

Investor Interest in the Asia-Pacific Blue Economy

ADB-PEA BLUE ECONOMY KNOWLEDGE HUB:
SECTION 4 - PART I

D. Michael Adams

E: michael@oceanassets.org

T: +41 79 196 8626

Contents: Section 4, Part I - Investors

I. Global Financiers

1. *Preface: Understanding Financiers*
2. Covid 19 Impacts
3. Investment Plans: Next 12 mos
4. ADB Region Opportunities
5. Private Equity Investors
6. Private Debt Investors
7. Infrastructure Investors
8. Natural Resource Investors

II. Asian Financiers

9. Asia Finance 2020 Survey: Investors
10. Asia Finance 2020 Survey: Issuer
11. ASEAN's Green Finance Leaders
12. ASEAN's Favourite Green Sectors
13. Designing an Asian Blue Finance Platform

III. Blue Financiers

1. The Blue Finance Opportunity
2. Blended Finance at ADB
3. Investing to Stop Ocean Degradation
4. Insurers Play a Vital Role
5. Blue Finance Case Studies
6. Who Funds Blue Innovators?
7. *Responsible Investor: Blue Economy Survey*
8. Blue Opportunities & Barriers
9. Europe's Model: BlueInvest
10. UNEP-FI Survey

IV. Impact Financiers

11. Impact Investors: Asia-Pacific Allocations
12. Investor Types in Emerging Markets
13. Which Sectors Do They Prefer?
14. How Are Sector Allocations Changing?
15. Top Names in Emerging Markets Impact

Preface, Part I: Understanding Financiers

Global capital markets bring together many different financiers with different goals and requirements. **In Part I** of this Section, we focus on understanding the current needs of the financiers who are best aligned with ADB's Healthy Ocean Action Plan. We interpret current data and surveys for ADB and PEA goals.

Type	Summary	Preferred Vehicles	Time Horizon
Pension Funds	Invest on behalf of policyholders to pay future benefits	Green bonds & infrastructure funds. Face risk & liquidity constraints.	10-30 years
Insurance Companies	Invest premium payments from policyholders to fund future claims	Green bonds, project & infra funds. Also sell risk management tools.	10-30 years (for life insurance-based)
Sovereign Wealth Funds	Invest national savings from economy	Green bonds, loans, project, infra funds	Any
Commercial Banks	Lend to businesses - small & large	Loans, some green bonds & projects	3-10 years
Investment Banks	Invest in or arrange large transactions	Any transaction required by institutions	Any
Private Equity Firms	Invest client capital in private companies	Their own funds or direct deals	Avg 3-5 years
Wealth Managers	Invest client capital in funds & markets	Listed securities & funds	Avg 1-5 years

All Investors: Impact of Covid19 on New Investments

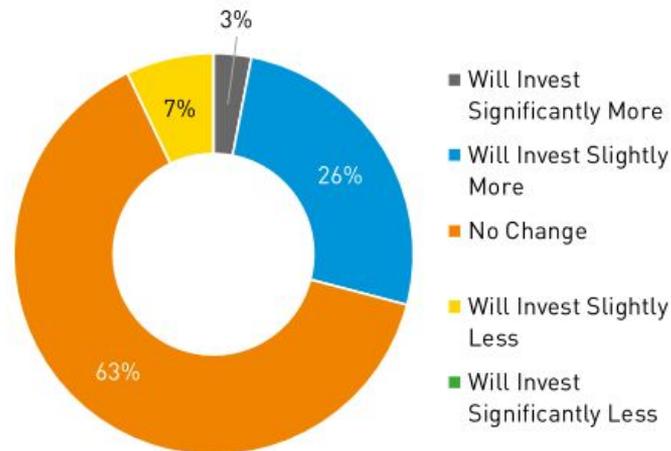
2020 Survey Results

Preqin surveyed 50+ investors in June 2020 regarding plans for infrastructure, private equity & debt, real estate & hedge funds.

Good News

In spite of an estimated 5% contraction of global GDP in 2020 due to Covid19, **a majority of investors foresaw no change in allocations for the long-term. Only 10% expected to reduce.** That's good news for the global Blue Economy.

Fig. 2: Investor Views on the Long-Term Impact of COVID-19 on Their Future Alternative Investments Strategy



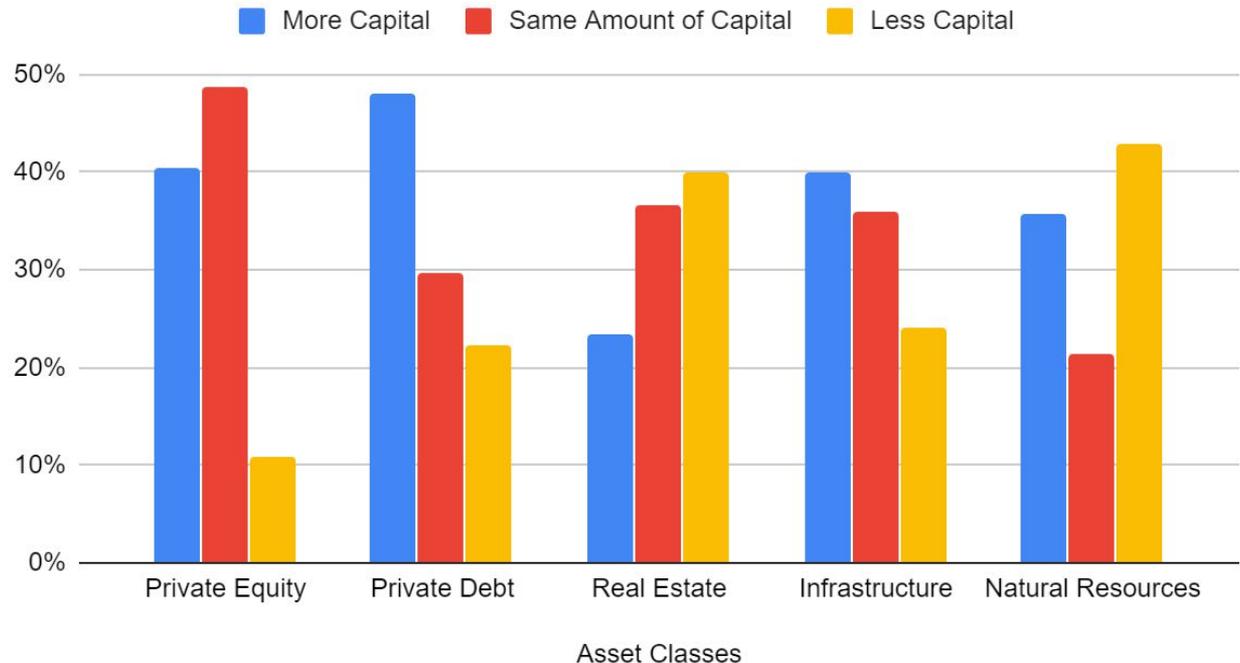
Source: Preqin Pro

All Investors: Expected Investments next 12 months

Investors in private equity, debt and infrastructure - the most important asset classes for the Blue Economy - will **increase** their investments over the next year.

Natural resource investments (both unsustainable ones like fossil fuels/mining and sustainable ones like agriculture/timber) will get less capital as the commodity outlook remains negative. Yet with rising seafood demand, this should not impact Blue.

More Capital, Same Amount of Capital and Less Capital

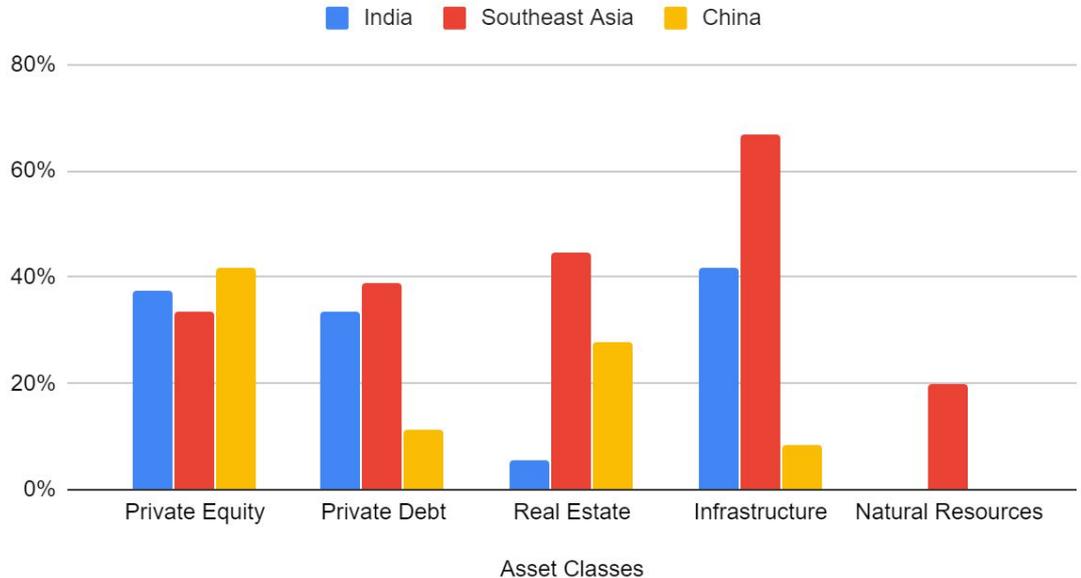


All Investors: ADB Region Opportunities, next 12 mos

Investors remain bullish on Asia-Pacific. Importantly, infrastructure investors are most positive toward Southeast Asia. Many note that China's Belt & Road Initiative (including Maritime) is driving opportunity in the region.

For ports and urban/coastal infrastructure on which the Blue Economy depends, this is good news. With ADB forecasting infrastructure needs for the region at \$23tr by 2030, Blue needs should participate in this rising tide.

India, Southeast Asia and China



Private Equity Investors

Emerging Markets preferred by private equity investors include: India (38%), Southeast Asia (33%), and China (42%). **Overall, this is good news again for Asia-Pacific's Blue.Economy.**

However, fund types preferred by private equity investors lead with the most conservative: Buyouts, Secondaries & Growth. **Smaller allocations to Venture Capital** means that only the best blue deals (eg, Aquaculture, Maritime Digital) are likely to get funded.

Fig. 15: Investor Views on Emerging Markets Presenting the Best Opportunities in Private Equity

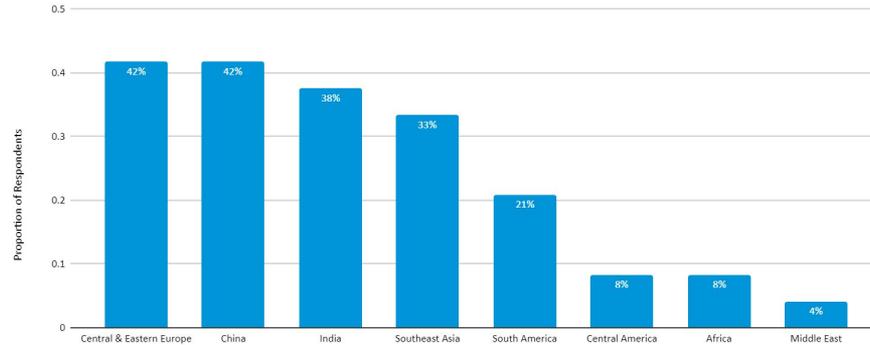
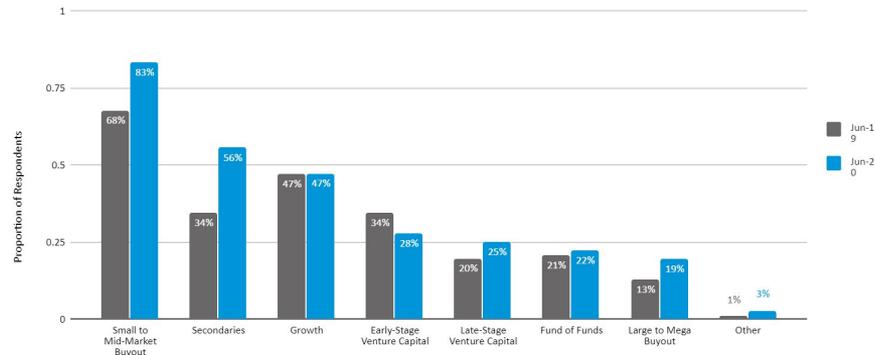


Fig. 16: Investor Views on Fund Types Presenting the Best Opportunities in Private Equity, 2019 vs. 2020

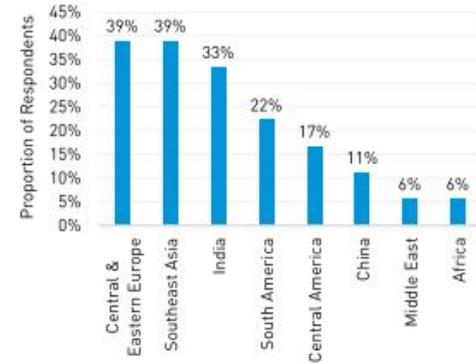


Private Debt Investors

Green Loan Growth

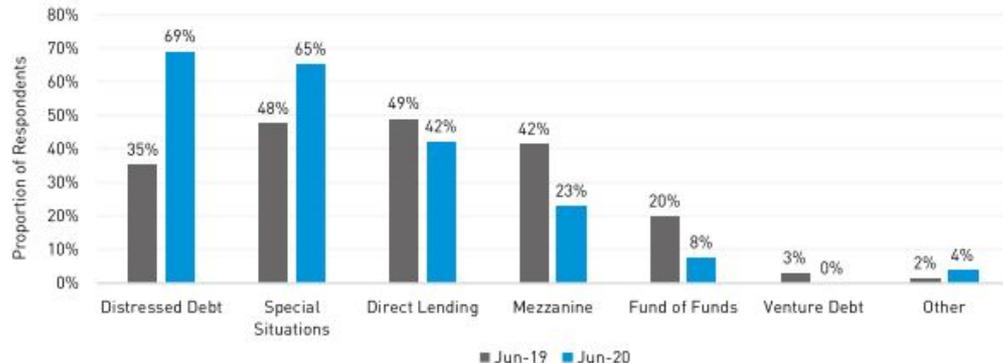
- **Debt Investors seek credit quality amid economic downturn**
- **Southeast Asia & India** are regional favourites along with CE Europe
- **Distressed Debt & Special Situations** reach new highs of interest, also due to the economic outlook
- **Green Loans outshine bonds** as the high growth market

Investors welcome a less competitive environment, with the proportion citing competition as a key challenge for return generation falling from 61% in June 2019 to 35% now (Fig. 19). Respondents are most concerned by the credit profiles of companies, and about the impact of credit spreads. These have been widening as lenders have grown more worried over the economic outlook and the ability of borrowers to service debt. Compared with one year ago, the percentages of investors citing these as key challenges to return generation have risen from 48% to 69% and 47% to 58%, respectively.



Source: Preqin Investor Interviews, June 2020

Fig. 21: Investor Views on Fund Types Presenting the Best Opportunities in Private Debt, 2019 vs. 2020



Infrastructure Investors

Southeast Asia is the winner (67%) of all emerging markets in the eyes of Infrastructure Investors, with India also a steady favourite (42%). **We hope that Green Ports and Coastal Resilience will benefit from these preferences.**

Big increases from 2019 are forecast for Distressed (moving from 26% to 42%) and Opportunistic (from 6% to 25%) Funds. **Rising risk tolerance is positive for Blue Infrastructure needs.**

Fig. 33: Investor Views on Emerging Markets Presenting the Best Opportunities in Infrastructure

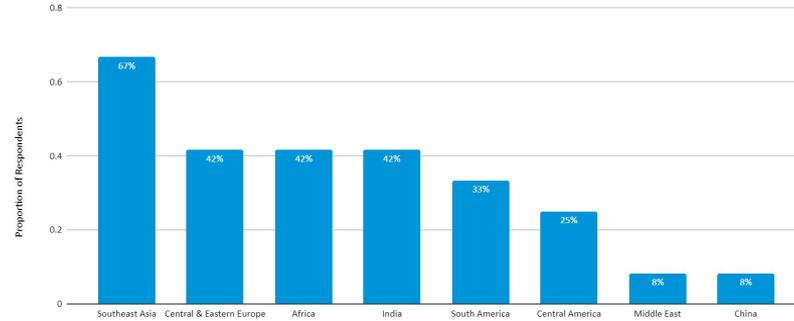
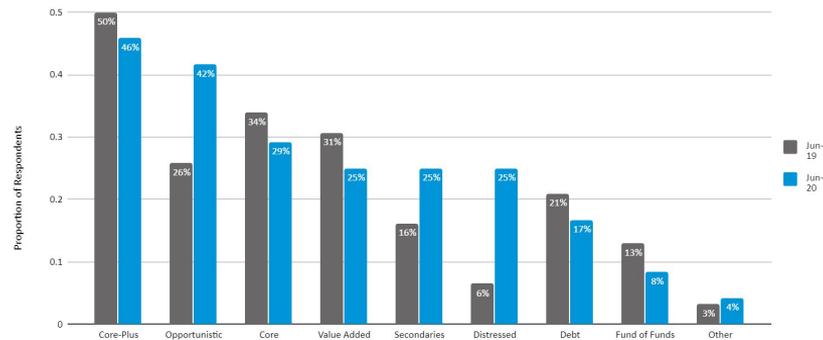


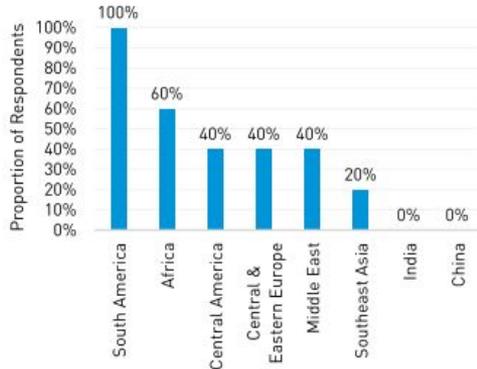
Fig. 34: Investor Views on Fund Types Presenting the Best Opportunities in Infrastructure, 2019 vs. 2020



Natural Resource Investors

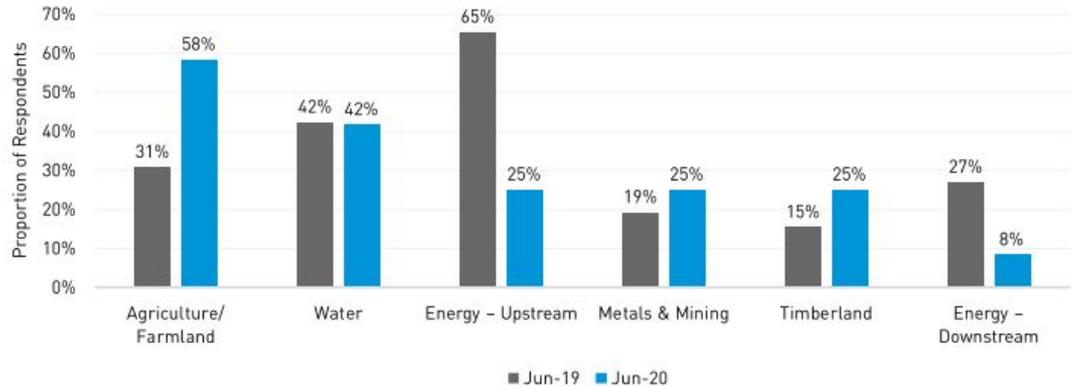
The Good News is that investor interest in Agriculture (incl Seafood) has almost doubled in the past year, displacing Energy. Aquaculture has long been the fastest growing segment of agriculture. Land-based aquaculture/algaculture has 3 valued component: Farmland, Technology and Food Security - all of which are strong investment themes.

Fig. 38: Investor Views on Emerging Markets Presenting the Best Opportunities in Natural Resources



Source: Preqin Investor Interviews, June 2020

Fig. 39: Investor Views on Fund Types Presenting the Best Opportunities in Natural Resources, 2019 vs. 2020



Source: Preqin Investor Interviews, June 2019 - June 2020

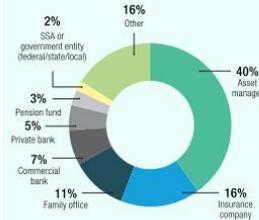
AsiaFinance Survey 2020: Investor Perspectives

Investors want Green

- Asian investors say Covid19 accelerates the emphasis on ESG-driven investments
- Green loans & bonds increase
- 42% say their strategy is to actively seek investments that fit with their ESG policy, up from 33% in 2019
- Asian financial markets are aligning with global standards, including sustainability
- Green Energy tops the list of sector favourites

INVESTORS

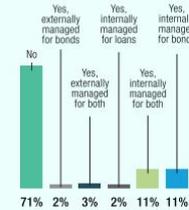
Profile of respondents – by type of firm.



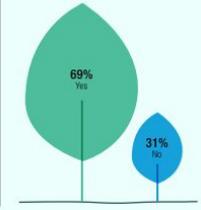
Your general approach to ESG/SRI investing at present.

- We actively seek opportunities and include companies that fit with our ESG policy
- We have developed our own ESG scoring system
- We expect to develop an ESG/SRI policy soon
- We exclude companies from our portfolio that don't fit with our ESG policy
- We do not have a clearly stated ESG/SRI strategy

Do you have a dedicated green, social, sustainability instrument mandate or requirement?



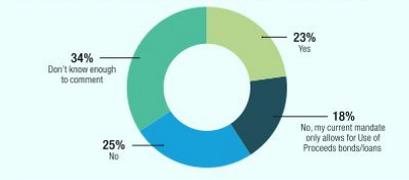
If you do not have a dedicated mandate, are you considering one in the future?



Key investment themes and preferences.



Would you invest in sustainability-linked bonds or loans?



Are ESG/SRI considerations integrated into your investment strategy?



Do you have your own in-house ESG/SRI research and analysis capability?



Do you have a dedicated ESG, SRI or sustainability fund?



Ranking the importance of independent reviews/opinions/certifications of green loans or bonds.

	Won't invest without it	Very important	Somewhat important	Not important
Reviews	7%	43%	41%	9%
Opinions	7%	31%	46%	16%
Certifications	16%	34%	37%	13%
Reporting	21%	47%	23%	9%

Reporting type required.

	Necessary	Nice to have	Not necessary
Proceeds	67%	26%	7%
	62%	29%	9%

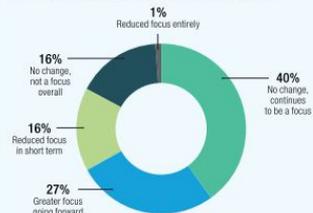
AsiaFinance Survey 2020: Issuer Perspectives

Issuers want Access

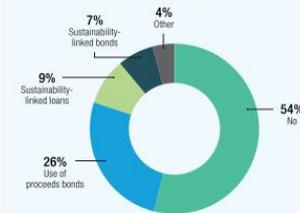
- **Access to capital** requires solid preparation by issuers
- **Understanding investor appetites & limitations** is key
- **Time is the constraint:** With preparation, reporting & ESG metrics to consider
- **76% are considering** a green loan, equity or bond issue
- **Diversification** of a firm's investor base is the top motivation for green issues

ISSUERS

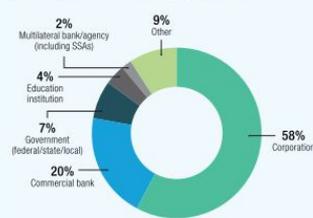
How does COVID-19 impact your focus on green, social, sustainability (GSS) bonds or loans?



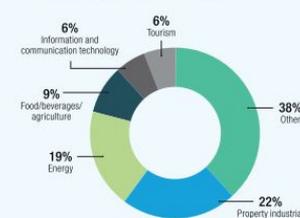
Issuance history of green, social and sustainable (GSS) instruments.



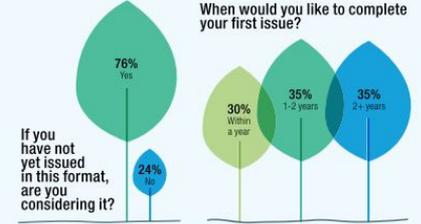
Profile of respondents – by type of firm.



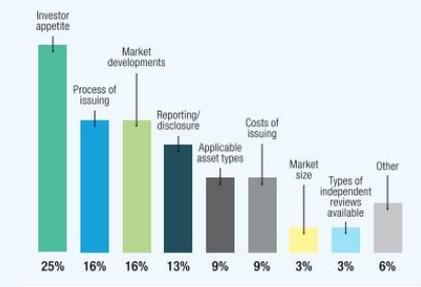
Profile of respondents – by sector.



Hindrances to issuing GSS.



Required information about sustainable finance/debt markets and GSS instruments.



Drivers of GSS issuance.



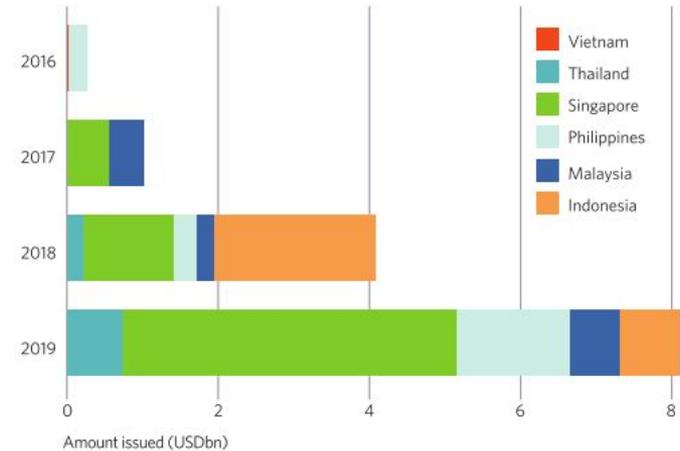
ASEAN's Green Finance Leaders

Singapore has become ASEAN's largest market



Climate Bonds Initiative. Cumulative issuance up to 31 December 2019

2019 saw the rise of Singapore as a regional leader



Among DMCs with Blue Economy exposure, note 6 countries:

Vietnam, Thailand, Philippines, Malaysia, Indonesia

ASEAN: State of Green Finance Market, 2019. Climate Bonds Initiative

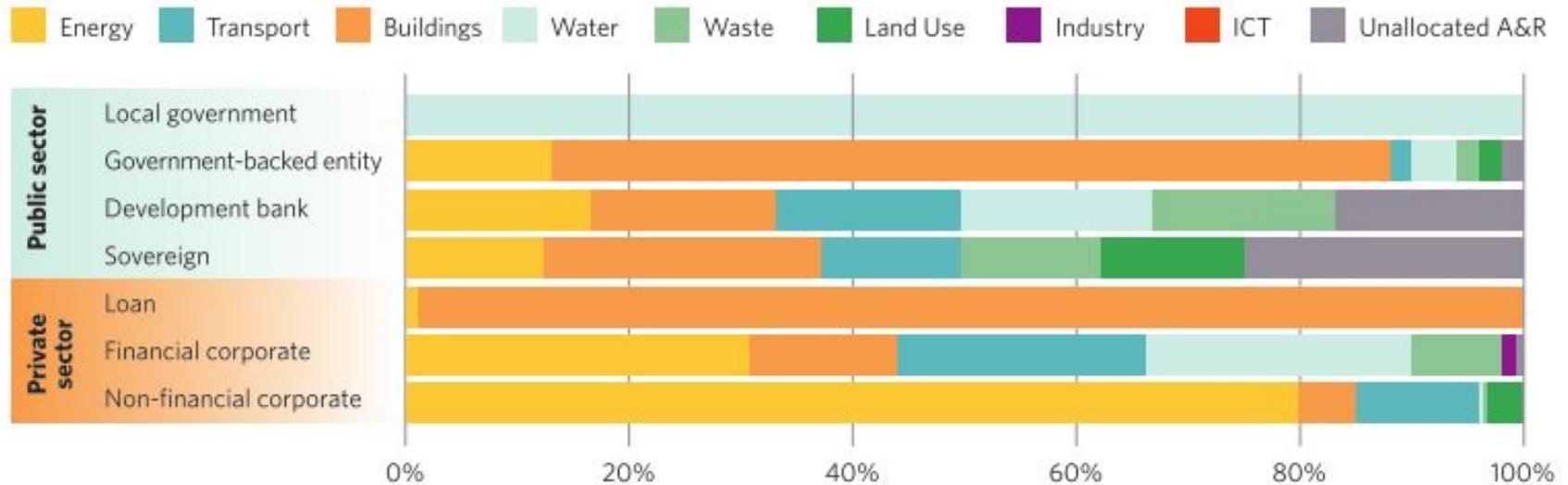
ASEAN's Favourite Green Sectors

Public Sector Favourites:

Buildings, Energy, Transport

Private Sector Favourites:

Energy, Transport, Water, Buildings



Launching an Asian Blue Finance Platform

How Fintech Can Help Overcome the Barriers to Financing Healthy Ocean Action Plan & PEA

- **Peer-Peer Equity Lending** via regulated electronic platform
- **Aggregating Projects** to reach \$10-50mn per sector/theme
- **Aggregating Investors** on one efficient platform
- **Alternative to Bonds & Funds** (High assets & long timelines)
- **Streamlining Due Diligence** for Compliance & ESG factors
- **Providing Transparency** per project for investors
- **Securing Regulatory Approval** in multiple countries
- **Save Time** for both project managers & investors
- **Bring Visibility** to the Healthy Ocean Action Plan & PEA

Possible Roles for ADB:
Co-Finance, TA, Endorsement

Initiative organised by:



**SUSTAINABLE FINANCE
INSTITUTE ASIA**



III: Blue Financiers

The Blue Finance Opportunity

The prosperity of our region depends on healthy oceans and sustainable development. Takehiko Nakao, President, ADB, announcing the Healthy Ocean Action Plan.

We estimate that an initial public investment of \$5bn over the next 10-20 years could catalyze several hundred billion dollars of private investment towards sustainable oceans. Helen Smith, UNDP, *Catalyzing Ocean Finance*.

Blue Growth

From 2020-30, the ocean economy could double in GVA terms – reaching in excess of US\$3tn (OECD, 2016). Marine aquaculture, offshore wind, fish processing, and shipbuilding are the highest blue growth industries (*Catalyzing Ocean Finance, UNDP*)



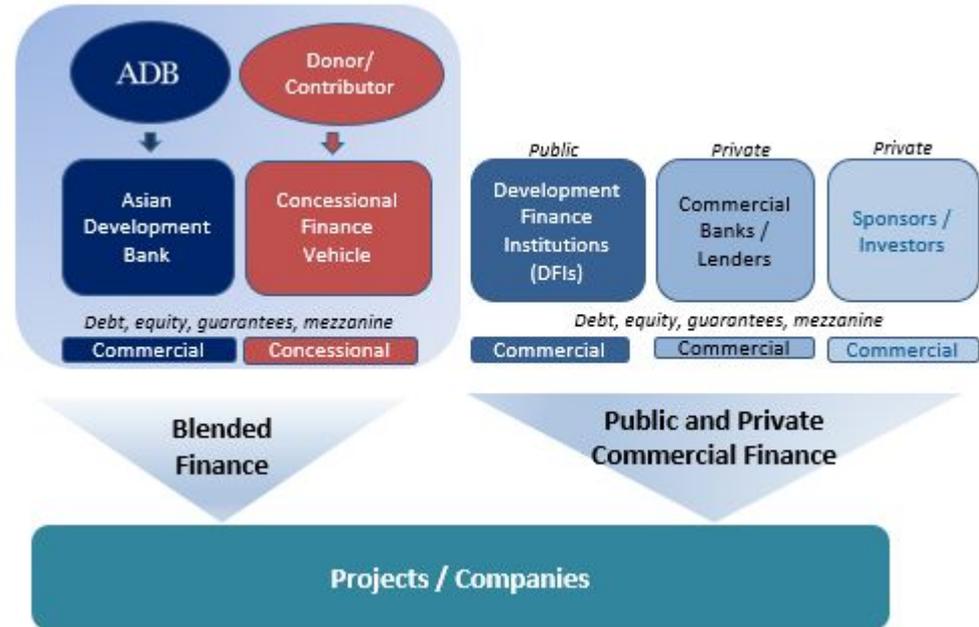
Catalytic Finance

Strikingly, in the six case studies reviewed by UNDP, the ratios of catalysed finance to initial GEF grant support range from 57 to 1 to 2,500 to 1, averaging 458 to 1. *Compare this to the 4:1 ratio UNDP regards as satisfactory for financing off-grid clean energy access.*

Blended Finance at ADB

Structuring Blended Finance Loans at ADB

- ADB pools its own resources (commercially priced) with in-house donor funds (concessionally priced)
- Reaching 50% of 50% of small project costs, possibly ~25% for larger projects
- ADB catalyzes commercial or DFI financing where needed to fill financing gaps
- ADB aims for commercial pricing to avoid distorting private markets
- Concessional loans are blended when there is a good reason to distort a market (e.g., negative externality) or when a market is in its infancy and there's not much to distort.



Investing to Stop Ocean Degradation

The cumulative economic impact of poor ocean management practices is at least \$200bn/year. Climate change will increase the cost of damage to the ocean by \$322bn/year by 2050 (*Catalyzing Ocean Finance*, UNDP)

UNDP estimates that initial public investment of \$5bn over the next 10-20 years is needed to arrest the degradation of coastal and ocean resources. Most funds catalysed by this investment will come from the private sector and commercial utilities. Blue Economy industries and projects depend on a stable ocean ecosystem, supported by policy and legal frameworks.

Table 1: Public Costs, Catalysed Finance and Ratios for Scaled Up Actions to Sustain the Global Ocean

Issue	(1) One-time public cost (\$ m.)	(2) Additional and Recurring Public Costs (\$ m./yr)	(3) One-time Catalysed Finance (\$ m.)	(4) Recurring Catalysed finance (\$ m./yr)	(5) Catalysed Finance Ratio (1-time costs) =(3)/(1)	(6) Avoided Costs (\$ m./yr)
Hypoxia	2,500	-	76,000	-	30:1	200,000-790,000
Ocean Acidification	820	-	20,000	300-5,100	24:1	104,000-182,000
Overfishing	29,048	21,000	232,000	56,000	8:1	50,000
Marine Invasive Species	20	-	20,000	-	1000:1	10,000-90,000

Insurers Play a Vital Role

6 Blue Facts for Insurers

1. **\$300bn** paid by insurers over the last 10 years for coastal storm damage, with significantly larger costs being borne by governments and taxpayers.
2. **\$163bn** of assets are estimated to be underinsured in the world today, with emerging economies accounting for 96% of the total global insurance protection gap.
3. **100m** of mangroves can reduce wave height by 66%
4. **5x more** carbon from the atmosphere is sequestered by coastland wetlands than by terrestrial forests
5. **40%** of the world's population live in coastal areas
6. **800 million** people will be at risk of coastal flooding and storm surges by 2050.



Ocean Risk & Resilience Action Alliance says:

Our purpose is to unlock and incentivise greater private investments and blended finance into coastal natural capital by pioneering ground-breaking products that both address ocean risk and build resilience in the regions that need it most.

Blue Finance Case Studies

In emerging sectors of the blue economy, the overwhelming source of existing funding continues to be **philanthropy** (over US\$8 billion in the last 10 years) **and official development assistance** (ODA, US\$5 billion in the last 10 years).

In established areas of the blue economy, a key trend is the **redirection of commercial capital** - flowing towards sustainable activity such as fisheries reform or low-carbon shipping.

CASE STUDY	SECTOR FOCUS	INVESTMENT TYPE	CAPITAL PROVIDERS	CAPITAL TYPE
Quintana Roo Trust	Protected area financing; payment for ecosystem services	Endowment fund	Blend of corporations, philanthropy, ODA	Grant
Katapult Ocean	Broad range, with technology focus	Early-stage impact, combined with accelerator	Blend of pension funds, impact funds, family offices and foundations	Equity
Conservation International Ventures	Fisheries and aquaculture	Impact fund	High-net worth individual donors and philanthropy	Debt
Circulate Capital Ocean Fund	Waste management	Early-stage venture capital	Blend of ODA, philanthropy	Equity
Ørsted Gode Wind 1	Ocean-based renewable energy	Project bond	Pension funds, banks, sovereign wealth funds	Debt

Source: *Ocean Finance Handbook*

Who Funds Blue Innovators?

Growing appetite in the venture capital and impact investment communities for ocean investments has resulted in the establishment of a number of new funds in recent years.

Accelerators, increasingly based in ports, leverage the expertise of industry along with public and private capital to scale up innovative blue solutions.



Regional leaders include:

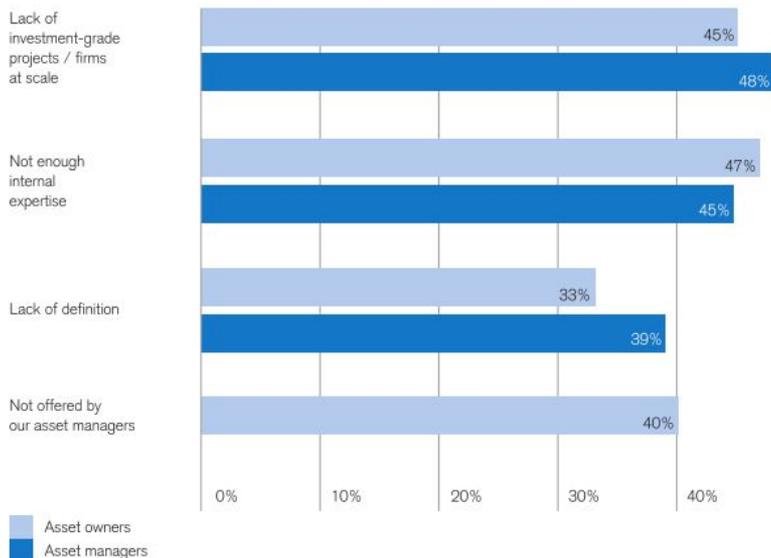
- **India** has the largest impact venture fund market in Asia
- **Singapore's** Maritime Tech Accelerator brings capital, expertise and market support to blue innovators
- **Indonesia's** Mid-Small-Micro Enterprises (MSMEs) account for 97% of employment and 60% of GDP, so blue economy efforts need to focus here
- **Philippines and Indonesia** are the focus of Meloy Fund, an impact model targeting fisheries and marine ecosystems

Source: *Ocean Finance Handbook*

Responsible Investor: Blue Economy Survey

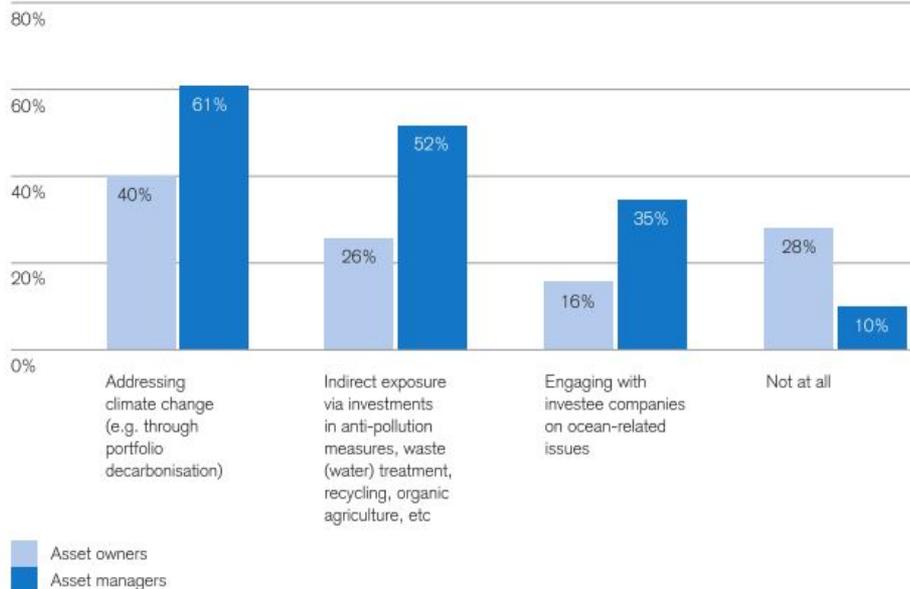
Main barriers to sustainable Blue Economy investment

% of respondents. 218 respondents



How are you currently addressing sustainable Blue Economy themes in your investments?

% of respondents. 244 respondents



Global coverage: 328 respondents from 34 countries (53% from Europe, 14% from Asia, 30% Americas)
Capital: 59% are asset managers, 41% asset owners

Investors & the Blue Economy. Responsible Investor Research

Opportunities & Barriers

2 Opportunities

- Solutions to ocean risks where investors are well placed to intervene and engage
- Investment returns from a growing sustainable Blue Economy

4 Themes

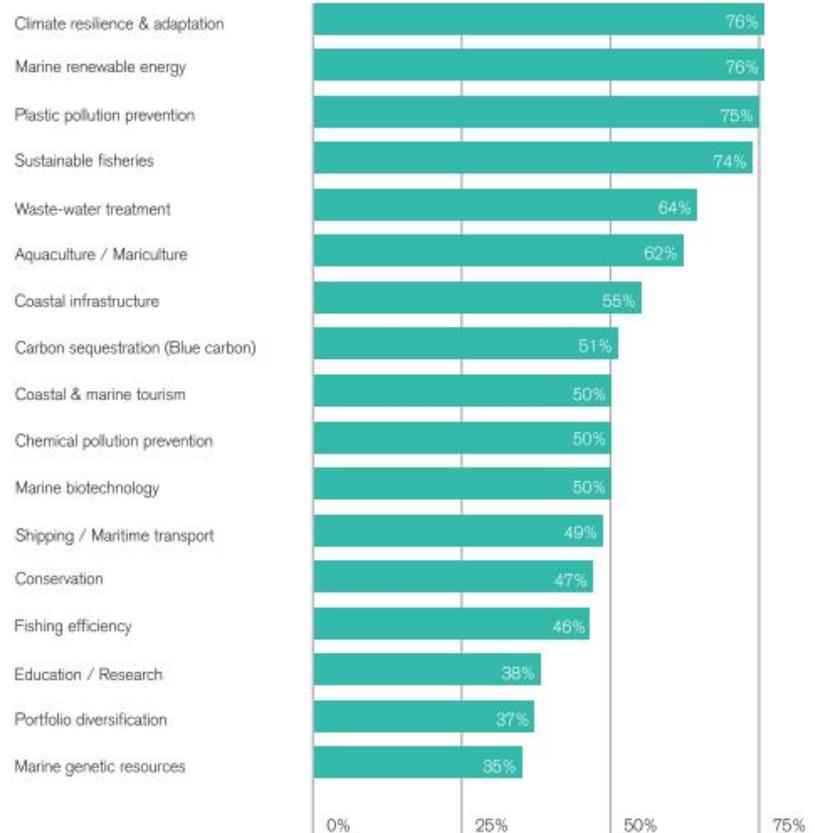
- Climate Resilience & Adaptation
- Marine Renewable Energy
- Plastic Pollution Prevention
- Sustainable Fisheries

Barriers

- Lack of investment grade projects
- Lack of internal expertise
- Lack of Blue products (funds, bonds, platforms)

Investor opportunities in the sustainable Blue Economy

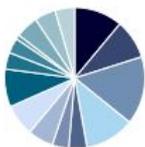
% of respondents. 218 respondents



Europe's Model: BlueInvest

[BlueInvest](#), the European program launched in 2019 (with Ocean Assets Institute), now has 90 projects in its blue pipeline as noted below. Each is given visibility to European financiers, technical support and coaching. The new E80mn BlueInvest Fund of Funds is managed by the European Investment Fund, allocating to fund managers and accelerators on a 2:1 matching basis. *Model for ADB?*

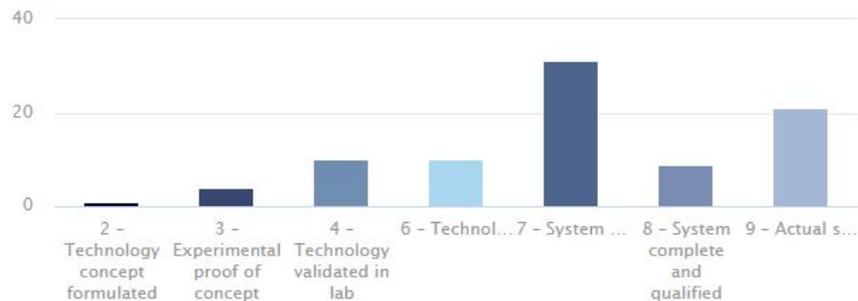
Sector of activity



- Aquaculture
- Blue energy
- Coastal and marine tourism
- ICT applied to maritime sector
- Marine services
- Offshore oil and gas
- Shipbuilding and ship repair
- Blue biotechnology
- Coastal and environmental protection
- Fisheries
- Key enabling technologies
- Ocean waste management
- Sea bed mineral resources
- Transport

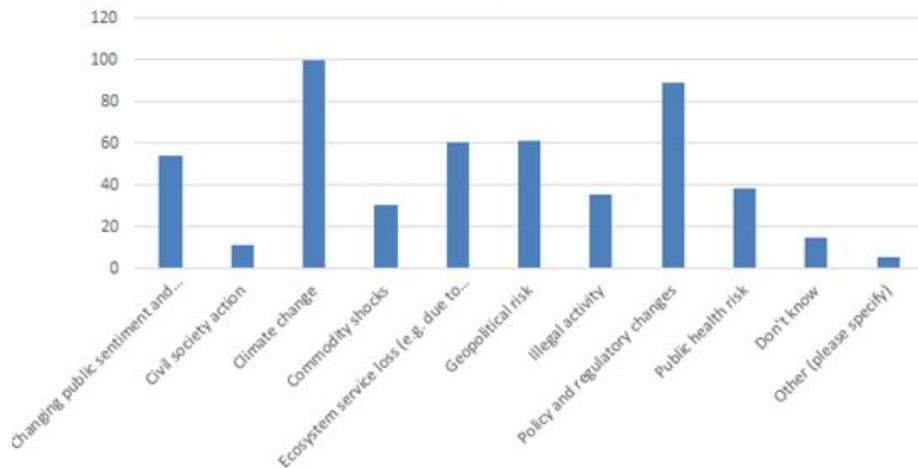
▲ 1/2 ▼

Technology readiness level

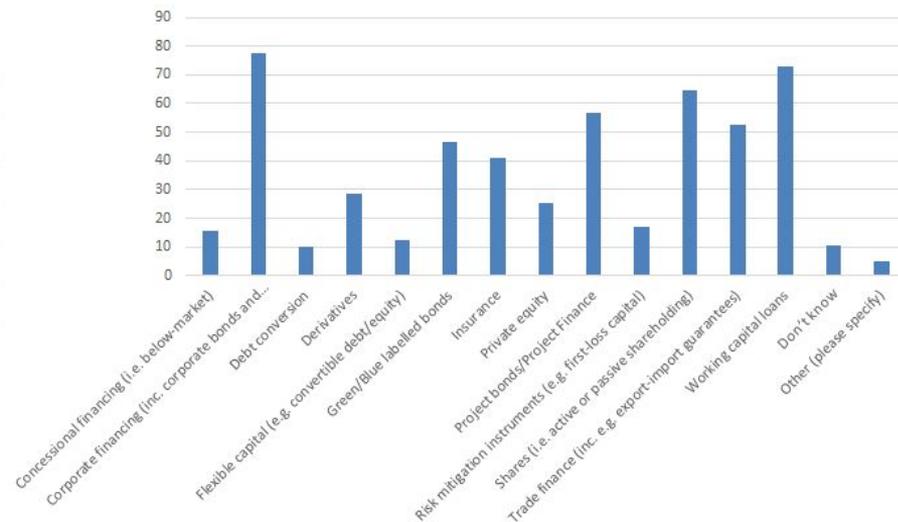


UNEP-FI 2020 Survey for *Sustainable Blue Economy Finance Principles*

Sum of greatest reported risks across sectors (FIs only)



Most common financial instruments across sectors



In Sep-Oct 2020, over 100 institutional investors responded to UNEP-FI's survey on Blue Economy investment themes. Full results will be in the Seascope Report, to be published in January 2021. Ocean Assets Institute is writing the Guidance Reports for Financiers of Shipping and Ports.

Impact Investors: Asia-Pacific Allocations

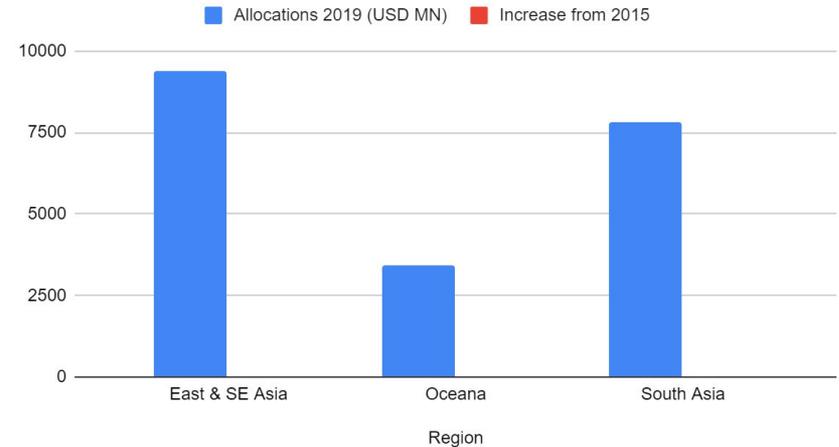
Impact Investor Favourites

According to Global Impact Investor Network (GIIN), the **impact universe in 2020 is 1720 investors with investable assets of \$715bn.**

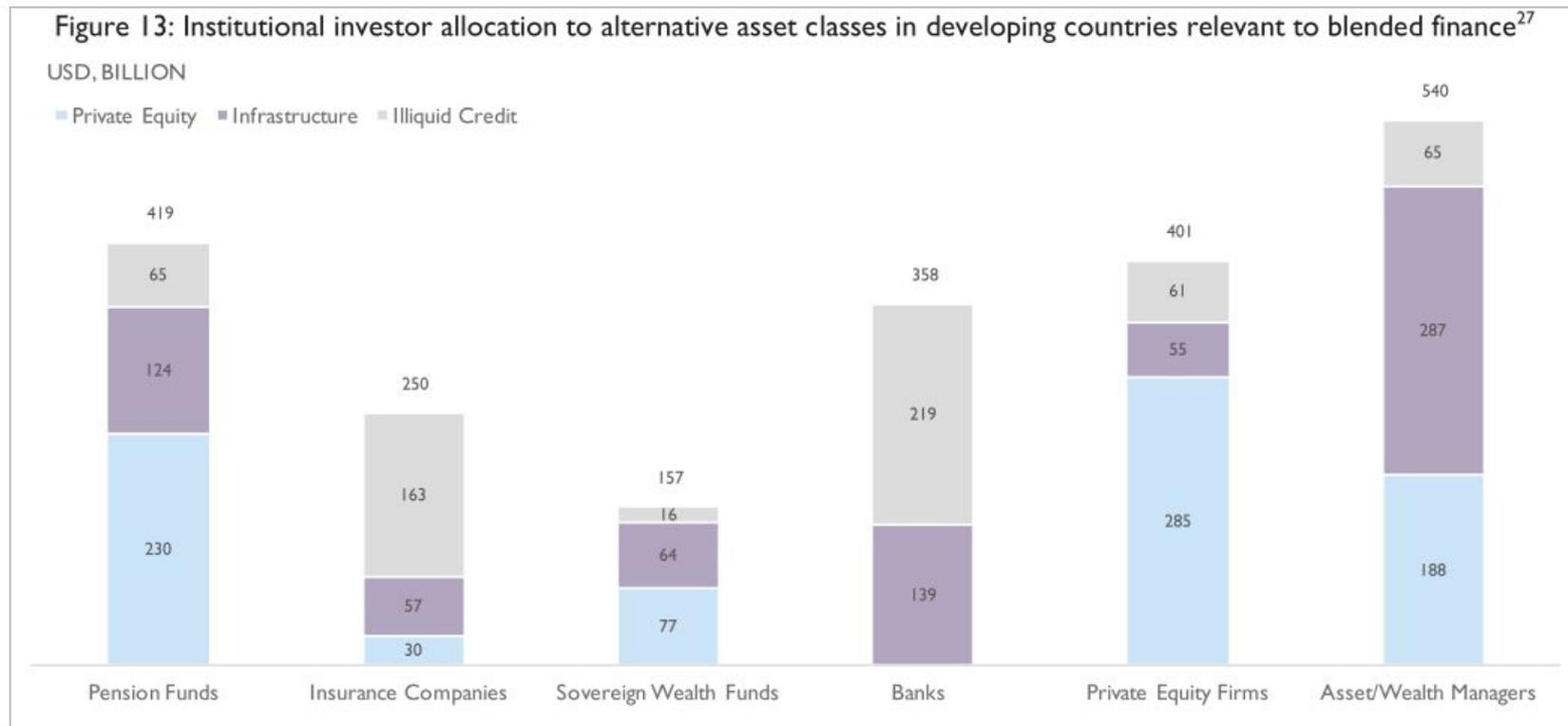
GIIN's 2020 survey showed:

- Emerging Markets allocation: 60% of capital
- East & SE Asia allocations: Over \$900bn
- South Asia & Oceania: \$800bn & \$300bn respectively

Allocations 2019 (USD MN) and Increase from 2015

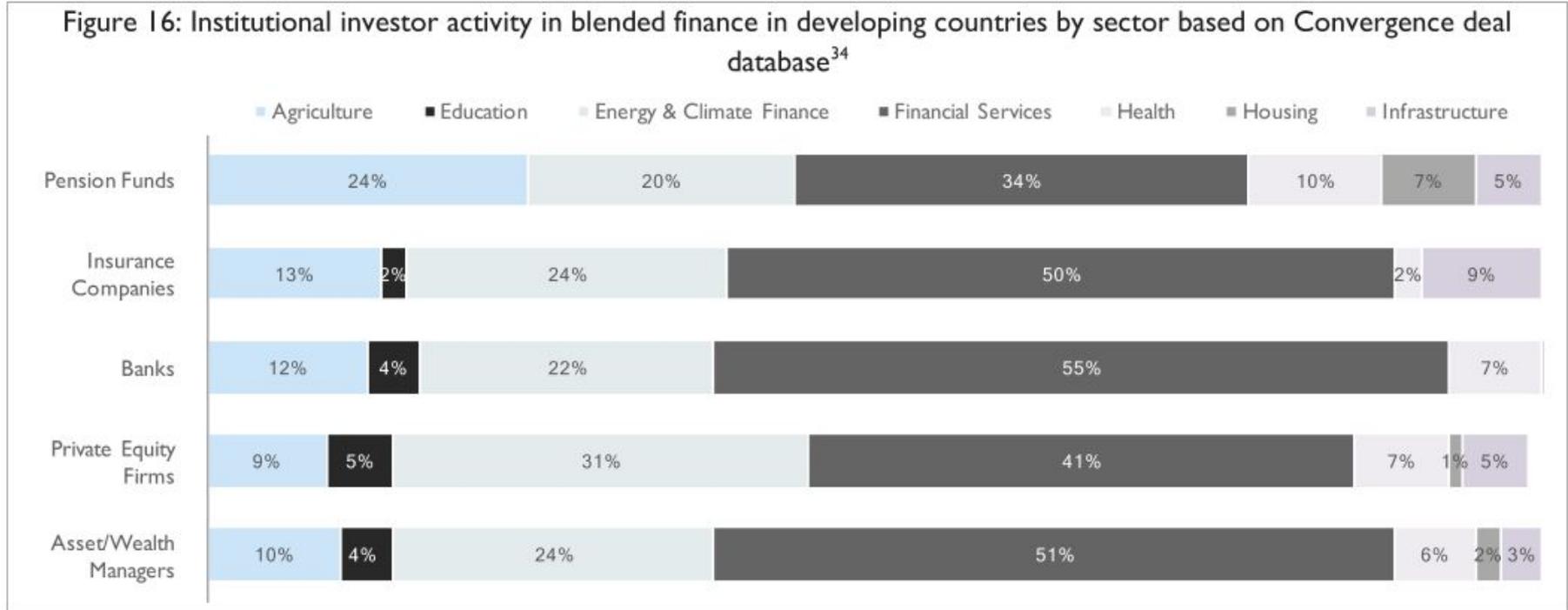


Investor Types in Emerging Markets



Source: Convergence Finance report: *Who is the Private Sector?*

Which Sectors Do They Prefer?



Source: Convergence Finance report: *Who is the Private Sector?*

How Are Impact Sector Allocations Changing?

Increased Allocations since 2015

WASH (Water, Sanitation, Hygiene) allocations are an ADB priority and show the most increase (33%) . **Energy & Climate** are always strong.

Food & Ag includes the Seafood sector is strong with a 22% increase.

Conservation allocations (includes Forestry & Timber) with a 10% increase. Marine Conservation must compete for its share with appropriate investment vehicles and quality projects.

Table vi: Changes in sector allocations among repeat respondents (2015 – 2019)

n = 79; figures in USD millions.

Sector	2015	2019	CAGR
WASH	3,083	9,735	33%
Fin services (excl. microfinance)	5,667	16,432	30%
Healthcare	2,405	5,590	23%
Food & ag	3,746	8,284	22%
Energy	9,007	19,077	21%
ICT	1,198	2,058	14%
Infrastructure	1,144	1,818	12%
Housing	4,238	6,322	11%
Microfinance	9,525	13,439	9%
Manufacturing	1,667	1,356	-5%
Education	1,695	1,257	-7%
Arts & culture	142	52	-22%
Other	8,298	12,063	10%
Total	51,817	97,483	17%

Note: The 2016 survey included a category for 'conservation,' which was not included in the 2020 survey, and the 2020 survey included a category for 'forestry & timber,' which was not available in the 2016 survey. Both categories have been combined with 'other' for this analysis.

Source: GII, 2020 Annual Impact Investor Survey

Top Names in Emerging Market Impact Investing

Figure 17: Top institutional investors in blended finance in developing countries based on Convergence deal database

Pension Funds	Insurance Companies	Sovereign Wealth Funds	Banks	Private Equity Firms	Asset/Wealth Managers
<ul style="list-style-type: none"> • ACV-CSC Metea • Christian Super • PensionDanmark • PKA • The Church Pension Fund 	<ul style="list-style-type: none"> • Achmea • AXA • KLP • MetLife • Prudential Financial • Storebrand • Swiss Re 	<ul style="list-style-type: none"> • State Oil Fund of the Republic of Azerbaijan 	<ul style="list-style-type: none"> • BNP Paribas • Credit Suisse • Deutsche Bank • JP Morgan Chase & Co • Standard Chartered • Triodos Bank 	<ul style="list-style-type: none"> • Abraaj • Gray Ghost Ventures • Leapfrog • LGT Impact Ventures • Persistent Energy Capital • Sarona Asset Management • Treehouse Investment 	<ul style="list-style-type: none"> • Calvert Impact Capital • Incofin • Oikocredit • responsAbility • Sanlam

Source: Convergence Finance report: *Who is the Private Sector?*