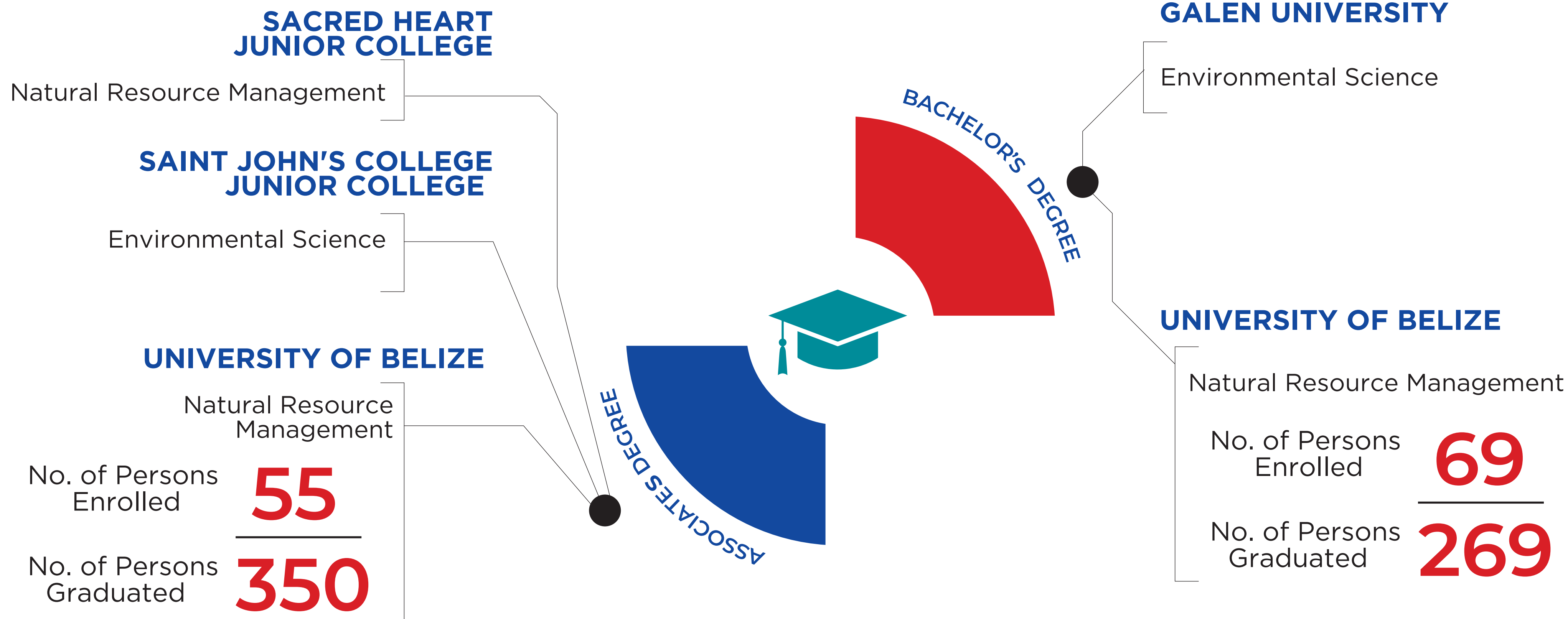
PUBLIC BUILDINGS

	STREET LIGHTING	PUBLIC BUILDINGS
Old/Existing Infrastructure	UNKNOWN	ENERGY
Consumption (KW)	UNKNOWN	
Annual Costs (USD)		€ 199K
Energy Audits	NO	YES
Energy Efficiency Legislation or Regulations	NO	
Energy Service Companies		YES
Change in Old/Existing Infrastructure Expected in Upcoming Calendar Year		
Expected Change in Technology		
Relative Difference in Operating Consumption/Costs		



Renewable Energy Projects

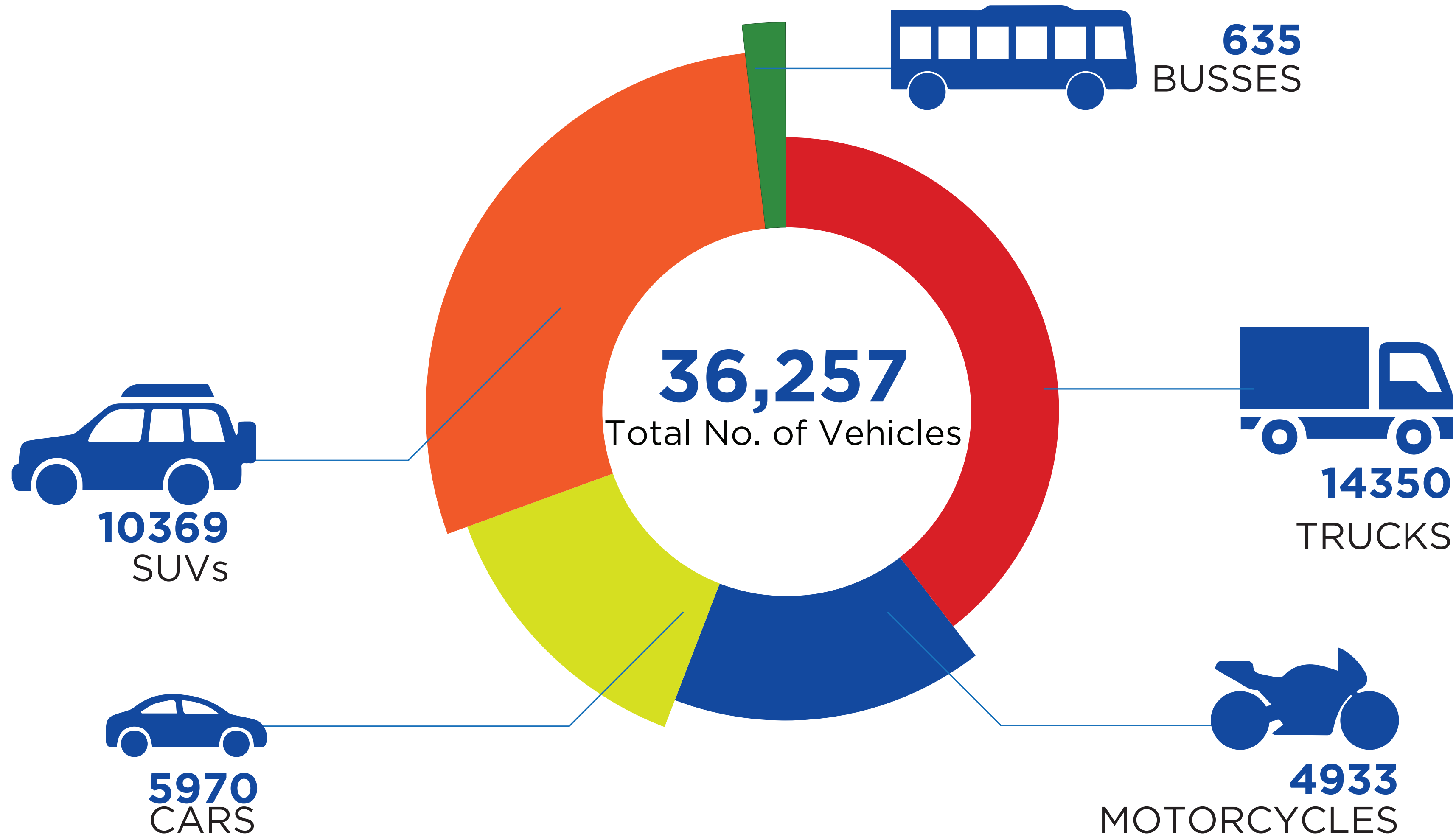
There were no Renewable Energy Projects reported for 2021.





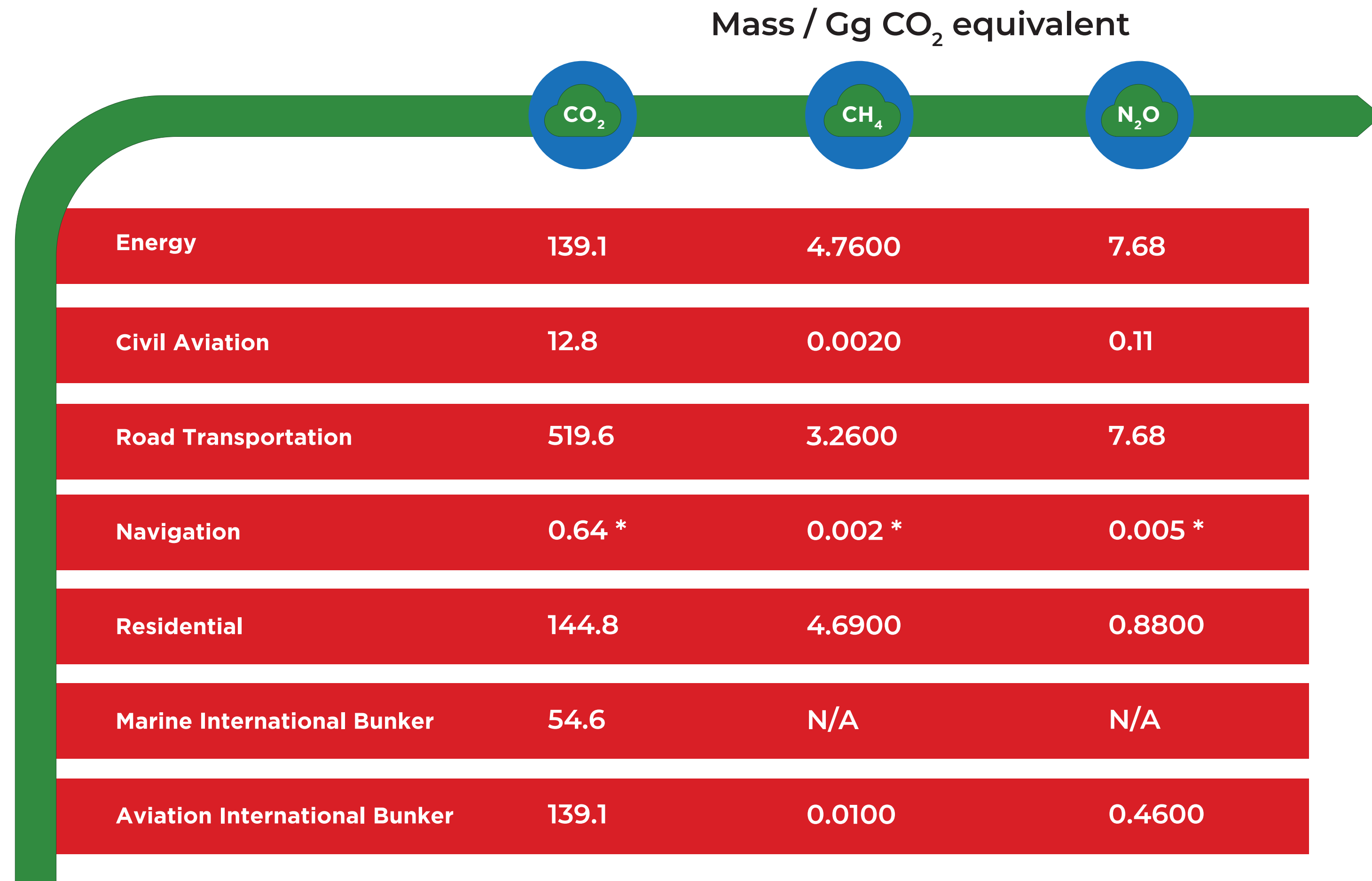
WORKFORCE

Data was not available for the workforce
in the energy sector in 2021



Climate Change Policy	National Climate Change Policy, Strategy, and Master Plan [9]						
National Determined Contributions^[6]	A 63% increase in GHG removals related to the Agriculture, Forestry and Other Land Use (AFOLU) sector and an increase of renewable energy projects for grid connected electricity generation.						
Emissions Reduction Target^[6]	The mitigation actions included in the updated NDC are estimated to result in over 5.6 MTCO ₂ e in cumulative avoided emissions by 2030, and a reduction of 1.0 MTCO ₂ e in annual emissions by 2030 (not including additional deforestation targets)						
Priority Sectors for NDC^[6]	<table border="0"> <tr> <td>Agriculture</td> <td>Transport</td> </tr> <tr> <td>Forestry and Other Land Use (AFOLU)</td> <td>Waste sectors</td> </tr> <tr> <td>Energy</td> <td></td> </tr> </table>	Agriculture	Transport	Forestry and Other Land Use (AFOLU)	Waste sectors	Energy	
Agriculture	Transport						
Forestry and Other Land Use (AFOLU)	Waste sectors						
Energy							
National Communications (NC) to the UNFCCC	<p>Belize First National Communication to the Conference of the Parties of the United Nations Framework Convention on Climate Change [55]</p> <p>Belize Second National Communication to the United Nations Framework Convention on Climate Change [56]</p> <p>Belize's Third National Communication to the United Nations Framework Convention on Climate Change [57]</p>						

Summary of Belize's GHG Inventory Reported for 2018 and 2019^[19]



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