

Climate mitigation finance in leveraging private investments in Indonesia

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ABSTRACT

This paper identifies and reviews arrangements by which climate mitigation finance taken from official development assistance (ODA) is used to leverage private-sector investment in Indonesia's greenhouse gas (GHG) emission reduction. It analyses eleven principal mitigation projects taken from 2010–2015 OECD Creditor Reporting System data, using an institutional analysis and development framework. The results show that within Indonesia's complex private-sector history and strong patronage system, mitigation finance has been deployed to support a number of early engagement activities with the private sector at the policy and administrative levels, with a less focus on the political level. Engagements to leverage private investment are initially made through research, prefeasibility studies and capacity-building. At later stages, mitigation finance offers the private sector opportunities to undertake pilot activities. Some pilot activities have had successful outcomes, with private sector entities acting as co-financiers and self-investors in large-scale infrastructure projects via arrangements such as public-private partnerships. Greater understanding of the history and political context of Indonesia's private sector is expected to improve donor and recipient strategies for leveraging private investment in risky projects, developing bankable business plans as well as providing accountability for the use of public finance in business-related international development activities.

ARTICLE HISTORY

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KEYWORDS

Climate mitigation finance;
private-sector investment;
official development
assistance

1. Introduction

Climate mitigation finance (hereafter 'mitigation finance') is a part of official development assistance (ODA) that is limited to paying for developing countries' emissions reduction towards the global target of limiting global temperature rise to 2°C above pre-industrial levels. They require US\$ 180–540 billion investment per year between 2010 and 2030 (Fankhauser et al. 2016). The 2016 biennial assessment of the United Nations Framework for Climate Change Convention (UNFCCC) estimates that the amount of leveraged private finance in 2014 was USD 16.7 billion (Bochner et al. 2015; UNFCCC 2016). This was relatively low, at approximately 41% of the total average flow of public

Rabu,
10 Mei 2017

AGENDA POJOK IKLIM

Pendanaan Mitigasi Iklim dalam Meningkatkan Investasi Hijau di Indonesia oleh Swasta

Aidy Halimanjaya (Independent Researcher and Consultant)



15.00 – 17.00
Ruang Operation Room
Blok 1 lantai 4
Gedung Manggala Wanabakti



Diskusi Pojok Iklim minggu ini akan membahas terkait identifikasi dan tinjauan pendanaan mitigasi iklim. Pendanaan ini merupakan bagian dari bantuan resmi (ODA) yang digunakan untuk meningkatkan pendanaan sektor swasta dalam penurunan emisi GRK di Indonesia.

Melalui kajian akademis yang dipublikasikan di *Journal of Sustainable Finance and Investment* pada bulan Mei 2017, Aidy Halimanjaya menganalisis sebelas proyek mitigasi yang diambil dari data OECD Creditor tahun 2010 – 2015 dengan menggunakan kerangka kelembagaan. Hasil analisis menunjukkan bahwa sejarah perkembangan sektor swasta di Indonesia merupakan jejaring yang rumit dan didominasi oleh sistem patronase yang kuat. Sejauh ini pendanaan mitigasi iklim telah digunakan untuk mendukung sejumlah kegiatan awal untuk meningkatkan investasi sektor swasta terutama dalam aspek administrasi dan kebijakan, fokus pada level pemahaman politik kurang mendapat perhatian walaupun sangat diperlukan.

Upaya untuk meningkatkan investasi sektor swasta pada tahap awal dilakukan melalui penelitian, *prefeasibility study*, dan peningkatan kapasitas. Dalam tahap selanjutnya, pendanaan mitigasi menawarkan sektor swasta kesempatan untuk melakukan kegiatan percontohan. Beberapa percontohan ini tergolong sukses dimana entitas sektor swasta bertindak sebagai pemodal dan investor sendiri dalam proyek infrastruktur berskala besar, melalui kerjasama sektor swasta dan pemerintah.

Pemahaman yang lebih dalam tentang konteks sejarah dan politik dari sektor swasta di Indonesia diharapkan dapat meningkatkan strategi donor dan penerima pendanaan untuk memanfaatkan investasi swasta dalam proyek yang beresiko, pengembangan rencana bisnis, serta meningkatkan akuntabilitas penggunaan keuangan publik dalam kegiatan pembangunan internasional.

Afiliasi saat ini



Sarjana ekonomi
Sarjana ilmu bisnis



UNIVERSITAS PADJADJARAN

Magister ilmu
Kebijakan publik



Doktoral ilmu
Pembangunan
internasional



Peneliti senior
Keuangan
perubahan iklim



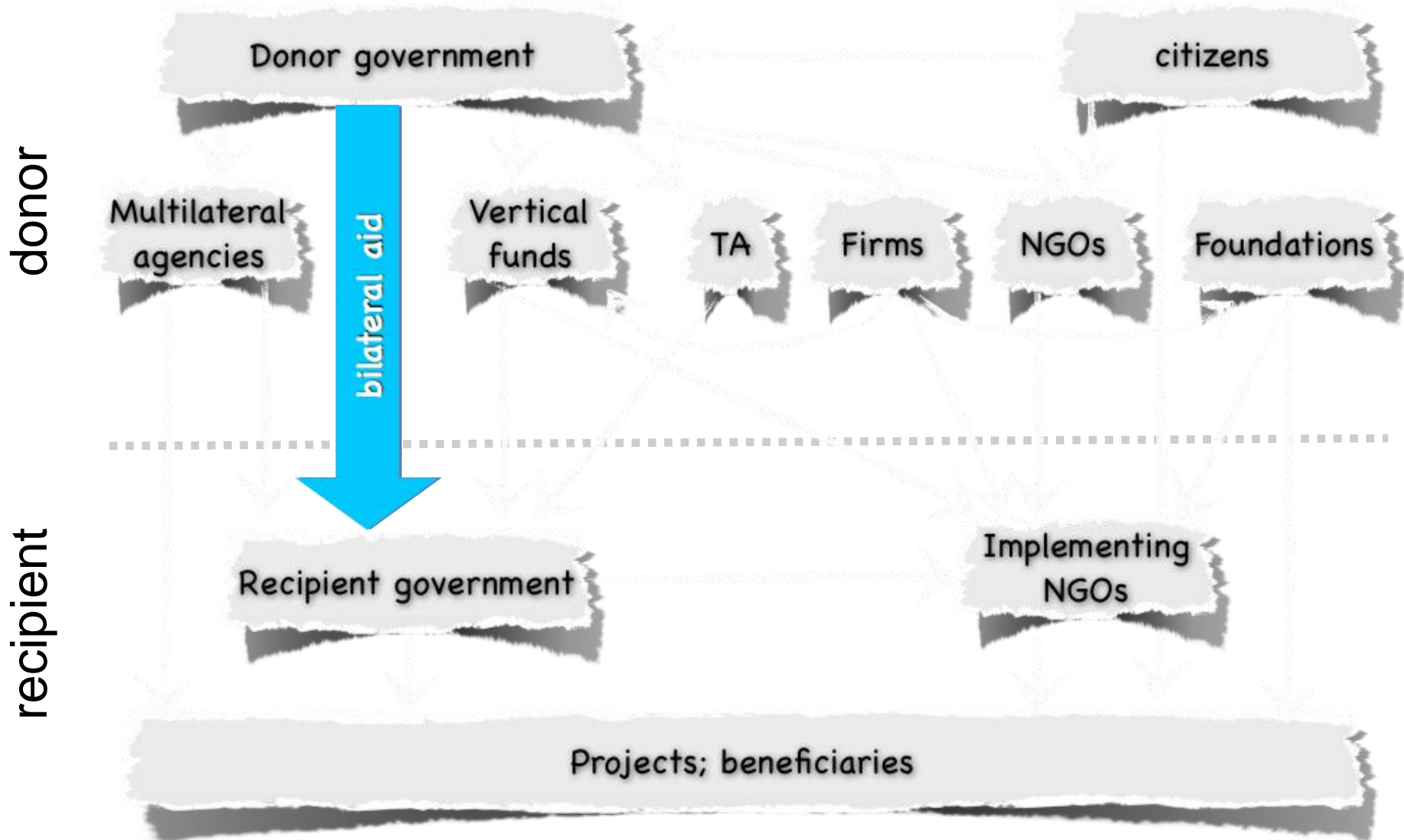
Konsultan/peneliti

Saat ini membantu proyek:

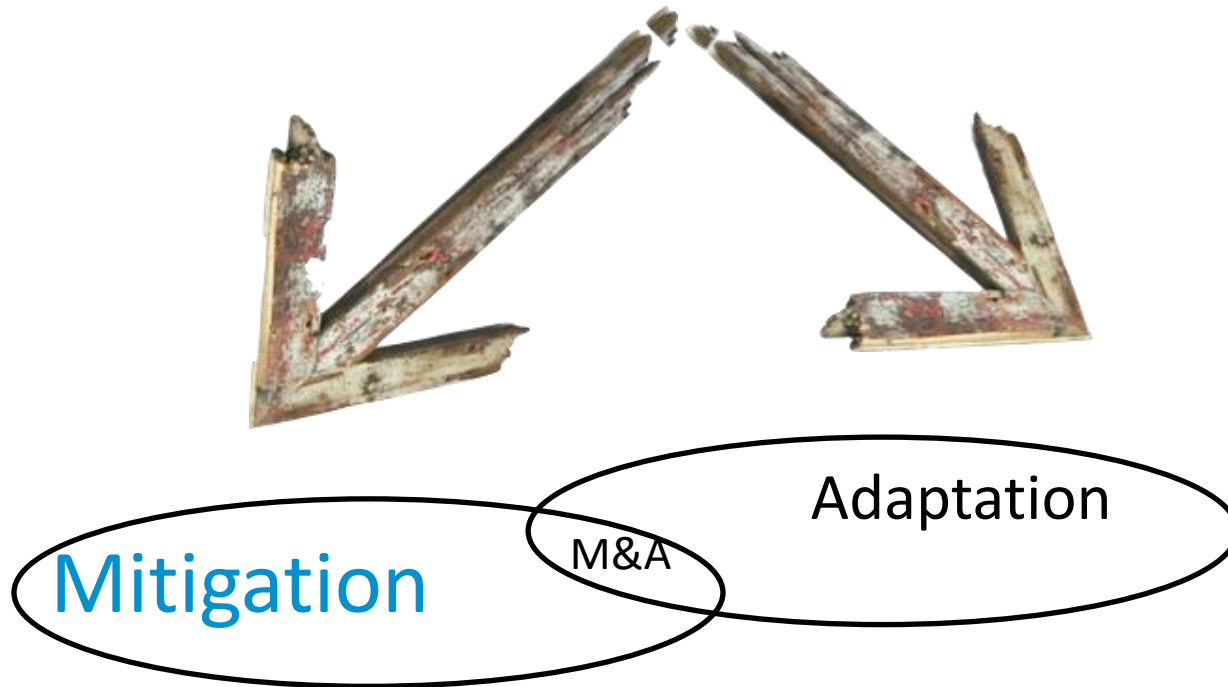


green growth, sustainable future
perumbuhan hijau untuk masa depan berkelanjutan

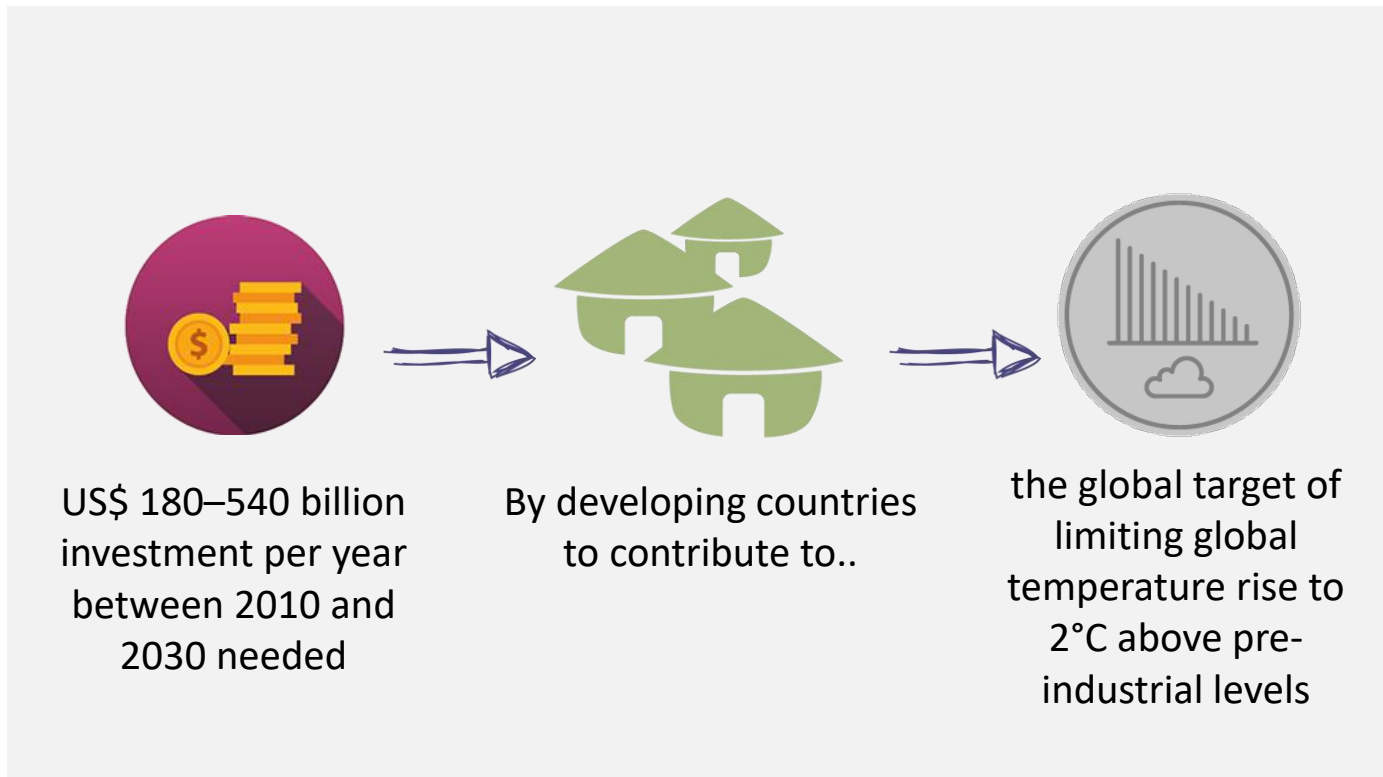
Aid landscape



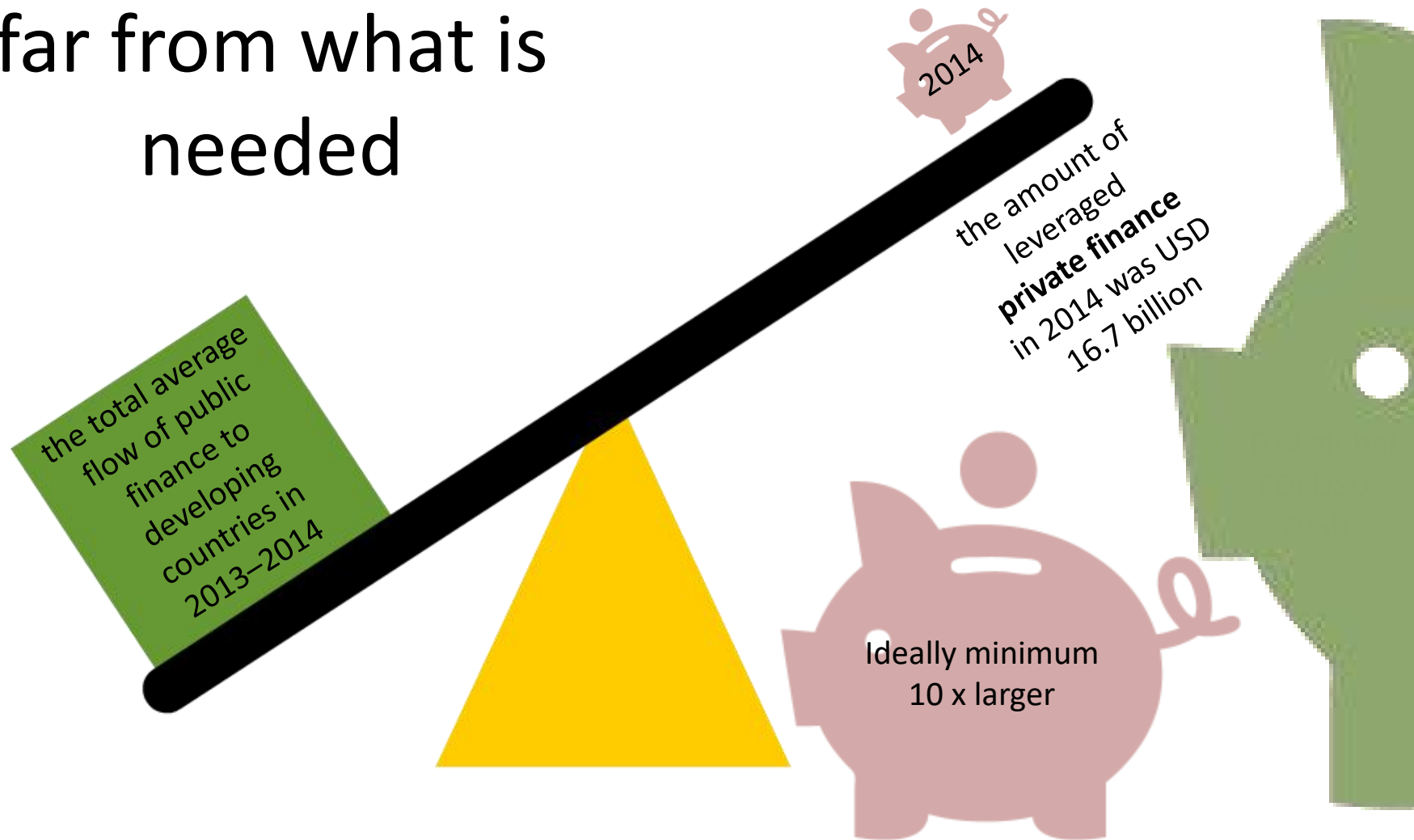
Climate finance



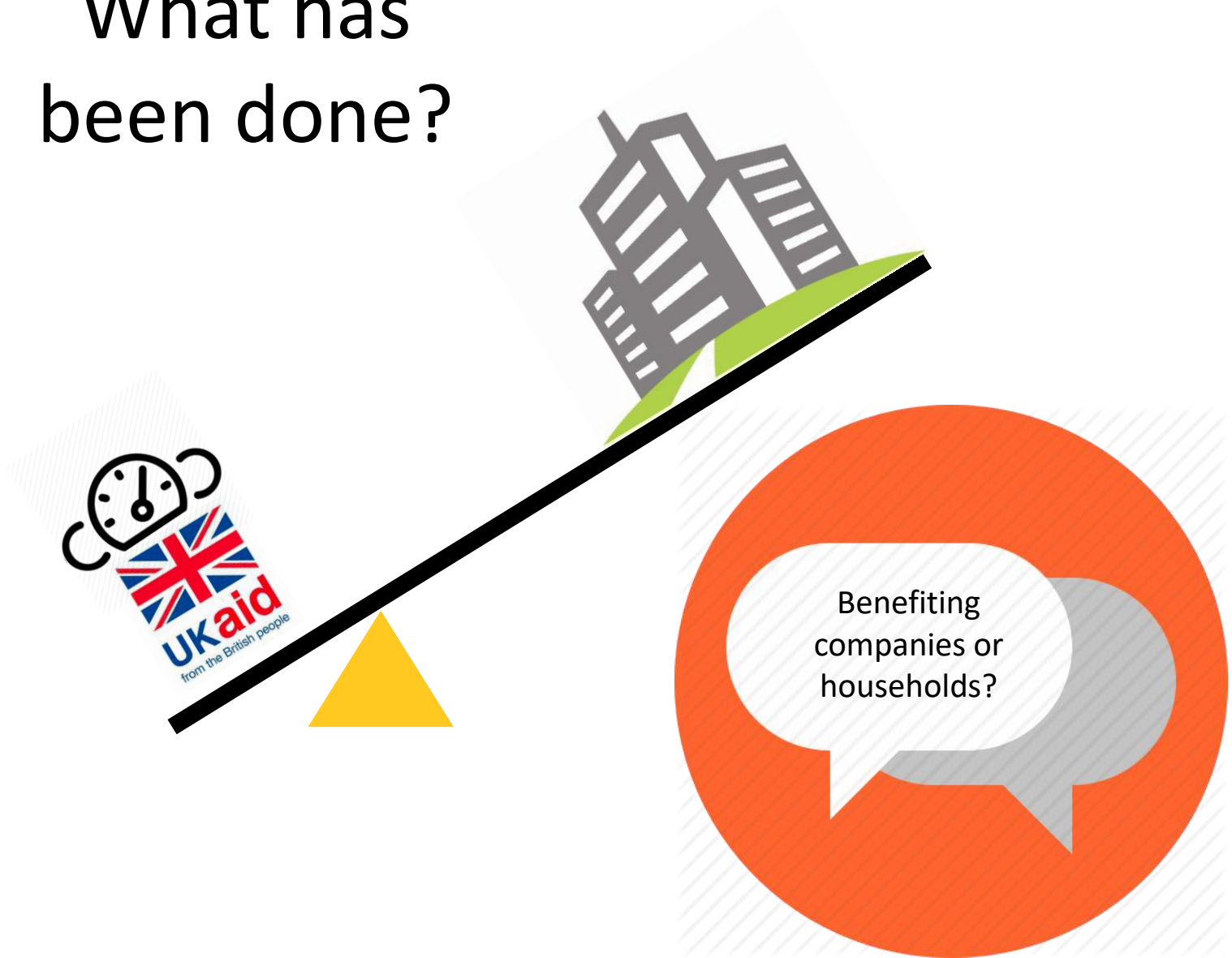
The world needs massive private green investments



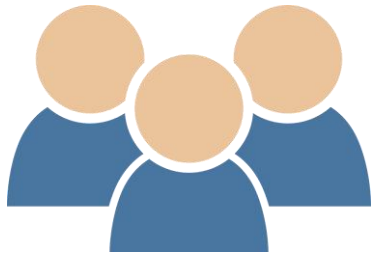
Private finance green investment is far from what is needed



What has been done?



The paper asks...



Who are the major private-sector actors in Indonesia with a potential role in climate mitigation?



How has mitigation finance been used to leverage the private sector's investment in Indonesia's GHG emission reduction?



Does mitigation finance take into account the perceived incentives of the private sector and its patterns of interaction, to leverage its investments in Indonesia's GHG emission reduction?

Private sector landscape in Indonesia

\$



SMEs



Construction company

Implement environmental and social safeguards



Plantation company

Implement sustainable forest and landscape management



Consumer goods companies

Implement sustainable sourcing and supply chain



Property companies



Promote green building and implement environmental and social safeguards



Processing industry companies

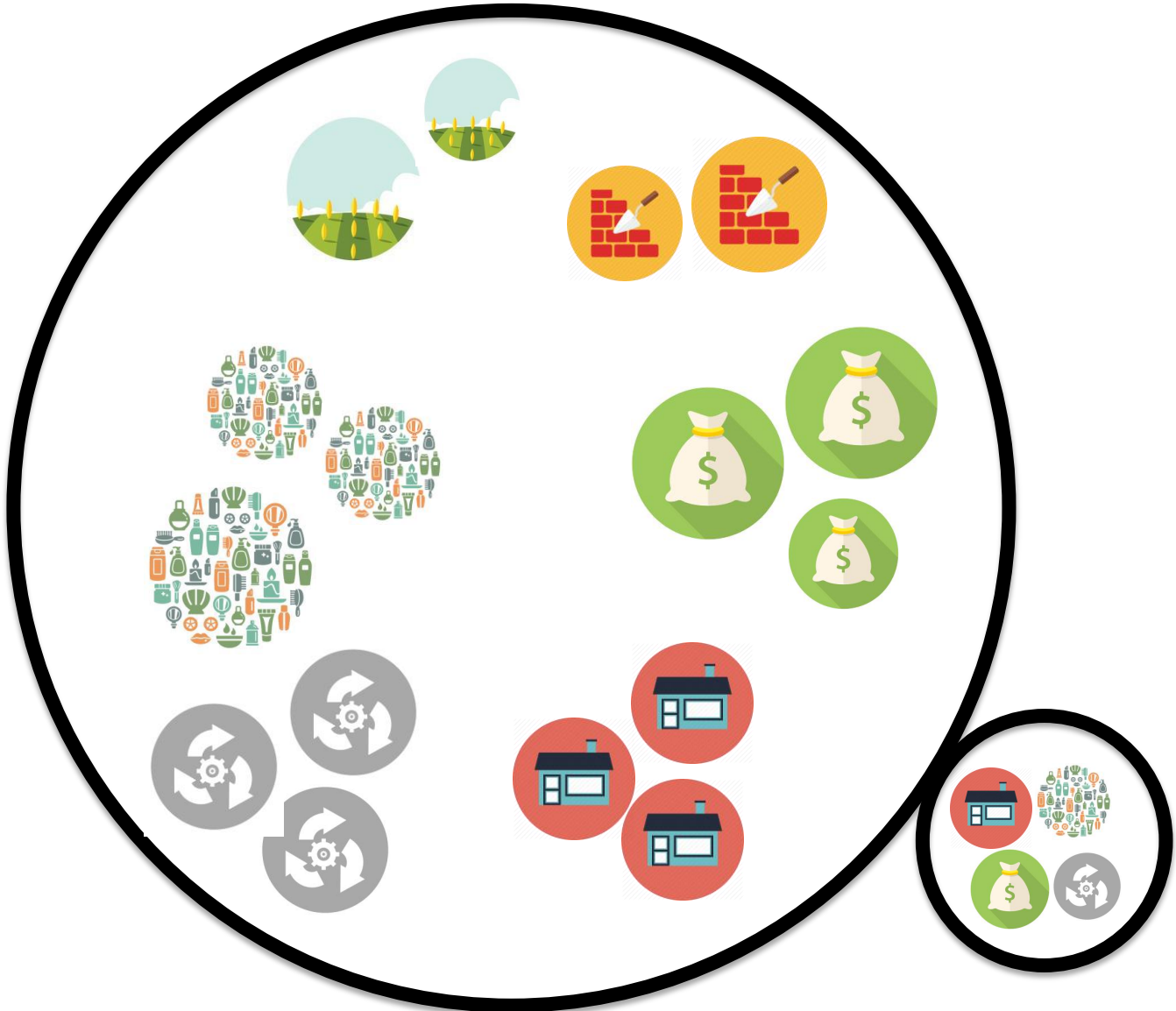
Implement energy efficiency program



Banking and multi-finance companies

Channel fund and loan provision

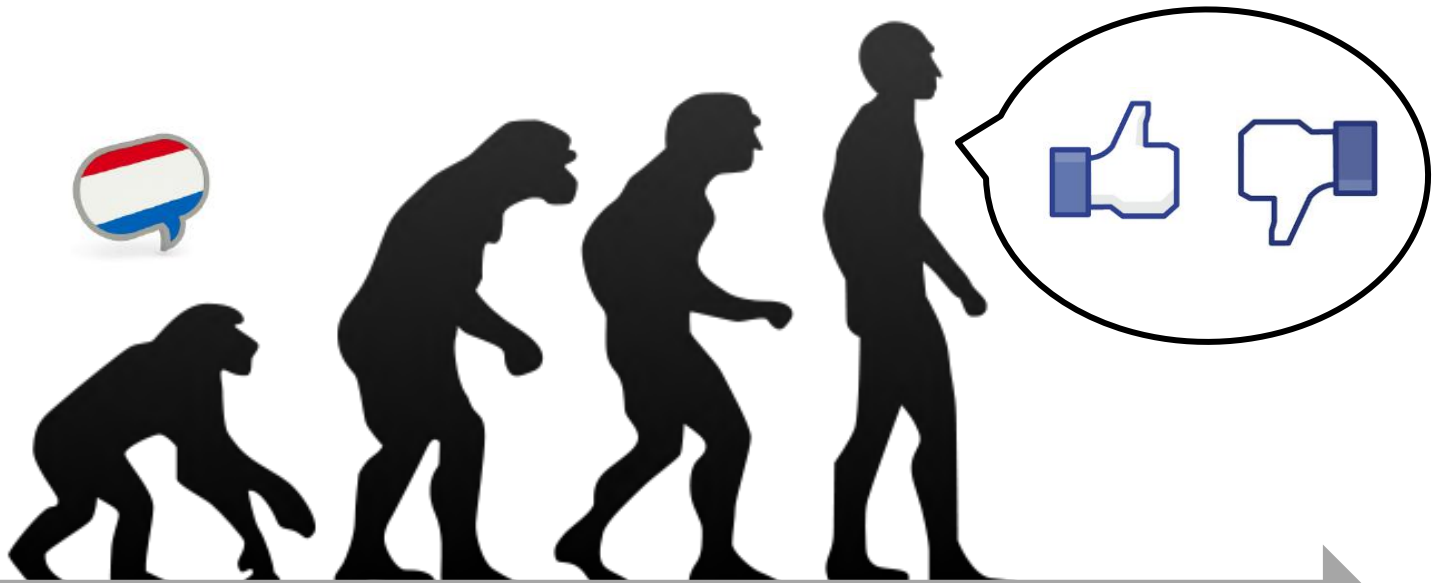
Private sector landscape in Indonesia



Unlisted in jsx

listed in jsx

Private sector history in Indonesia



The Colonial Era
(before 1945)

The Old Order Era
(before 1966)

The New Order era
(1966–1998)

The post-New
Order era (after
2008)

Before

Naamlooze Venootschap Nederlansch Indische
Spoorweg Maatschappij

Royal Dutch Company

Djatibedrijf (state teak company) in Java Region

Hollandsche Beton Maatschappij

After

PT Kereta Api Indonesia

PT Pertamina

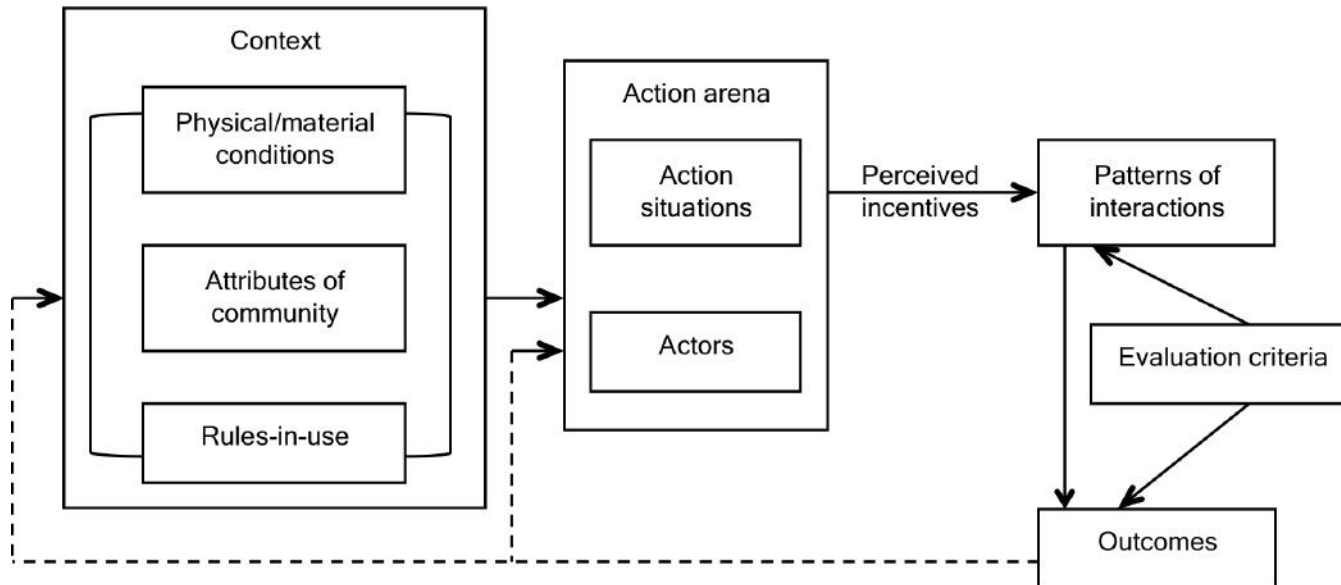
PT Bank Rakyat
Indonesia

PT Hutama Karya

Data, framework and methods



Creditor Reporting System,
(OECD 2017)



A framework for institutional analysis (Gibson et al., 2005, 26)

Methods: key word search, archive analysis

Microsoft Excel ribbon showing tabs: Home, Layout, Tables, Charts, SmartArt, Formulas, Data, Review. The ribbon includes various toolbars for editing, font, alignment, number, format, cells, and themes. The search bar at the top right contains the text "Search in Sheet".

A	B	C	D	E	F	G	H	I	J	K
ortypeDMcli	Provider	recipient	year	Sector_DAC5	purposename	Instrument	IncomeC	Regio	Concessionality	Climate_obje
multilateral development banks	AsDB	Indonesia	2013	II.3. Energy	Electrical transmission/distribution	LOAN	LMICs	Asia	Not concessional or not primarily developmental	Climate comp
multilateral development banks	AsDB	Indonesia	2013	II.3. Energy	Geothermal energy	EQUITY	LMICs	Asia	Not concessional or not primarily developmental	Climate comp
multilateral development banks	AsDB	Indonesia	2015	II.3. Energy	Electric power transmission and distribution	LOAN	LMICs	Asia	Not concessional or not primarily developmental	Climate comp
multilateral development banks	AsDB	Indonesia	2015	II.3. Energy	Energy policy and administrative management	LOAN	LMICs	Asia	Not concessional or not primarily developmental	Climate comp
multilateral development banks	AsDB	Indonesia	2015	II.3. Energy	Wind energy	GRANT	LMICs	Asia	Concessional and developmental	Climate comp
C members	Australia	Indonesia	2010	I.6. Other Social Infrastructure & Services	Employment policy and administrative management	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	I.6. Other Social Infrastructure & Services	Social/welfare services	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	II.5. Business & Other Services	Business support services & institutions	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	IV.2. Other Multisector	Rural development	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2010	VI.1. General Budget Support	General budget support-related aid	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	I.4. Water Supply & Sanitation	Water resources policy/administrative management	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	III.1.b. Forestry	Forestry policy & administrative management	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	III.1.b. Forestry	Forestry policy & administrative management	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental policy and admin. mgmt	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental research	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental research	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	IV.1. General Environment Protection	Environmental research	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2011	VIII.3. Disaster Prevention & Preparedness	Disaster prevention and preparedness	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.3. Population Policies/Programmes & Repro	Reproductive health care	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.3. Population Policies/Programmes & Repro	Std control including hiv/aids	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.4. Water Supply & Sanitation	Basic drinking water supply and basic sanitation	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.5.a. Government & Civil Society - general	Public sector policy and administrative management	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.5.a. Government & Civil Society - general	Public sector policy and administrative management	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	I.5.a. Government & Civil Society - general	Public sector policy and administrative management	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	II.3. Energy	Energy policy and administrative management	GRANT	LMICs	Asia	Concessional and developmental	Principal
C members	Australia	Indonesia	2012	II.4. Banking & Financial Services	Informal/semi-formal financial intermediaries	GRANT	LMICs	Asia	Concessional and developmental	Significant
C members	Australia	Indonesia	2012	III.1.a. Agriculture	Agricultural development	GRANT	LMICs	Asia	Concessional and developmental	Principal

The mitigation finance approach



The private sector
in
agriculture,
forestry and land
use
(AFOLU)



The private sector
in
energy-related
sectors



An agricultural research project; US\$ 0.26m

Participants in agricultural research



A REDD+ research project; US\$ 1.6m

Respondents and research subject



A sustainable palm oil project; US\$ 0.48m

Implementers in pilot projects of sustainable palm oil initiative



a land-mapping project; £2.2 m

Participants of degraded land-mapping in Kalimantan and Papua Provinces



the sustainable landscape partnership (SLP) project, US\$ 2.63m

Sustainable forest management implementers



the interim forest finance facility (IFFF) project, US\$ 47.4m

Project participants



a forest- and climate-protection project, US\$ 20.91m

Capacity building participants

PROJECTS

The private sector in agriculture, forestry and land use (AFOLU):

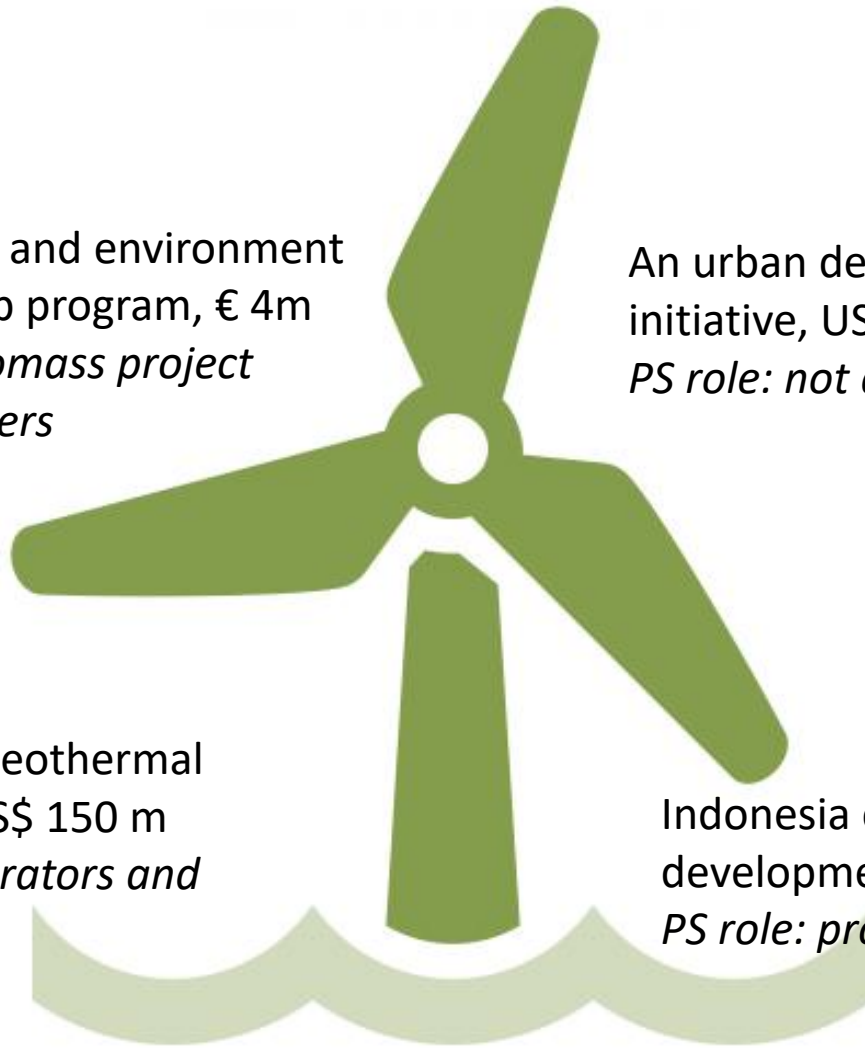
PS ROLE



the energy and environment
partnership program, € 4m
*PS role: Biomass project
implementers*



the private sector geothermal
energy program, US\$ 150 m
*PS role: project operators and
lender*



An urban development
initiative, US\$ 2.06m
PS role: not defined

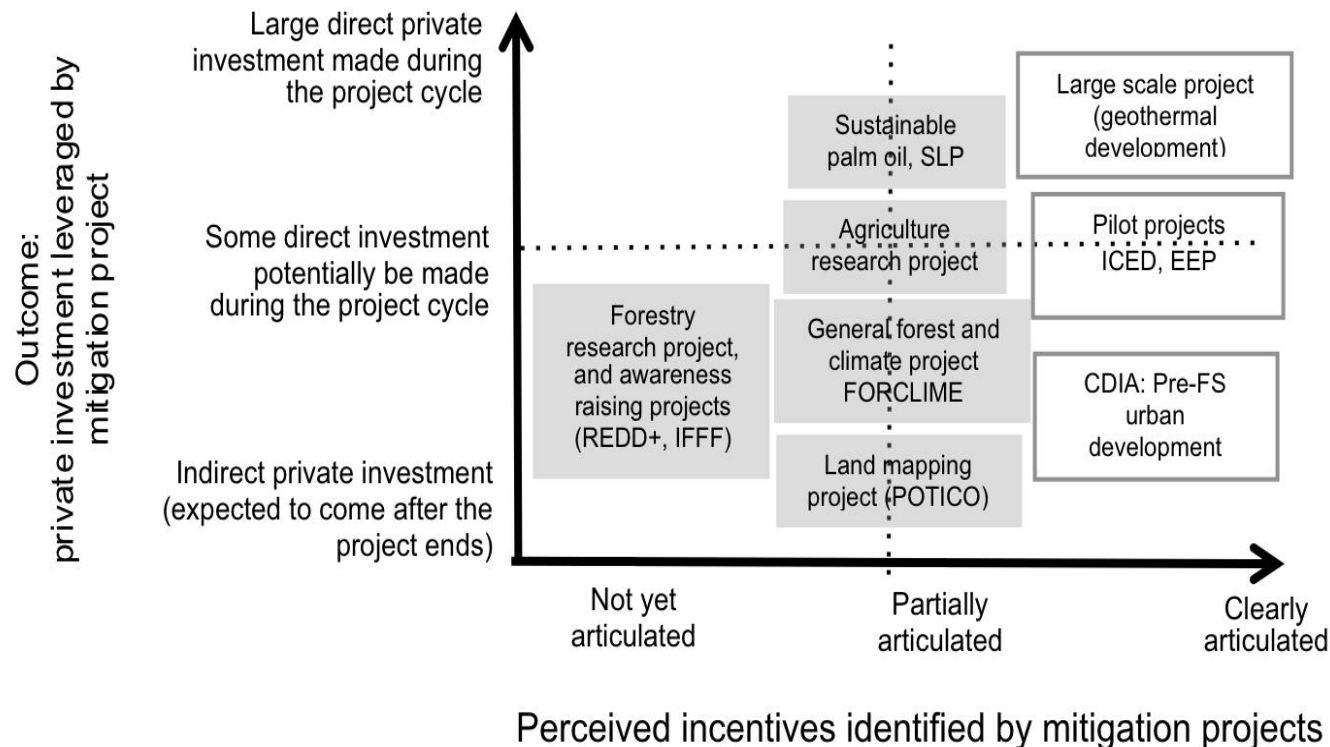


Indonesia clean energy
development, US\$ 3.26m
PS role: project implementers

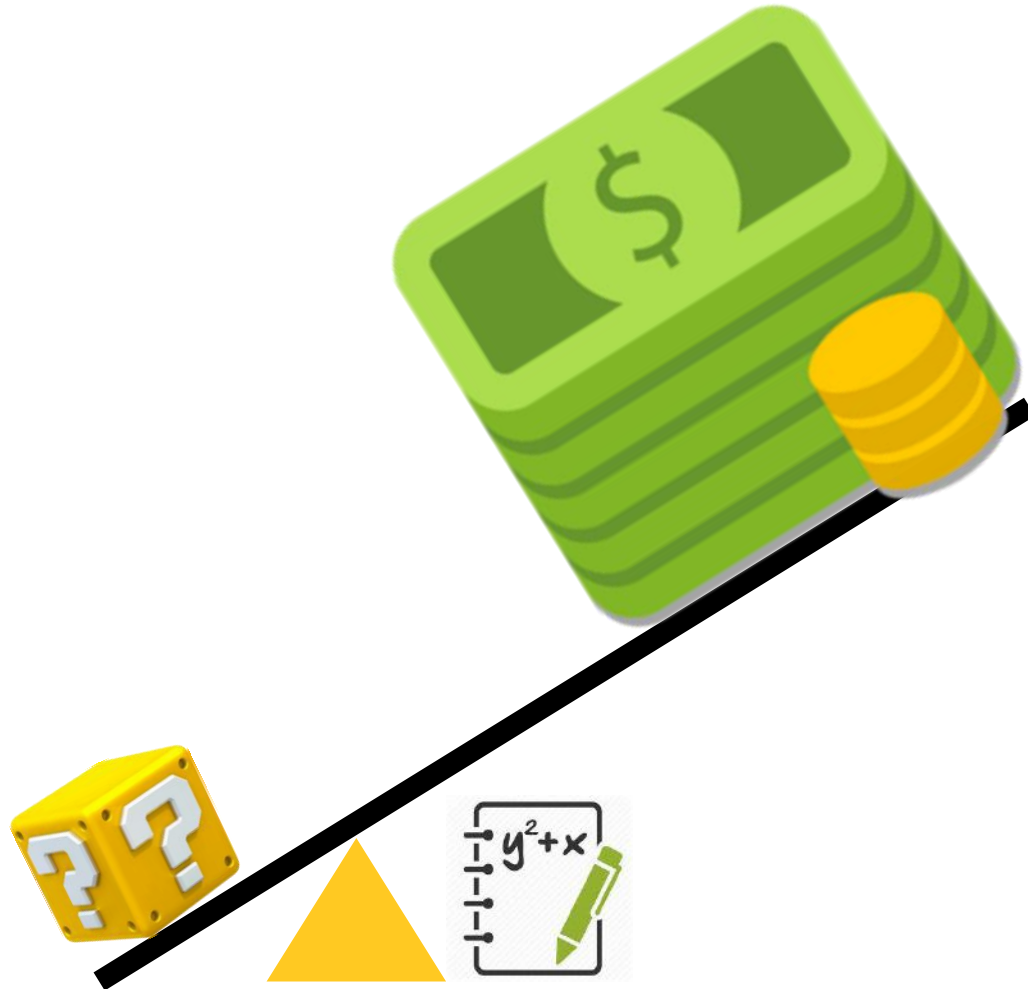


The private sector in in energy-related sectors

When mitigation finance successfully leveraging private investments?



Formulating mitigation finance criteria to leverage private investment



Any successful projects?

Tangerang's Solid waste management
Operational in 2016, studied in 2013



The image shows a screenshot of a news article from TangerangNews.com. The website's logo is at the top left, and a search bar is at the top right. Below the logo is a navigation menu with categories: KOTA TANGERANG, KAB. TANGERANG, TANGSEL, BANTEN, BANDARA, NASIONAL, WISATA, BISNIS, MANCANEGERA, PROPERTI, AYO TANGERANG CERDAS, and OPINI. The article title is 'Inovasi Pengelolaan Sampah Kota Tangerang'. The author is Rangga Agung Zuliansyah, Advertorial, and the date is Selasa, 13 Desember 2016 | 19:00. The article has been read 1566 times. The main text describes the waste management challenges in Tangerang and the city's commitment to innovation in this field.

TangerangNews.com

Cari Be

KOTA TANGERANG KAB. TANGERANG TANGSEL BANTEN BANDARA NASIONAL

WISATA BISNIS MANCANEGERA PROPERTI AYO TANGERANG CERDAS OPINI

Inovasi Pengelolaan Sampah Kota Tangerang

Rangga Agung Zuliansyah, Advertorial | Selasa, 13 Desember 2016 | 19:00 | Dibaca : 1566

Wali Kota Tangerang Arief R Wismansyah melakukan sidak TPA Rawa Kucing bersama Kepala Dinas Kebersihan dan Pertamanan Ivan Yudianto. (Tangerangnews.com / Rangga)

TANGERANGNews.com-Sampah merupakan masalah yang kerap menjadi pekerjaan rumah di setiap kabupaten/kota di Indonesia. Penanganan sampah tidak bisa dilakukan dengan hanya pengangkutan dari sumber ke tempat pembuangan akhir, ataupun mengubah kebiasaan masyarakat. Namun harus melalui inovasi-inovasi yang lebih efektif dan efisien.

Pemerintah Kota Tangerang termasuk yang terus konsisten dengan pengelolaan sampah melalui pengembangan inovasi. Kota Tangerang yang memiliki jumlah penduduk kurang lebih 1,9 juta jiwa, timbulan sampah yang dihasilkan per hari kurang lebih 5602 m3 atau 1400 ton. Dengan tingkat pelayanan 75%, sampah yang terangkut ke TPA Rawa Kucing kurang lebih hanya 4201 m3 atau 1000 ton. Artinya sekitar 400 ton tidak terangkut.

Any successful projects?

Yogyakarta's Urban transport, Operational in 2016–17 funded by regional government budget, FS in August 2010 to February 2011

Bus baru Trans Jogja berwarna biru siap mengaspal, Rabu (25/5/2016). (Gilang Jiwana/JIBI/Harian Jogja)

□ □ Sabtu, 7 Januari 2017 06:40 WIB □ Kota Jogja □ Sunartono/JIBI/Harian Jogja

Share : □ □ □ □

TRANS JOGJA

Rp84 Miliar untuk Operasional Bus

DPRD DIY akan membentuk Pansus pengawasan Trans Jogja sebelum dilakukan operasionalisasi penambahan rute.

Solopos.com, JOGJA – Anggaran sebanyak Rp84 miliar disiapkan untuk mendukung operasionalisasi peningkatan trayek dan jumlah armada Trans Jogja pada April 2017. DPRD DIY akan membentuk Pansus pengawasan Trans Jogja sebelum dilakukan operasionalisasi penambahan rute.

Anggota Komisi C DPRD DIY Suharwanta menjelaskan, sesuai anggaran 2017 terjadi peningkatan jumlah biaya operasional kendaraan (BOK) seiring dengan penambahan armada dari 74 unit menjadi 154 unit bus dengan 17 trayek. Jika sebelumnya, BOK hanya Rp71 miliar, di 2017 meningkat menjadi Rp84 miliar. Besaran itu sepenuhnya untuk memberikan subsidi kepada Trans Jogja dari April hingga tahun anggaran 2017 berakhir.

Any successful projects?

Surabaya's Urban transport, Tender in 2016 is delayed, FS October 2012 to February 2013



TEMPO.CO



HOME ▶ BISNIS ▶ BISNIS



Lelang Proyek Trem Surabaya Molor

KAMIS, 17 MARET 2016 | 18:38 WIB



Any successful projects?

Denpasar's Urban transport,
Cancelled due to lack of
2015), March to July 2015

Thank you