HOW TO ASK QUESTIONS

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World Bank Energy sector support in the Pacific

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The World Bank Group

- **International Bank for Reconstruction and Development**: Loans to middle-income and credit-worthy low-income country governments.

- **International Development Association**: Interest-free loans and grants to governments of poorest countries.

- **International Finance Corporation**: Solutions in private sector development.

- **Multilateral Investment and Guarantee Agency**: Guarantees of foreign direct investment’s non-commercial risks.

- **International Centre for Settlement of Investment Disputes**: Conciliation and arbitration of investment disputes.
13 countries, a total population of about 10 million people, 2.2 million people if Papua New Guinea (PNG) and Timor-Leste (TL) are excluded.

9 PICs have populations well below 200,000 people.

In terms of fossil energy sources, only PNG and TL have proven reserves of oil and natural gas (none are known to have domestic sources of coal).

RE resources:
- hydropower potential in Solomon Islands, Fiji, Samoa, & PNG
- geothermal potential in PNG, Vanuatu and Fiji
- solar remains as the main RE option in other PICs (wind second)
1) most countries have high dependence on diesel (90-100 in most countries - apart from PNG, Fiji and also Samoa) - with high costs and prices

2) some of the Melanesia countries still have access issues

3) more generally, there is also weak planning/regulatory frameworks and poor utility performance in some countries
• Facilitating least-cost power infrastructure, including through Public-Private Partnerships; and
• Increasing access to affordable, reliable and sustainable electricity services
• Strengthening energy planning, policy, institutional and regulatory frameworks, and capacity building
• Utilities’ reform: improved performance and sustainability
Projects Under Implementation (and recently closed)

- **Fiji**
  - Geothermal Power Development TA – (ESMAP)

- **FSM**
  - Energy Sector Development Project – (IDA)

- **Kiribati**
  - Grid Connected Solar PV – (GEF/PRIF)
  - Utilities Reform Project – (Joint World Bank/ADB/PRIF)

- **PNG**
  - Energy Sector Development Project - (IDA/GEF)
  - *Linked*: (i) RE Resource Mapping – (ESMAP/ASTAE), (ii) Energy Efficiency Strategic Plan (following the assistance on Third party access code/grid code) – (ASTAE)

- **Solomon Islands**
  - Sustainable Energy Project – (IDA/GEF)
  - Electricity Access Expansion Project – (GPOBA)
  - Tina River Hydropower project (IDA & other partners)

- **Tonga**
  - Tonga Energy Road Map Institutional and Regulatory Strengthening Project – (ASTAE/PRIF)

- **Tuvalu**
  - Energy Sector Development Project – (IDA/SIDS DOCK)

- **Vanuatu**
  - Energy Sector Development Project – (PRIF/ESMAP)
  - Improved Electricity Access Project – (GPOBA)
  - Vanuatu Rural Electrification Project Stage I – (PRIF-NZ)
  - Vanuatu Rural Electrification Project Stage II (SREP, NZ)

- **Regional**
  - Sustainable Energy Finance Project – (GEF)
  - Regional Sustainable Energy Industry Development Project – (SIDS DOCK/GFDR/SREP)
  - Preparation of the Pacific Regional Data Repository for Sustainable Energy for All – (Implemented by SPC) (Bank-executed)
KIRIBATI GRID CONNECTED SOLAR PROJECT

Photos: Courtesy PUB, Kiribati
Vanuatu Rural Electrification Program

Plug and Play Solar Home Systems

Source: Department of Energy
SUSTAINABLE ENERGY FINANCE PROJECT – RISK SHARE FACILITY

Sustainable Energy Finance RSF (Fiji) - leveraged US$40M for a cost around US$1.5M, NPL ratio 1.1%

Photos: Courtesy DoE, Fiji
EXPECTED EVOLUTION OF WORLD BANK PORTFOLIO WITH IDA SCALE-UP (FY17 VS EXPECTED IN FY20)

- **IDA scale-up resources per country expected to triple in IDA18**
- **Energy and extractives to increase from 6 to 15% share in WB portfolio**
- **Ongoing discussions with various countries on priority/focus sector per country**
Priorities going forward

• **Access**: Address access in the countries that still have low access rates. Where additional generation is needed to scale-up access, this would mostly be done through renewables.

• **Affordability/sustainability**: reduce dependency on diesel moving towards renewables (cheaper sources of power), depending on what is available in each country (hydro, geothermal, solar, etc).

• **Planning/regulatory/utility/energy efficiency**: Any new operations would also include TA components for planning and utility/energy efficiency, if relevant, to increase sustainability of the investments.

Use of IDA envelope is agreed as part of strategic partnership strategy agree with the government of each country.
Projects Under Discussion/Preparation (non-exhaustive list)

• FSM  
  › Additional financing under discussion (renewable energy and utility performance - TBC)

• Kiribati  
  › Preparation of SREP investment Plan

• PNG  
  › PNG electrification project under preparation  
  › Support for Naoro Brown project (TA)

RMI  

• Renewable Energy project in preparation

Solomon Islands  

• Renewable energy and access project under discussion (co-financing required)

Regional  

• Possible follow-up risk facility
• Procurement follows WB Guidelines and bidding procedures: www.worldbank.org/procurement
• To be informed of opportunities go to: https://www.devbusiness.com/
Asian Development Bank: Pacific Energy Sector

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ASIAN DEVELOPMENT BANK

• Multilateral development bank est. 1966
• Owned by 67 member countries, including Australia
• Overarching objective to reduce poverty in the Asia-Pacific region
• Financial and technical assistance for infrastructure development
• Sovereign and private sector
• Bank-wide $31.7 billion approved in 2016
• Over 3,000 employees
<table>
<thead>
<tr>
<th></th>
<th>Country</th>
<th>Project Description</th>
<th>ADB</th>
<th>Co-financing</th>
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<td>4.3</td>
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13 projects in 7 countries worth $414 million

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<td>235.6</td>
<td>105.6</td>
<td>73.2</td>
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### ADB PACIFIC ENERGY PIPELINE

**16 projects in 13 countries over 3 years worth over $1.5 billion**

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<td>Tina River Power Plant Project</td>
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<td>VAN</td>
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<td>RMI</td>
<td>Fuel Tank Farm Rehabilitation Project</td>
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<tr>
<td><strong>Total</strong></td>
<td></td>
<td>347</td>
<td>1129</td>
<td>114</td>
<td>1590</td>
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### IPPs Statistics in PICs (August 2016)

<table>
<thead>
<tr>
<th></th>
<th>Number</th>
<th>Capacity MW</th>
<th>Estimated Cost USD million</th>
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<tbody>
<tr>
<td>Existing IPPs</td>
<td>21</td>
<td>114</td>
<td>404</td>
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<tr>
<td>Selected IPPs</td>
<td>23</td>
<td>429</td>
<td>1,670</td>
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<tr>
<td>Planned IPPs</td>
<td>16</td>
<td>202</td>
<td>594</td>
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<tr>
<td><strong>Total</strong></td>
<td>60</td>
<td><strong>745</strong></td>
<td><strong>2,668</strong></td>
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</table>
PRIVATE SECTOR INVESTMENT

- Private sector required to meet investment/capacity needs
- Increasing interest by international and domestic investors
- Some barriers remain
- Main investment flows for IPP’s are into grid connected solar (also hydropower and biomass)
SUMMARY

Increased investment demand
- Structural shift to renewable energy
- Increased demand for private sector investment

Consulting Services
- Renewable energy design and implementation
- Battery storage and grid integration of renewables
- Ongoing engagement rather than one-off feasibility studies
- Good potential for flow on work with utilities
Technology Suppliers

› robust technology with dependable supply chains and support systems

› long term engagement

Contractors

› increasing opportunities

› opportunities for portfolio growth of similar projects across the Pacific

› many logistical similarities with remote Australia
• Procurement follows ADB Guidelines and bidding procedures
• Fund flow is generally from ADB to consultant/contractor
• Opportunities for consultants, contractors and suppliers
• Register at http://www.adb.org/site/business-opportunities/main
RESOURCES

- **ADB**
  - [http://www.adb.org/site/business-opportunities/main](http://www.adb.org/site/business-opportunities/main)

  - Pacific Private Sector Investors Prospectus

- **Pacific Region Infrastructure Facility** [http://www.theprif.org/](http://www.theprif.org/)
  - Power Benchmarking Report 2014

- **ADB Pacific Facebook page**
  - [https://www.facebook.com/adbpacificenergy/](https://www.facebook.com/adbpacificenergy/)
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