

2020 ENERGY REPORT CARD

ST. VINCENT & THE GRENADINES



CCREEE

CARIBBEAN CENTRE FOR RENEWABLE ENERGY & ENERGY EFFICIENCY

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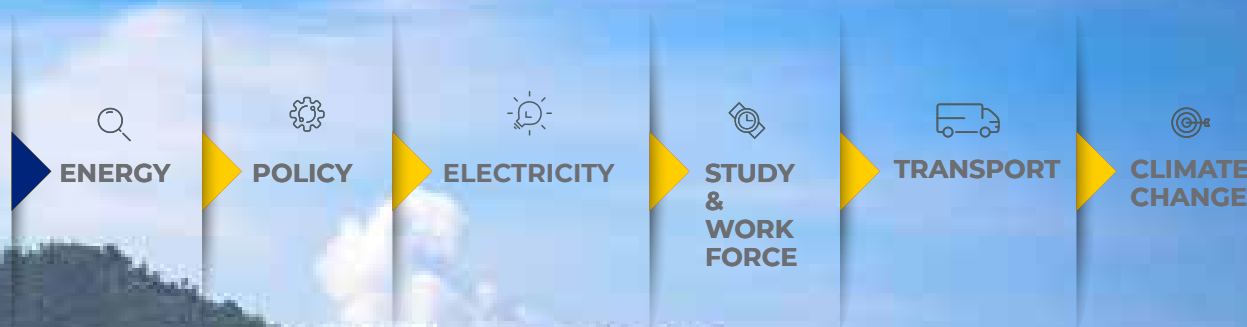


UNITED NATIONS INDUSTRIAL DEVELOPMENT ORGANIZATION



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2020 ENERGY REPORT CARD

INTRODUCTION

This document presents Jamaica's Energy Report Card (ERC) for 2020. The ERC provides an overview of the energy sector performance in St. Vincent and the Grenadines. 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.

ENERGY SECTOR SUMMARY

ENERGY

POLICY

ELECTRICITY

STUDY
&
WORK
FORCE

TRANSPORT

CLIMATE
CHANGE

Population
(Census/
Projection)
110,940

[1]

National
Energy Policy
**St. Vincent and the
Grenadines National
Energy Policy**
(2009)

[6]

National
Development
Plan
National Economic
& Social Development
Plan
(2013)

[5]

RE Target
60.00% by 2020

[7]

GDP (USD)
Per Capita
\$7,457.51

[2]

Human
Development
Index
0.738
(2019)

[4]

Climate
Change Policy
**National Climate
Change Policy of
St. Vincent and
the Grenadines**
(2019)

[11]

Energy
Performance
Standards/
Appliance
Labelling

SVG voluntarily
adapts international
labels. There
isn't a local
standard that is
established

[8]

National
Repository for
Energy Data
**St. Vincent and the
Grenadines Energy Unit
and St. Vincent and the
Grenadines Electricity
Services (VINLEC)**

[14]

Debt as
% of GDP
87.18%

[3]

Total Oil
Import (BOE)
per day

**Not
Available**

National
Determined
Contributions
(NDC)

60.00% by 2025

[13]

No. of Persons
Employed in
Energy Sector

462

[9]

Total
Installed
Conventional
Capacity (MW)

44.41

[10]

Renewable
Energy (RE)
Policy
None

Electricity
System
Losses (%)

7.16%

[10]

Energy Use
(kWh) Per
Capita

1593.79

[10]

Total Oil
Export (BOE)
per day

None

Energy
Intensity
(BTU/\$)

**Not
Available**

Total
Installed
RE (MW)

8.80

[10]

Electric
Vehicle Stock

3



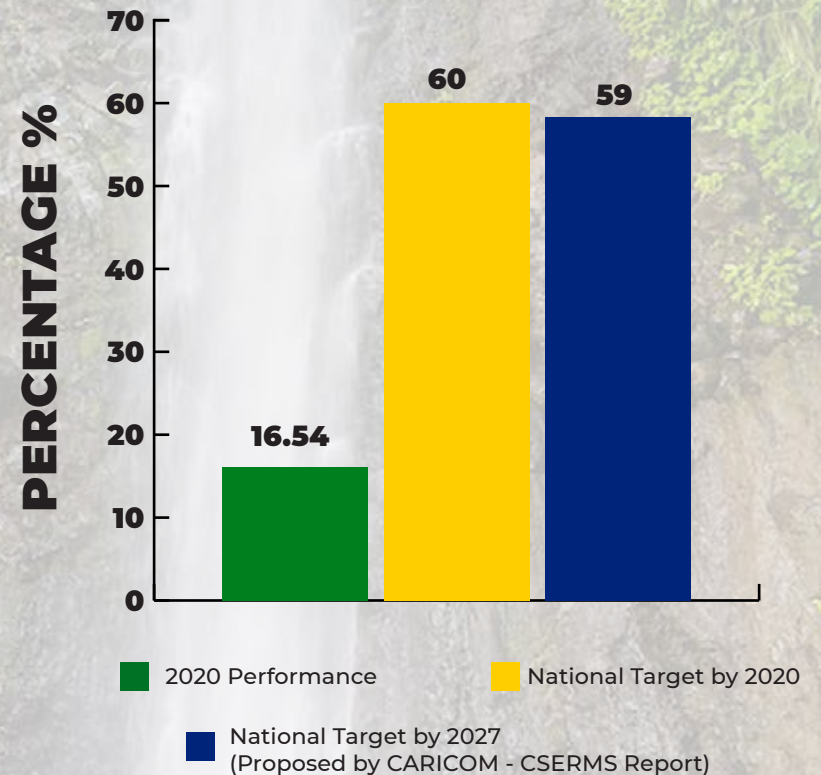
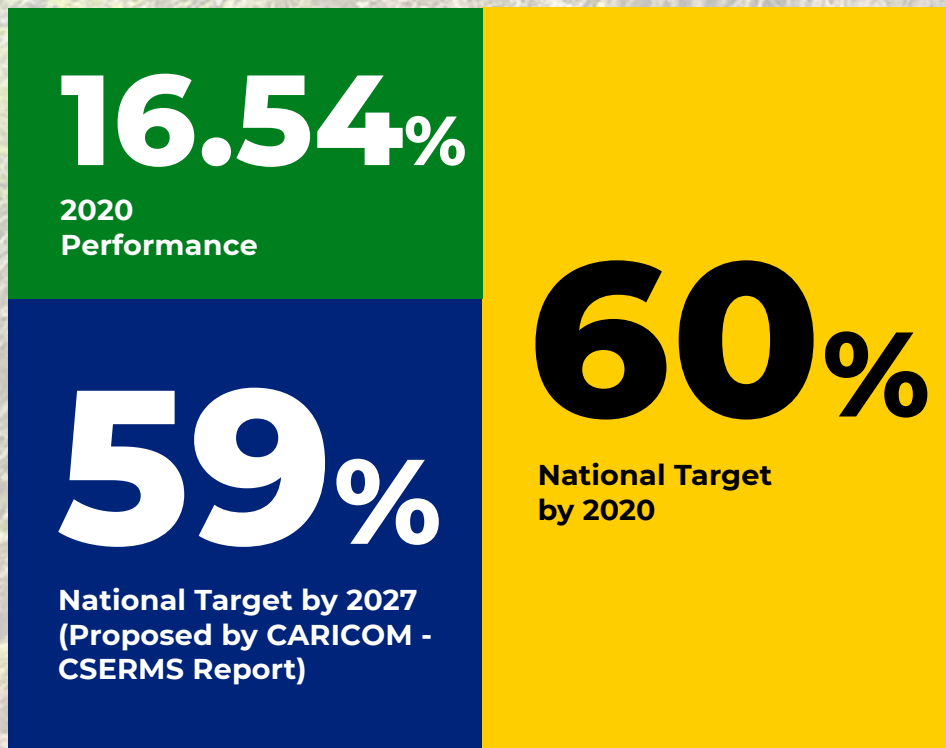
CCREEE

CARIBBEAN CENTRE FOR RENEWABLE
ENERGY & ENERGY EFFICIENCY

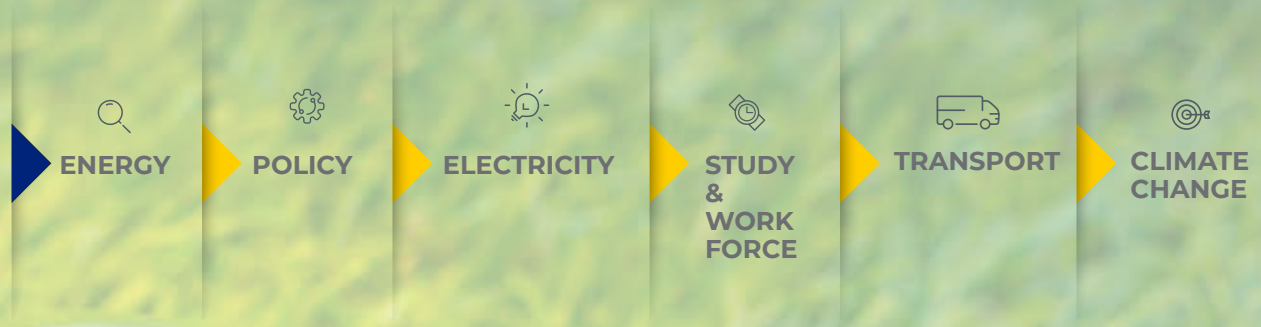


RENEWABLE ENERGY PERFORMANCE AGAINST TARGETS

PERFORMANCE AGAINST TARGETS



KEY ENERGY STAKEHOLDERS



Government Ministries, Departments and Agencies

Ministry of Urban Development, Energy, Airport, and Sea Port, Grenadines Affairs, and Local Government [15]

Ministry of Health Wellness [15]

Fuel Importers & Suppliers

RUBIS Caribbean [16]

SOL EC Ltd [17]

PDV SVG Limited [18]

Electric Utility

St. Vincent and the Grenadines Electricity Services Ltd. (VINLEC) [19]

Independent Power Producer

Mustique Company Ltd (location on Mustique Island) [20]

CCA LTD (location on Canouan Island) [21]

Electricity Regulator

Cabinet of the Government of St. Vincent and the Grenadines and the Grenadines and VINLEC self regulates [22]

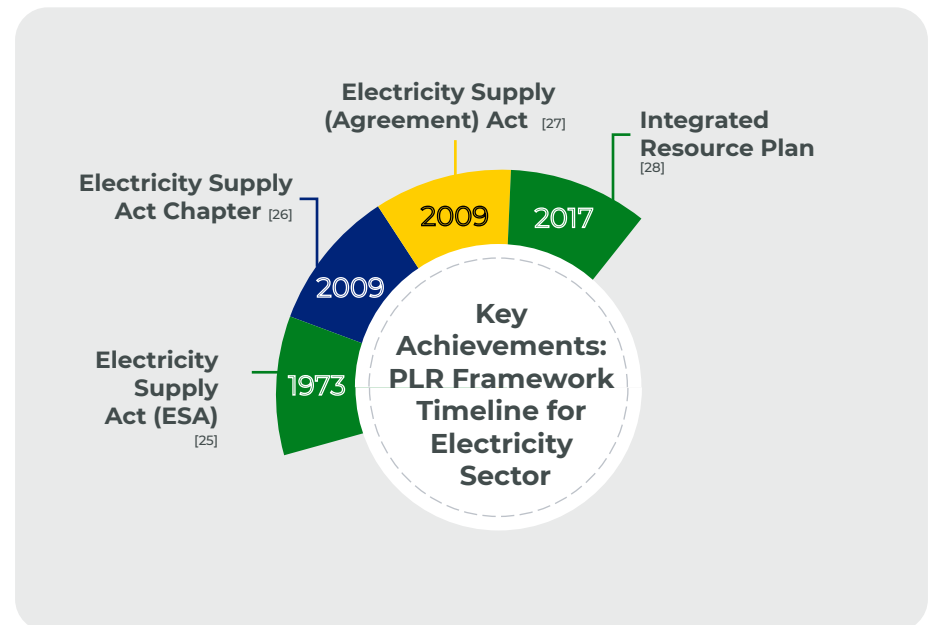
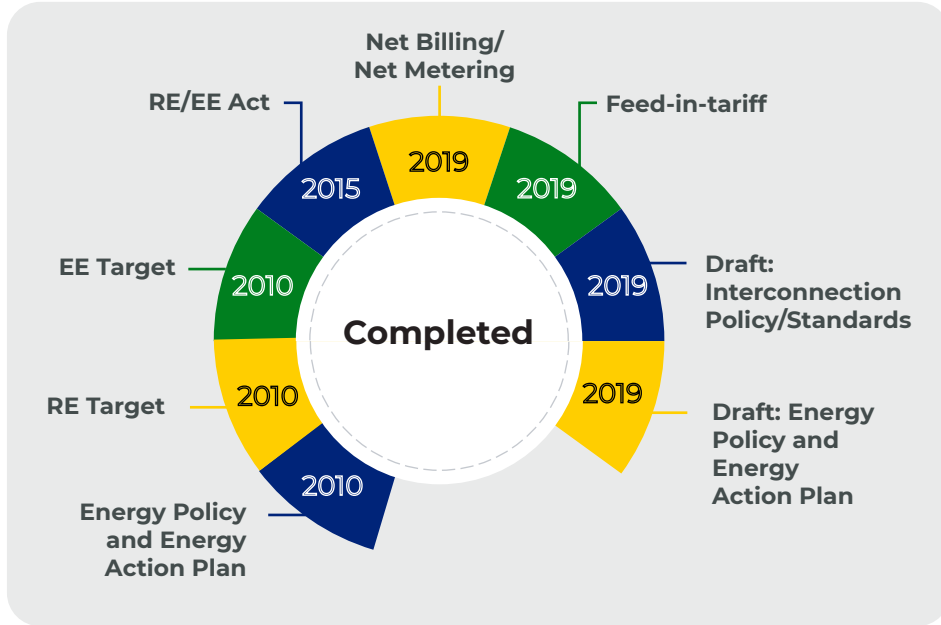
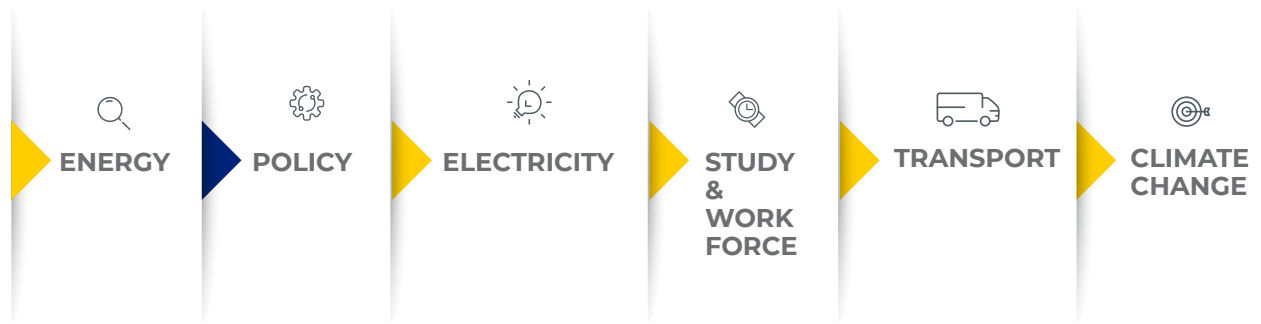
Transportation

Ministry of Tourism, Civil Aviation, Sustainable Development and Culture [23]

Others

St. Vincent Geothermal Company [24]

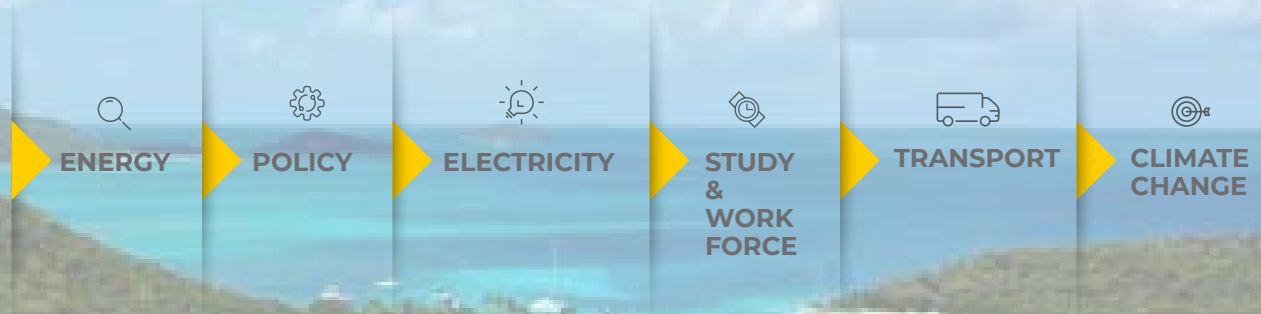
POLICY, LEGAL AND REGULATORY (PLR) FRAMEWORK



POLICIES AND LEGISLATION RELEVANT TO THE ENERGY SECTOR



POLICY, LEGAL AND REGULATORY (PLR) FRAMEWORK



POLICIES AND LEGISLATION RELEVANT TO THE TRANSPORTATION SECTOR

POLICIES

Electric Vehicle Policy (Draft) ^[31]

LEGISLATION & REGULATION

1999

Customs Control and Management Act ^[32]

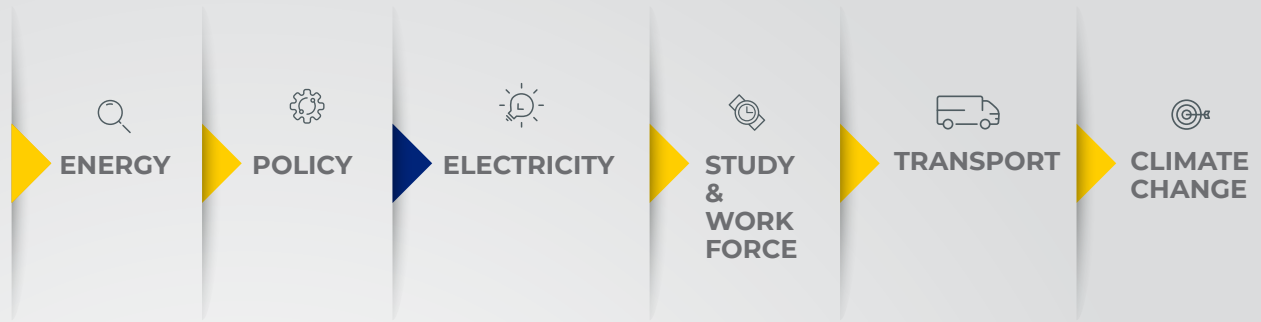
2006

Value Added Tax Act ^[33]

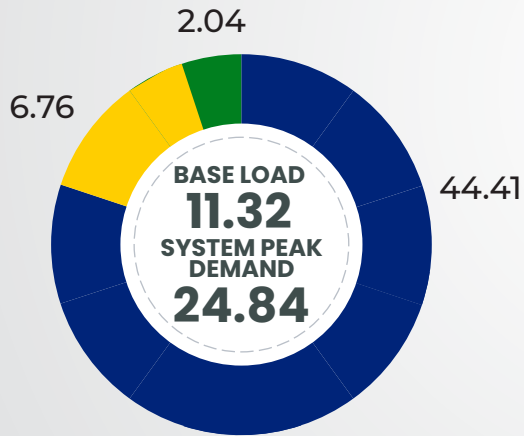
2007

Excise Tax Act No 16 ^[34]

ELECTRICITY AND ENERGY EFFICIENCY



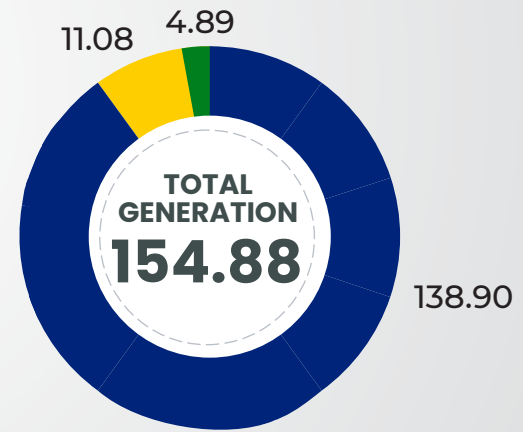
INSTALLED CAPACITY (MW)



Electrical Utility (Diesel) Electrical Utility (RE)

Residential and Commercial/Distribution Generation (RE)

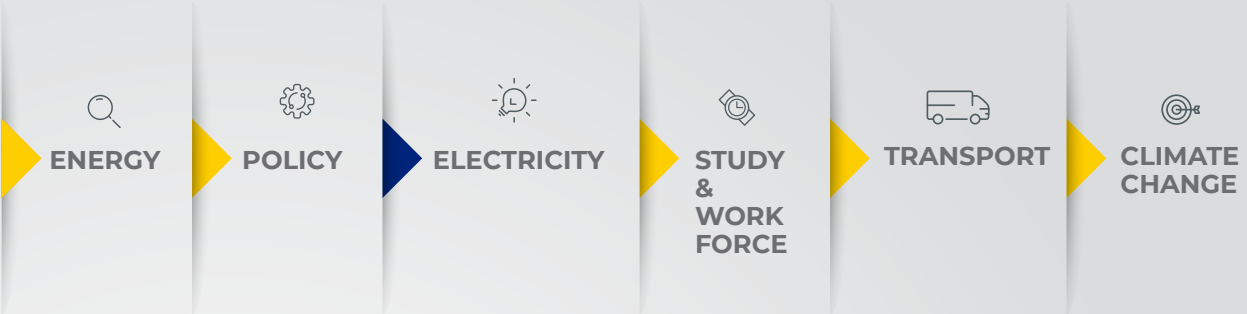
ENERGY CONSUMPTION (GWh)



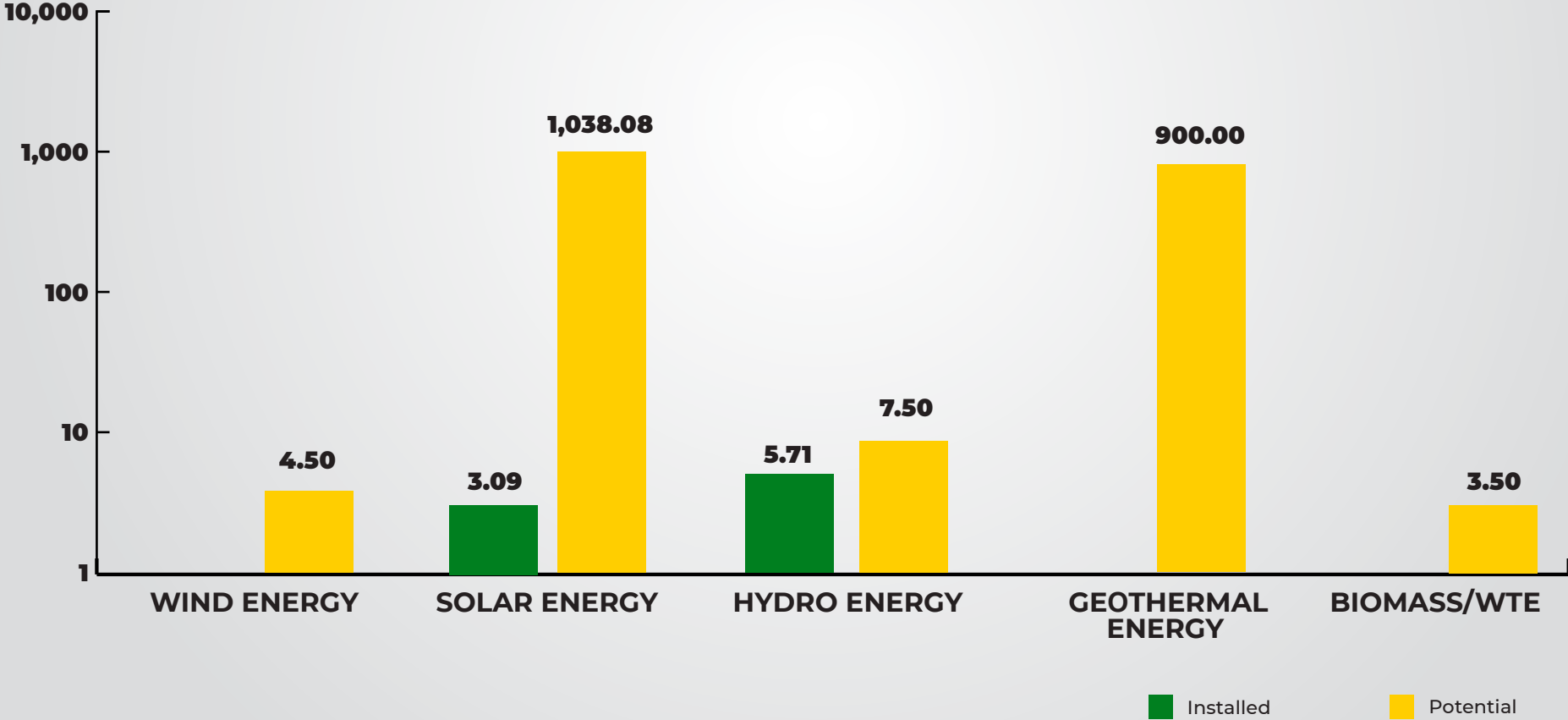
Total Sales Electricity System Losses

Parasitic Load

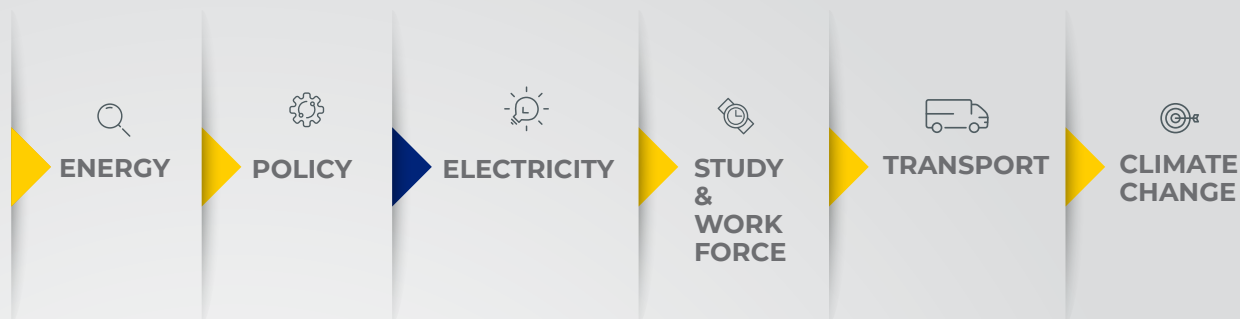
ELECTRICITY AND ENERGY EFFICIENCY



RENEWABLE ENERGY RESOURCES (MW)



ELECTRICITY AND ENERGY EFFICIENCY

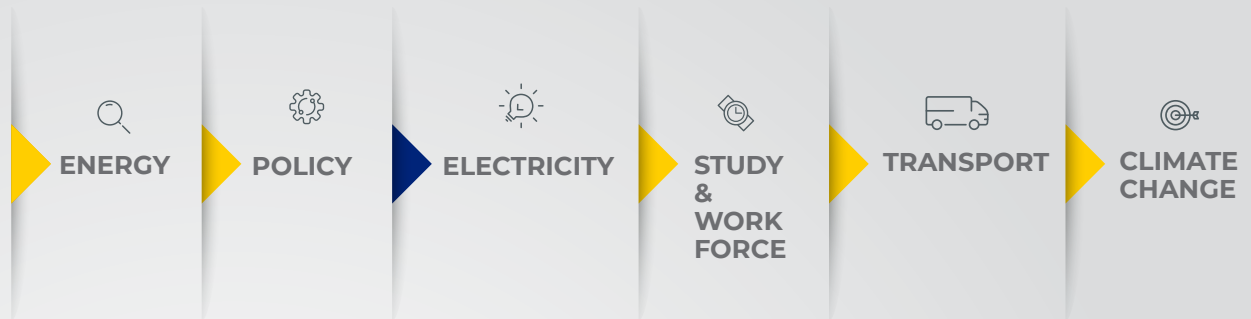


ELECTRICITY TARIFFS

RATE CLASS	MONTHLY CONSUMPTION / DEMAND (kWh)	TARIFF INCLUDING SURCHARGE / (US\$/kWh)
RESIDENTIAL	0	1.85
	50 OR LESS	0.16
	MORE THAN 50	0.18
COMMERCIAL	0 TO 17	5.55
	18 TO 150,000	0.20
	MORE THAN 150,000, LESS THAN 200,000	0.19
	MORE THAN 200,000	0.18
INDUSTRIAL	150,000 OR LESS	0.16
	MORE THAN 150,000, LESS THAN 200,000	0.15
	MORE THAN 200,000	0.14
STREET LIGHTS		0.21

The monthly fuel surcharge rate is applied to all kWh (per unit used) except for streetlights

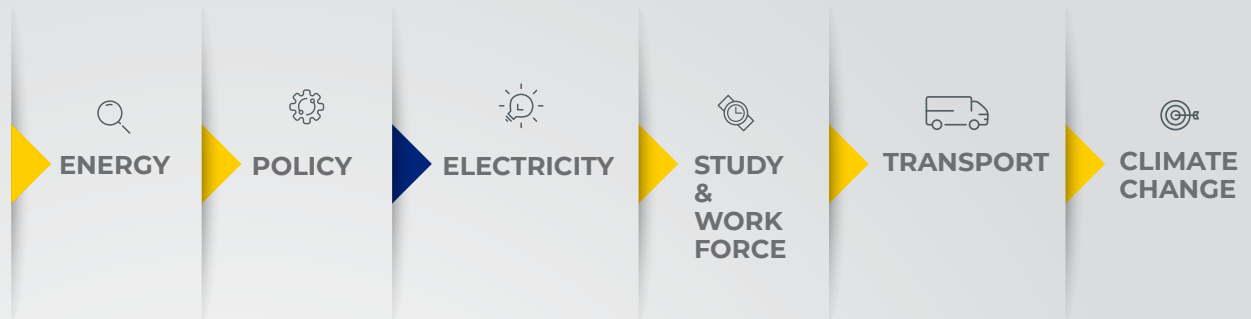
PROJECTS IN THE PIPELINE



TECHNICAL ASSISTANCE PROJECTS

DONOR FUNDING AND TECHNICAL ASSISTANCE LANDSCAPE	DONOR ORGANIZATIONS & BANKS	FUNDING AWARDS (\$US)	YEAR
SUSTAINABLE ENERGY FOR THE EASTERN CARIBBEAN(SEEC)- Energy Efficiency Solar PV project	CDB- Managing the fund, EUCIF-Grant, Department for International Development (DFID)-Grant, EIB-Loan, OCR-Loan	Not Available	2018-2021
SOLAR PV INSTALLATIONS	VINLEC, GEF Small Grants, Government of SVG	Not Available	2012-2020
BEQUIA MIRCOWGRID PROJECT		20 Million	2020
MAYREAU MICROGRID PROJECT	Ray and Tye Noorde Foundation/ RMI and Carbon War room, UNDP-GEF	136Million	2018-present
SVG GEOTHERMAL DEVELOPMENT PROJECT	IRENA/ADFD,DFID, CDB (Geo-smart initiative) - (concessional loan), EU-CIF, IDB(CTF, GEF), Government of SVG, Government of New Zealand	Not Available	2013-2020
CARIBBEAN ENERGY RESILIENCE INITIATIVE	World Bank	Not Available	2019- present
ENERGY FOR SUSTAINABLE DEVELOPMENT IN CARIBBEAN BUILDING(ESD)	UNEP/GEF	Not Available	2015-2020

PROJECTS IN THE PIPELINE



ENERGY EFFICIENCY PROJECTS

ENERGY EFFICIENCY INITIATIVE	CONSUMPTION (KW)	ENERGY EFFICIENCY LEGISLATION OR REGULATIONS	ENERGY SERVICE COMPANIES	CHANGE IN OLD/EXISTING INFRASTRUCTURE EXPECTED IN UPCOMING CALENDAR YEAR
STREET LIGHTING	Approximate monthly consumption of remaining HPS lights in kWh: 57873.67	None	No	100% changeout expected by October 2021
PUBLIC BUILDINGS	Thirteen buildings were deemed eligible for the implementation of EE measures/retrofits.	None	No	Not Available

RENEWABLE ENERGY PROJECTS

RENEWABLE ENERGY SOURCE	RESOURCE AND PROJECTS CAPACITY (KW)	DEVELOPMENT PARTNER	TOTAL ESTIMATED COST	FUNDING SOURCE
SOLAR PHOTO-VOLTAIC	6.2	None	Not Available	Government of SVG
	30	CCCCC	Not Available	UNEP/GEF
	40	CCCCC	Not Available	UNEP/GEF
	600	Part of the SEEC project	Not Available	CDB
GEOTHERMAL	10	None	US\$92 Million	Government of St. Vincent and the Grenadines and Reykjavik Geothermal

TERTIARY PROGRAMMES OFFERED



ENERGY



POLICY



ELECTRICITY



STUDY & WORK FORCE



TRANSPORT



CLIMATE CHANGE

St. Vincent & the Grenadines Community College -

Division of Arts, Sciences and General Studies

Green Engineering (CAPE Subject)

<https://svgcc.vc/division-programmes/dasgs>

Environmental Science (CAPE Subject)

<https://svgcc.vc/division-programmes/dasgs>

AAS Electrical Engineering Technology²

<https://svgcc.vc/programmes/full-time/associate/department-of-engineering#Electrical>

Sector Skills Development Agency -

Campden Park Technical Institute¹

**CVQ Level 1 -
Electrical Installations**

<https://www.ssdasvg.org/index.php/en/programs>

**CVQ Level 2 -
Electrical Installations**

SVG Adult and Continuing Education -

A division of the Ministry of Education

**CVQ Level 1 -
Electrical Installations**

OECS Sustainable Energy Unit

North American Board of Certified Energy Practitioners (NABCEP)

Photovoltaic Associate Course (PVA)

<https://pressroom.oecs.org/oecs-photovoltaic-training-and-certification-for-installers-and-electrical-inspectors>

North American Board of Certified Energy Practitioners (NABCEP)

Photovoltaic Systems Inspector Course (PVSI)

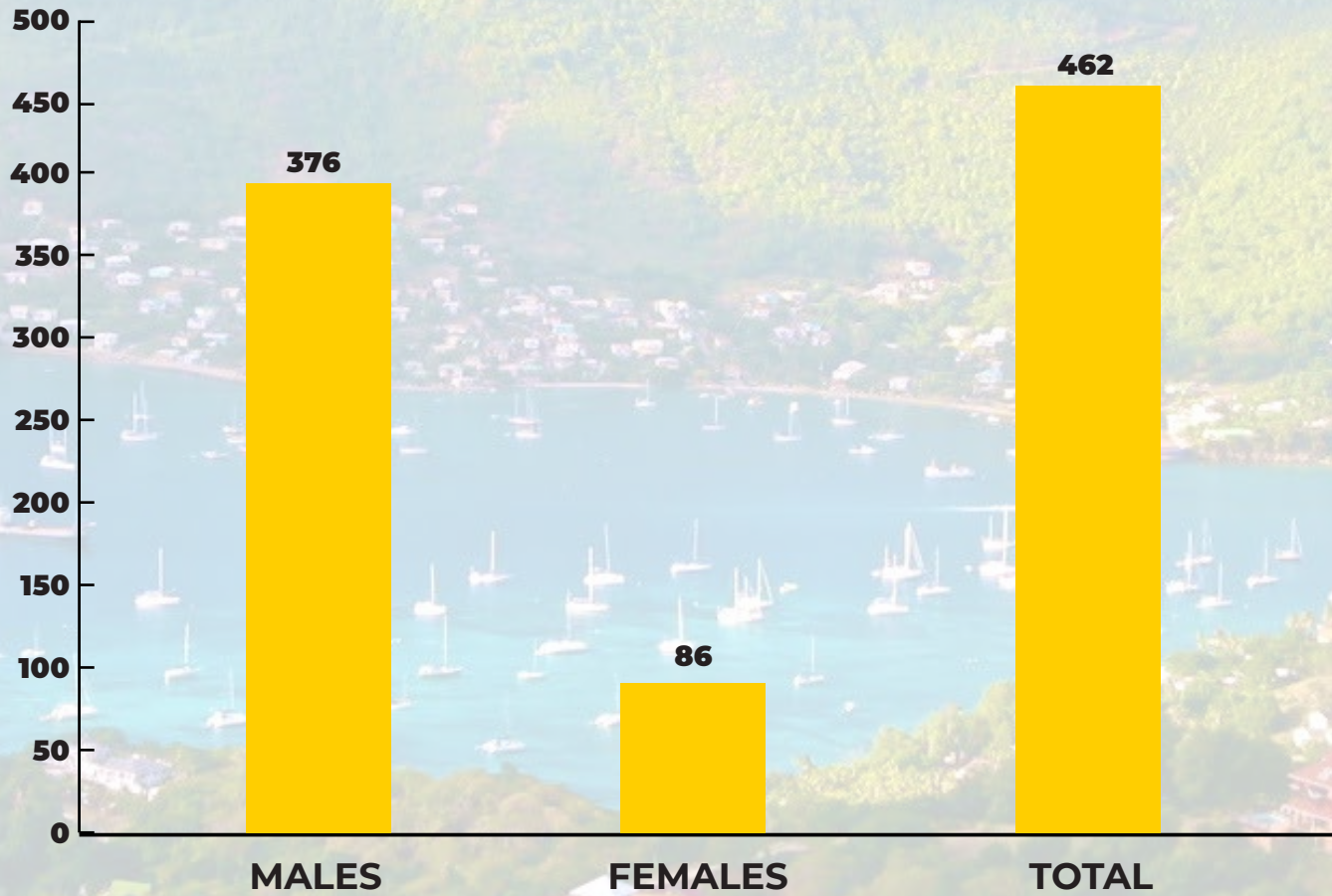
<https://pressroom.oecs.org/oecs-photovoltaic-training-and-certification-for-installers-and-electrical-inspectors>

¹This course is offered at multiple locations; Campden Park, Kingstown Technical Institute, Georgetown Technical Institute and Barrouallie Technical Institute

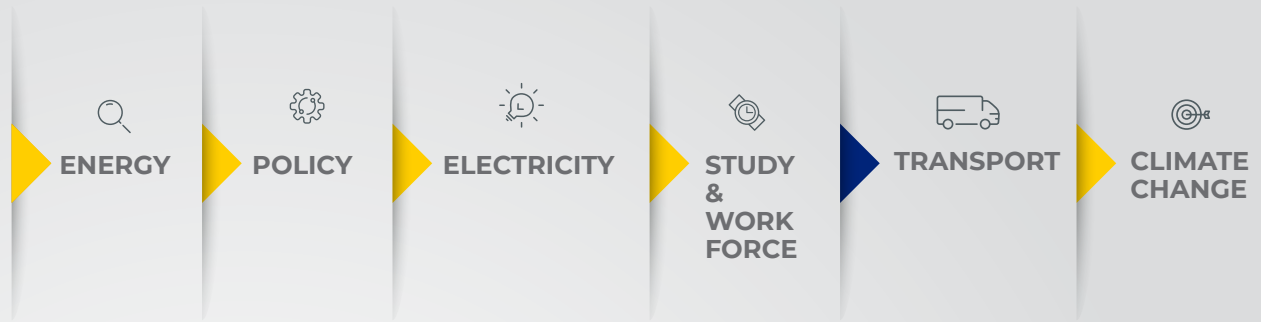
²There is a course called Renewable Energy Technology included in the programme.



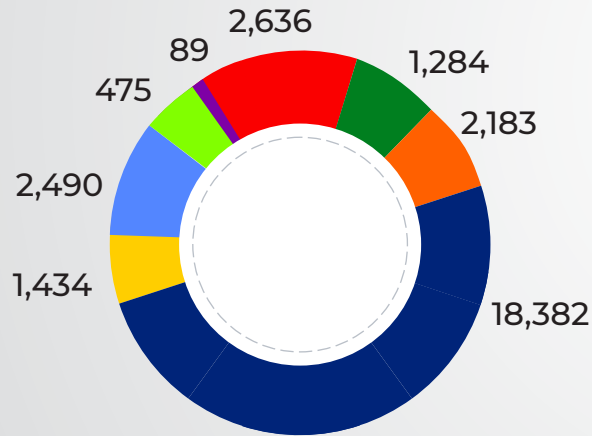
WORKFORCE



TRANSPORTATION SECTOR



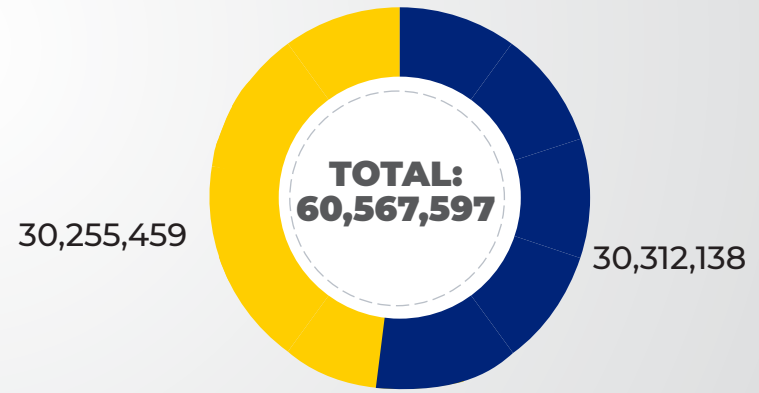
REGISTERED VEHICLES AS OF 2020



- Cars
- Buses
- SUVs
- Heavy Duty Equipment
- Pick up Trucks
- Motor cycles
- Trucks
- Other

There are also 3 Electric Vehicles

FUEL USE IN THE TRANSPORTATION SECTOR (kg)



- Gasoline (Road)
- Illuminating Kerosene
- Gas oils (other than diesel oil)

**There is also:
Diesel (Road) - 527
Kerosene type jet fuel - 9,555**

CLIMATE CHANGE FRAMEWORK

ENERGY

POLICY

ELECTRICITY

STUDY
&
WORK
FORCE

TRANSPORT

CLIMATE
CHANGE

NATIONAL CLIMATE CHANGE POLICY OF SAINT VINCENT AND THE GRENADINES (2019) [12]

NATIONAL DETERMINED CONTRIBUTIONS:

60% by 2025 [13]

EMISSIONS REDUCTION TARGET:

Unconditional, economy-wide reduction in GHG of 22% by 2025 compared to its business as usual (BAU) scenario by 2025 [13]

PRIORITY SECTORS FOR NDCs [6]

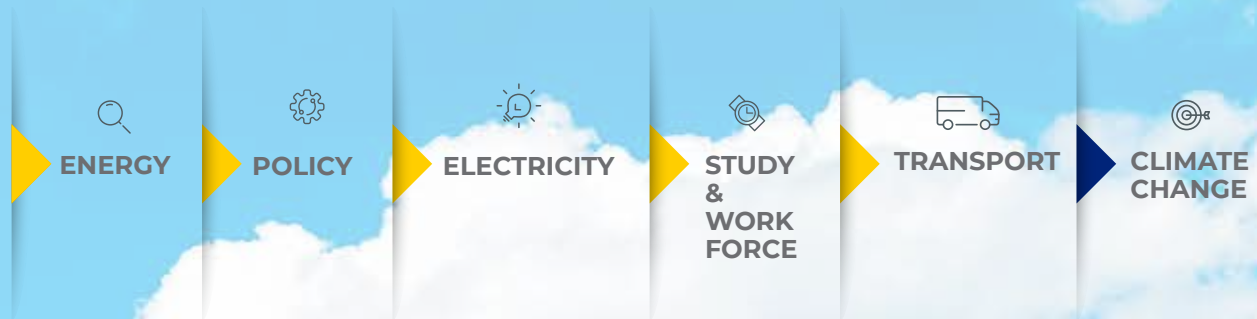
1. Energy (including domestic transportation)
2. Industrial processes and product use
3. Agriculture
4. Land use, land-use change and forestry [13]

NATIONAL COMMUNICATIONS (NC) TO THE UNFCCC:

Initial National Communication on Climate Change [35]

Second National Communication on Climate Change Saint Vincent and the Grenadines [36]

CLIMATE CHANGE FRAMEWORK



GREENHOUSE GAS INVENTORY [36]

EMISSIONS (Gg CO ₂ EQUIVALENT)							
CATEGORIES	CO ₂	CH ₄	N ₂ O	NO _x	CO	NMVOCS	SO ₂
ENERGY	94.057	0.004	0.001		0.019	0.006	0.292
ROAD TRANSPORTATION	3.150		0.018		0.001		
AGRICULTURE/ FORESTRY/FISHING		0.265	0.179		0.188		
WASTE	0.037	2.896	0.007				

Gg represents giga grams

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ENERGY



POLICY



ELECTRICITY



STUDY
&
WORK
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CHANGE

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STUDY
&
WORK
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