Voluntary Carbon Market Developer Overview 2023-2024







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Opening remarks

The voluntary carbon market finds itself at a pivotal juncture. 2023 can aptly be described as a period of transition, marked by the significant uncertainty surrounding the shift towards the Paris Agreement's Article 6 market from the Kyoto Protocol's Clean Development Mechanism (CDM), combined with a growing awareness of carbon markets' challenges and opportunities.

This transition is paving the way towards a new era. However, 2023 presented its fair share of hurdles. The market experienced a wave of media backlash, casting shadows on the credibility of carbon claims.

Amidst this turbulence, bright spots have illuminated the path forward. Most prominently, investments in the primary market not only persisted but flourished.

In this year's Voluntary Carbon Market Developer Overview report we list the developers (see **page 10** onwards) that have benefited the most from this capital influx and expanded their portfolios of projects and carbon credit issuances on the back of it. We saw substantial growth last year in both the number of issuances and number of projects across the top 25 developers we tracked across three main categories: nature-based solutions, household devices and cookstoves, and renewable energy.

A two-track market

As we turn our attention to 2024, we expect the voluntary carbon market to begin moving at two speeds. On one track, agile project developers and implementers will respond to the latest market developments. They will create projects that boast the certainty of eligibility for the CORSIA airline offsetting programme, or they will begin receiving letters of authorisation from governments – making their credits eligible for corresponding adjustments under Article 6.2.

Furthermore, they will continue to move to meet stringent environmental and social safeguards, ensuring a sustainable and responsible approach to producing carbon credits through following the latest methodological guidance. They are increasingly aligning to the latest definition of a quality baseline, which is expected to be significantly influenced by the Integrity Council for the Voluntary Carbon Market's high-integrity benchmark – the Core Carbon Principles (CCPs).

On the other track, some project developers will continue to move at a 'business-as-usual' speed, lagging behind the market's new baselines for quality. Our analysis indicates that there is a significant opportunity for developers to move into the first track and shift towards those methodologies which have been

About the authors



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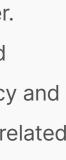
Maria is a co-founder of Abatable. Prior to Abatable, she worked as a Vice President at Goldman Sachs and advised large corporates and institutional investors on nature-based carbon removal and impact investment portfolios, most recently focused on work around carbon procurement.



Alejandro Limón Portillo

Carbon Knowledge and Data Manager at Abatable

Alejandro is Abatable's Carbon Knowledge and Data Manager. He has previously conducted sustainability research for Vivid Economics and McKinsey, where he focused on climate policy and carbon markets, contributing to the development of carbon-related products for internal clients.



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submitted for approval under the CCPs, with today's market carrying a significant amount of non-CCP eligible credits (see page 8).

Looking forward to the rest of 2024, we anticipate a surge in discussions surrounding new corporate commitments to the Task Force on Nature-related Financial Disclosures' (TNFD's) recommendations on reporting on nature, and the EU's new regulation ((EU) 2023/1115) on deforestation-free products. These developments are expected to bring biodiversity loss towards the top of the corporate agenda alongside emissions reduction. We expect this will fuel heightened interest in the integration of both carbon crediting and biodiversity initiatives.

The voluntary carbon market's journey in 2023 and our expectations for 2024 highlight the resilience and adaptability of this crucial sector. This is driven mainly by the growth of the project pipelines that carbon project developers bring to reality, and the continued backing they receive. Agile project developers moving towards the faster track of the market will take the pole positions in defining its future.

To access Abatable's market supply insights, visit <u>our website</u> or <u>request a demo</u> of our market intelligence solutions.



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About this report

Abatable's Voluntary Carbon Market Developer Overview

2023-2024 report analyses aggregate data from over 3,000 project developers reporting into the four major carbon credit registries – Verra's Verified Carbon Standard (VCS), Gold Standard (GS), Climate Action Reserve (CAR) and American Carbon Registry (ACR).

The report outlines the key market themes to watch in 2024 on page 6, breaks down our primary supply- and demandside observations in chart form from page 7, and lists the main developer activity in 2023 by issuance across different project types from **page 10** – including for the first time this year an indication of the percentage of issuances falling under methodologies submitted to the IC-VCM for CCP approval.

This report has been produced by Abatable, a carbon market intelligence and credit procurement platform.







Key themes to watch in 2024

A split between developers on quality, a convergence of carbon and biodiversity initiatives and increased cooperation on corresponding adjustments will all have a significant influence on the market this year.

The VCM will move to operate at two speeds

A notable divide will emerge to dominate carbon credit pricing dynamism in 2024. On one side, we expect to see a premium for the projects likely to be approved under the CCP and CORSIA's eligibility criteria (some of which will also have a corresponding adjustment letter of authorisation). Conversely, non-CORSIA, non-CCP eligible credits are likely to face challenges of oversupply and will struggle to maintain value in a market that is about to redefine the baseline for quality. This divergence will split the market into one moving at dual speeds. We expect to see a separation on projects with different methodologies, with more recent methodologies likely to trade at a premium reflecting a higher quality implementation cost.

2

TNFD pilots and insetting will intersect with carbon markets

We anticipate a surge in discussions in 2024 surrounding new corporate commitments for the Task Force on Nature-related Financial Disclosures (TNFD), which will be further charged by the EU's new Regulation (EU) 2023/1115 on deforestation-free products. These two developments are expected to bring biodiversity loss towards the top of the corporate agenda, alongside climate change. We expect this will fuel heightened interest in the integration of carbon offsetting and biodiversity initiatives, with better disclosures around biodiversity metrics incentivising land-based restoration commitments. This will also likely increase interest in interventions such as insetting to manage companies' Scope 3 emissions.

3

There will be increased cooperation around corresponding adjustments

We will expect closer cooperation between developers and authorities at the national and sub-national levels to push for greater clarity on host countries' carbon regulations and authorisation approval processes. Following on from 2023, we continue to see developers actively exploring the diversification of their project pipelines as a way to command a premium for international carbon trading or to capitalise on Article 6.2 bilateral deals. The limited capacity of governments, alongside delays in regulating the international transfer of nature and carbon-related assets, has resulted in difficulties in projects receiving government-level authorisations for international trading.







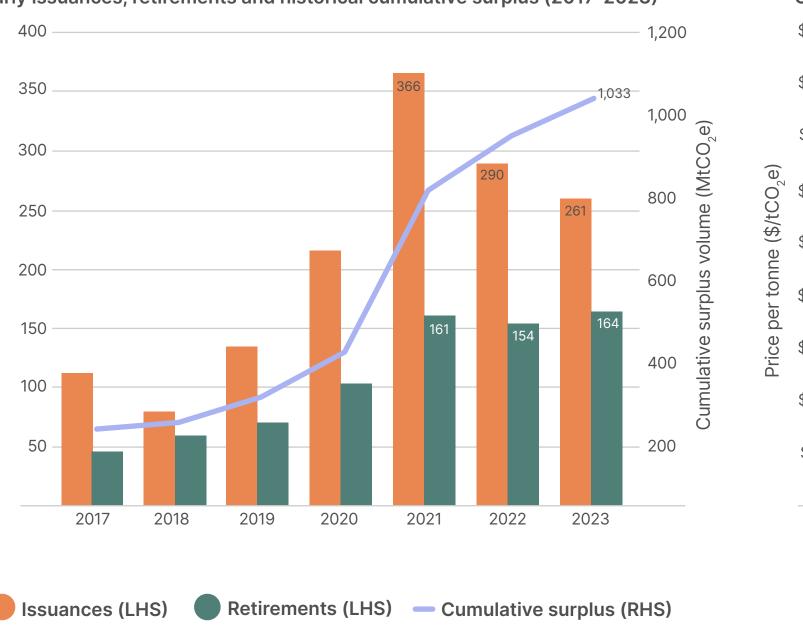
The VCM in charts

Issued and retired volume (MtCO₂e)

Market dynamics

The surplus of credits in the market increased further in 2023. This was despite retirements reaching record levels and yearly issuances decreasing by 10% compared to 2022, and follows on from 2021's significant increase in cumulative credit surplus.

The increase in market surplus led to a softening in prices and



Yearly issuances, retirements and historical cumulative surplus (2017-2023)

wider price dispersion, particularly across avoidance credits. In contrast, nature-based removal credits saw a price uptick on the back of limited supply and strong demand.

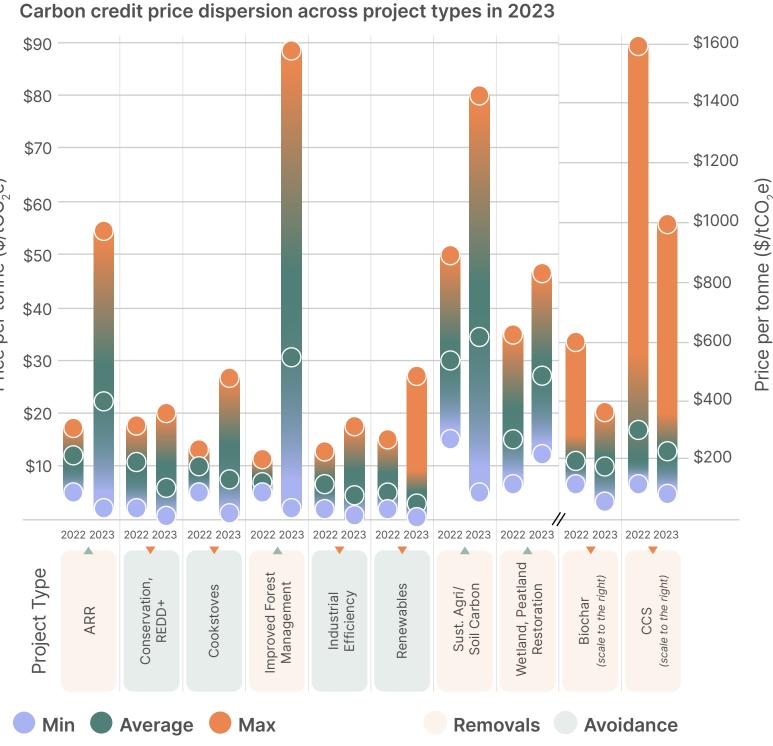
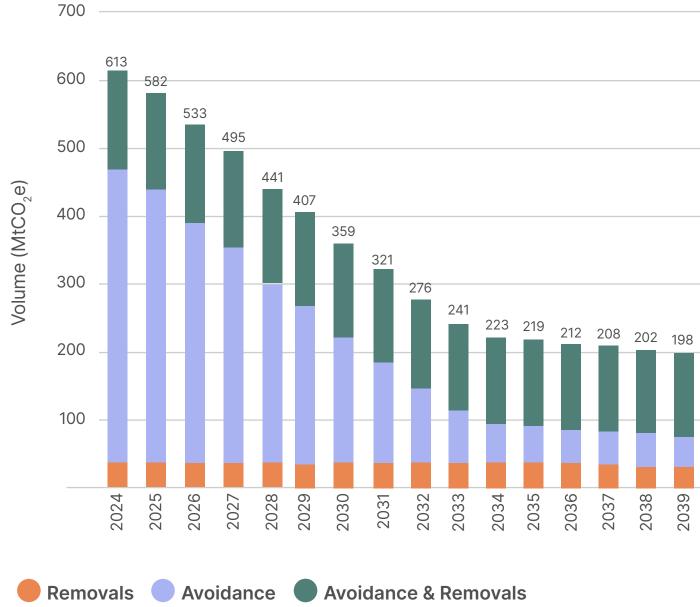


Figure 1. Source: Abatable, as of December 2023. Data include annual issuances and retirements aggregated over time across four main registries (VCS, Gold standard, ACR, CAR).

Figure 2. Source: Abatable, brokers' quotes and transactions, as of December 31, 2023. Data aggregated across over 1,200 quotes/transactions for 2022 and over 4,000 for 2023. Arrows on x-axis indicate an average price increase or decrease.

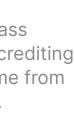
The market oversupply is expected to increase in future years, due to large projected supply from projects that are verified or are expected to be verified, which will further soften prices absent a sharp acceleration in demand.



Projected supply from verified projects under main carbon registries (2024-2040)

Figure 3. Source: Abatable, as of December 2023. Data projections encompass active projects in VCS, Gold Standard, ACR, and CAR registries, factoring in crediting periods and average annual issuance. They also account for a share of volume from unverified projects, excluding issuances from projects yet to enter registries.





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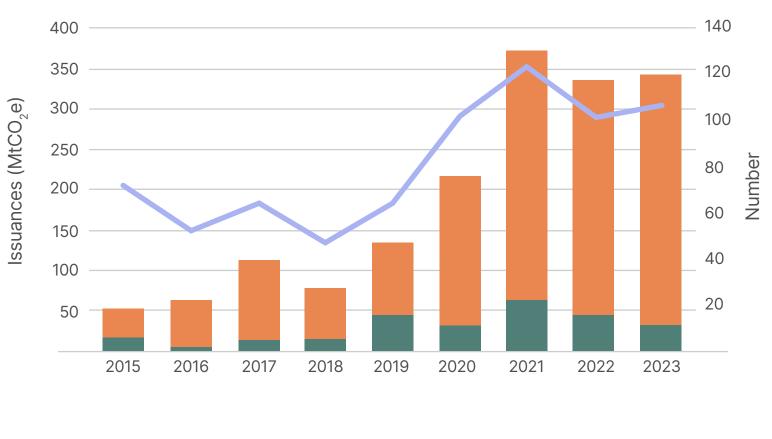


The VCM in charts

Supply

On the supply side, the share of credits issued from the top ten developers in terms of issuances experienced a decline in 2023 as new, smaller players enter the market.

Over 100 new project developers started issuing credits in 2023 for the fourth consecutive year, reinforcing existing supply with fresh vintages.





issuances is taken as the basis for defining a new developer.

Share of market concentration grouped by size of developers, in terms of issuances volume (2015-2023)

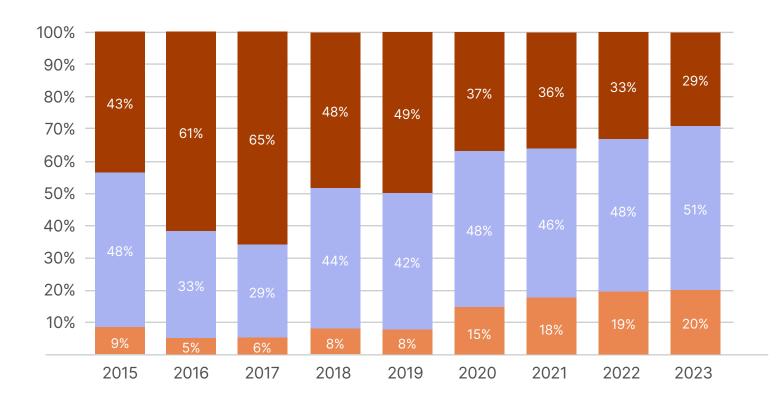
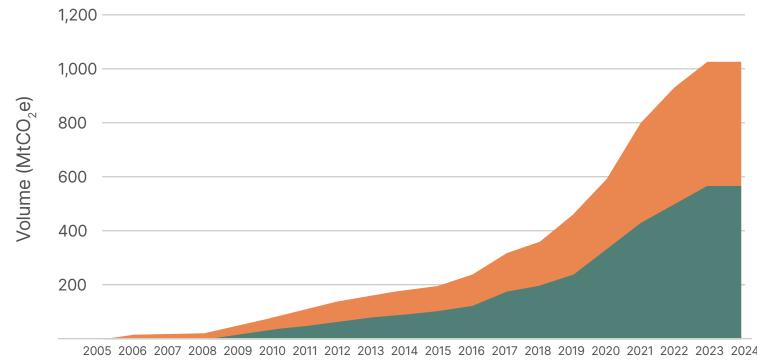




Figure 4. Source: Abatable, as of December 2023. Chart reflects issuances volume concentrated by groups of developers, based on size of credits issued on current year of analysis.

Around 54% of the market's surplus credits were issued using methodologies currently submitted for CCP review. These methodologies are not all likely to be approved, which will increase the stock of credits not adhering to the market's new quality baseline.

Cumulative stock of credits in the market split by submittal for CCP approval (2005 - 2024)



Credit stock from methodologies submitted for CCP approval

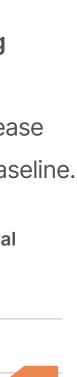
Credit stock from methodologies not submitted for CCP approval

Figure 6. Source: Abatable, sourcing data from IC-VCM Assessment Framework, as of February 2024. The analysis encompasses historic issuances associated to methodologies submitted for approval.





Figure 5. Source: Abatable, as of December 2023. A project developer's first year of







The VCM in charts

60

Demand

7,000

A record number of unique buyers retired credits for the first time in 2023, with first-time buyers dipping their toes in the market and retiring smaller numbers of credits.

Number of buyers and average retirement volume per buyer (2018-2023)

The market scrutiny in 2023 resulted in increased credit purchasing disclosures from buyers, leading to a reduction in the share of non-disclosing parties. The market still remains highly concentrated among the top 100 buyers.

volume (2020-2023)

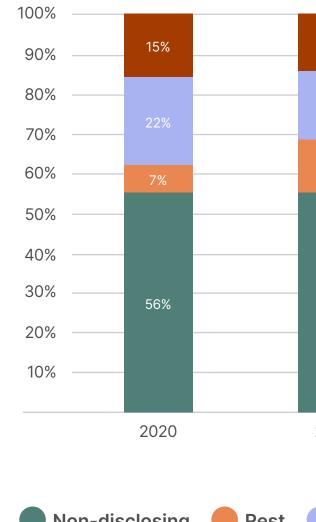
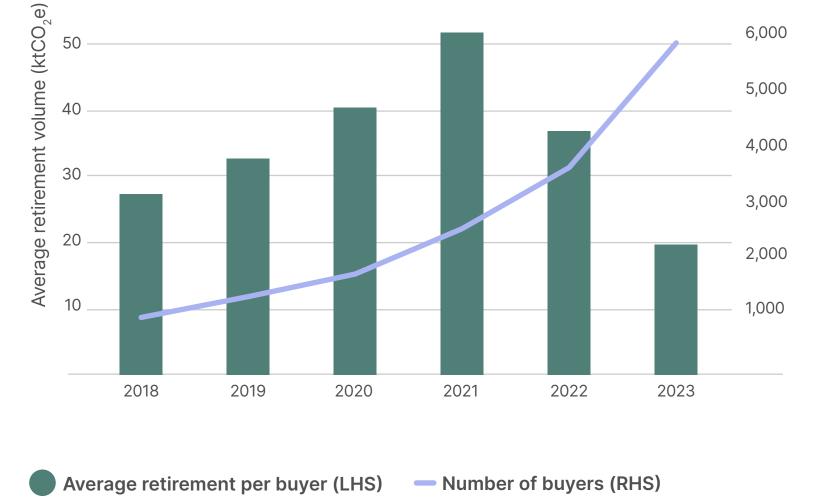


Figure 7. Source: Abatable, sourcing corporate buyer retirements from AlliedOffsets, as of December 2023. Data include retirements volume over time from four main registries (Verra, Gold Standard, ACR, CAR).

Figure 8. Source: Abatable, sourcing corporate buyer retirements data from AlliedOffsets, as of December 2023. Chart reflects retirements volume concentrated by groups of buyers, based on size of retirements.



Share of market concentration grouped by size of buyers, in terms of retirement

14% 16% 23% 14% 55% 51% 44% 2021 2022 2023 Non-disclosing Rest Top 11-100 Top 10

The top 100 carbon credit buyers in 2023 are predominantly (60%) from emission-intensive sectors – energy, surface transport and aviation – as these companies focus on hedging their existing and future carbon liabilities.

Sector distribution (%) of top 100 buyers in the market for 2023

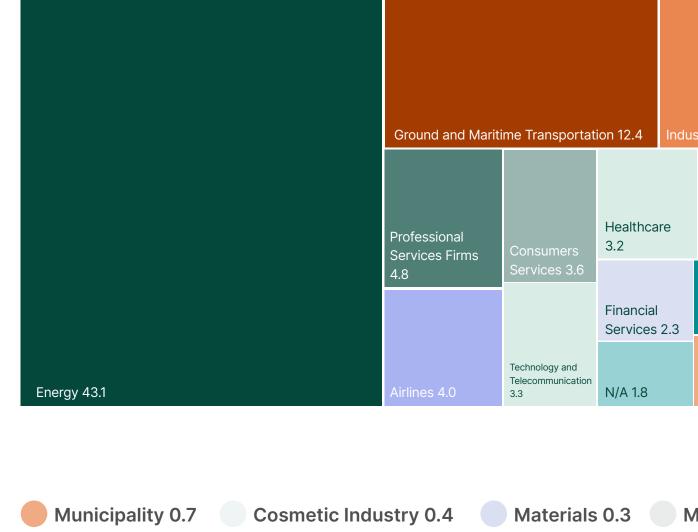


Figure 9. Source: Abatable, sourcing corporate buyer retirements data from AlliedOffsets, as of December 2023. Chart is representative for top 100 buyers in 2023.

Consume Goods 2.4

Media 0.3



Developer rankings 2023

CARBON CREDIT SUPPLY



Nature-based solutions – aggregated

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(i)

Source: Abatable analysis, total issued credits includes the sum across four carbon registries (ACR, CAR, VCS, GS) as of December 2023. Year on Year (YoY) growth data is compared against December 2022; ¹**Project types definitions:** REDD (forest conservation), IFM (Improved forest management), ARR (afforestation, reforestation, revegetation) and Sustainable Ag. (sustainable agriculture, incl. rice emissions management), Blue carbon (incl. wetland & peatland restoration); ²**Rankings** based on total issuances. ³**Percentage of issuances under CCP scrutiny** The figures in this column represent the share of the developer's total issuances that are from methodologies submitted by registries for CCP approval.

Note: Global as Portfolio focus indicates developers who develop projects across two continents. Country-specific are developers who only develop projects in one country. Regional indicates developers who develop within the same continent.

Developer name	Portf
Finite Carbon	Countr
Wildlife Works Carbon LLC	Global
Permian Global	Region
Anew Climate (formerly Blue Source and Element Markets)	Region
CIMA, Cordillera Azul	Countr
InfiniteEARTH	Countr
South Pole Holding Ag	Global
ACATISEMA	Countr
Terra Global Capital	Global
New Forests	Global
Bosques Amazónicos	Countr
CarbonCo	Countr
Greenoxx NGO	Countr
Conservation International Foundation	Global
The Nature Conservancy	Global
White Mountain Apache Tribe	Countr
Avoided Deforestation Project (Manaus) Limited	Countr
BioCarbon Partners	Countr
Green Assets, Inc.	Countr
Oromia Coffee Farmers Cooperative Union	Countr
The Conservation Fund	Countr
Guanaré SA	Countr
Florestal Santa Maria	Countr
AIDER	Countr
CKBV Florestal Ltda	Countr

tfolio focus	Project type focus ¹	Issued credits (Mt) (#Projects)	YoY growth (Issued / Projects)	2023 rank vs 2022 ²	Percentage of issuances under CCP scrutiny ³
ntry-specific	IFM	98.29 Mt (71)	+4% / +3%	1 +0	100%
al	REDD	92.98 Mt (17)	+19% / 0%	2 +0	0%
onal	REDD, IFM	40 Mt (2)	0% / 0%	3 +0	0%
onal	IFM, CCS, Other	38.13 Mt (106)	+21% / +2%	4 +1	96%
ntry-specific	REDD	36.61 Mt (1)	+45% / 0%	5 +2	0%
ntry-specific	REDD	33.63 Mt (1)	0% / 0%	6 -2	0%
al	REDD, Industrial Efficiency, Renewables	31.83 Mt (29)	+3% / 0%	7 -1	5%
ntry-specific	REDD	27.09 Mt (1)	+34% / 0%	8 +1	0%
al	REDD	23.44 Mt (19)	+23% / 0%	9 +1	0%
al	IFM	22.84 Mt (22)	+1% / 0%	10 -2	100%
ntry-specific	ARR, REDD	19.1 Mt (4)	+28% / 0%	11 +0	0%
ntry-specific	REDD	15.34 Mt (4)	+11% / 0%	12 +0	0%
ntry-specific	REDD	13.65 Mt (2)	+39% / 0%	13 +2	0%
al	REDD	12.8 Mt (8)	+108% / 0%	14 +13	0%
al	REDD, IFM	11.7 Mt (26)	+29% / 0%	15 +3	78%
ntry-specific	IFM	11.56 Mt (5)	+1% / 0%	16 -3	100%
ntry-specific	REDD	10.06 Mt (1)	0% / 0%	17 -3	0%
ntry-specific	REDD	10 Mt (2)	+2% / 0%	18 -2	0%
ntry-specific	IFM	9.38 Mt (7)	+6% / 0%	19 +0	100%
ntry-specific	REDD, Cookstoves	9.14 Mt (1)	0% / 0%	20 +3	0%
ntry-specific	IFM	8.43 Mt (10)	+6% / 0%	21 +1	96%
ntry-specific	ARR	8.34 Mt (1)	0% / 0%	22 <mark>-2</mark>	0%
ntry-specific	REDD	8.25 Mt (1)	0% / 0%	23 -2	0%
ntry-specific	REDD	8.01 Mt (7)	+28% / 0%	24 +2	0%
ntry-specific	REDD	7.65 Mt (1)	+133% / 0%	25 +18	100%

Nature-based solutions – Afforestation, reforestation, revegetation (ARR)



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Source: Abatable analysis, total issued credits includes the sum across four carbon registries (ACR, CAR, VCS, GS) as of December 2023. Year on Year (YoY) growth data is compared against December 2022; ¹ Rankings based on total issuances. ² Percentage of issuances under CCP scrutiny The figures in this column represent the share of the developer's total issuances that are from methodologies submitted by registries for CCP approval.

Note: Global as Portfolio focus indicates developers who develop projects across two continents. Country-specific are developers who only develop projects in one country. Regional indicates developers who develop within the same continent.

Developer name

Guanaré SA

C2I LLC

EUCAPINE S.R.L

Guizhou Xinzhanxin Agricultural Technology Co., Ltd.

Guizhou Baiheng Fertiliser Co., Ltd

Clean Air Action Corporation

FORLIANCE GmbH

Livelihoods Fund

El Arriero' S.A.

South Pole Holding Ag

Mikro-Tek Inc.

Mangalam Timber Products Limited

Green Resources AS

Proteak UNO S.A.B. de C.V.

Greenchoice

Hefei Luyu Agricultural Technology Co., Ltd.

Treevive

Los Eucaliptus S.A.

Jilin Forest Industry Environmental Technology Co., Ltd.

LibraCarbon

Agroempresa Forestal S.A.

Global-Woods International AG

Pur Projet

Reforestadora Cumare S.A.S.

Cambium Forestal Uruguay S.A

Portfolio focus	Issued credits (Mt) (#Projects)	YoY growth (Issued / Projects)	2023 rank vs 2022 ¹	Percentage of issuance under CCP scrutiny ²
Country-specific	8.34 Mt (1)	0% / 0%	1 +0	
Country-specific	6.27 Mt (1)	0% / 0%	2 +0	10
Country-specific	5.81 Mt (1)	+>100% / 0%	3 +56	
Country-specific	4.9 Mt (5)	+26% / 0%	4 +1	10
Country-specific	4.42 Mt (4)	+13% / 0%	5 -1	10
Global	4.12 Mt (18)	0% / 0%	6 -3	
Global	3.55 Mt (4)	0% / 0%	7 -1	10
Global	1.84 Mt (11)	+24% / 0%	8 +0	2
Country-specific	1.74 Mt (1)	n/a	9 n/a	
Global	1.53 Mt (17)	0% / 0%	10 -3	9
Country-specific	1.39 Mt (1)	0% / 0%	11 -2	10
Country-specific	1.22 Mt (1)	0% / 0%	12 <mark>-2</mark>	
Regional	1.11 Mt (3)	0% / 0%	13 <mark>-2</mark>	
Country-specific	1.03 Mt (1)	0% / 0%	14 <mark>-2</mark>	10
Country-specific	0.99 Mt (1)	0% / 0%	15 <mark>-2</mark>	
Country-specific	0.9 Mt (1)	0% / 0%	16 <mark>-2</mark>	10
Global	0.77 Mt (1)	0% / 0%	17 <mark>-2</mark>	
Country-specific	0.69 Mt (1)	+>100% / 0%	18 +46	
Country-specific	0.64 Mt (7)	0% / 0%	19 -3	10
Country-specific	0.57 Mt (1)	0% / 0%	20 -3	10
Country-specific	0.53 Mt (1)	n/a	21 +45	10
Global	0.5 Mt (3)	0% / 0%	22 -4	10
Global	0.48 Mt (5)	+115% / 0%	23 -9	
Country-specific	0.45 Mt (1)	n/a	24 +42	10
Country-specific	0.44 Mt (2)	n/a	25 +41	10



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Nature-based solutions – REDD / Forest conservation

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(i)

Source: Abatable analysis, total issued credits includes the sum across four carbon registries (ACR, CAR, VCS, GS) as of December 2023. Year on Year (YoY) growth data is compared against December 2022; ¹ **Rankings** based on total issuances. ² **Percentage of issuances under CCP scrutiny** The figures in this column represent the share of the developer's total issuances that are from methodologies submitted by registries for CCP approval. Verra included its new REDD+ methodology for CCP assessment and excluded all issuances from its previous REDD+ methodologies. It has announced that it is creating a pathway that enables project issuances from older REDD+ methodologies to transition these to the latest version being considered under CCP.

Note: Global as Portfolio focus indicates developers who develop projects across two continents. Country-specific are developers who only develop projects in one country. Regional indicates developers who develop within the same continent.

Developer name

Wildlife Works Carbon LLC

Permian Global

CIMA, Cordillera Azul

InfiniteEARTH

South Pole Holding Ag

ACATISEMA

Terra Global Capital

Bosques Amazónicos

CarbonCo

Greenoxx NGO

Conservation International Foundation

Avoided Deforestation Project (Manaus)

BioCarbon Partners

Oromia Coffee Farmers Cooperative Union

Florestal Santa Maria

AIDER

CKBV Florestal Ltda

RMDLT Property Group Ltd.

Biofilica Ambipar

Brazil AgFor LLC

FUNDAECO

Carbonext

Govt. of Madagascar, Direction Generale des Forets

Carbon Tanzania

MADERERA RIO ACRE SAC

Portfolio focus	Issued credits (Mt) (#Projects)	YoY growth (Issued / Projects)		23 rank 20221	Percentage of issuand under CCP scrutiny ²	ces
Global	92.98 Mt (17)	+19% / 0%	1	+0		0%
Country-specific	40 Mt (1)	0% / 0%	2	+0		0%
Country-specific	36.61 Mt (1)	+45% / 0%	3	+2		0%
Country-specific	33.63 Mt (1)	0% / 0%	4	-1		0%
Global	30.12 Mt (8)	+3% / 0%	5	-1		0%
Country-specific	27.09 Mt (1)	+34% / 0%	6	+0		0%
Global	23.44 Mt (12)	+23% / 0%	7	+0		0%
Country-specific	19.06 Mt (3)	+28% / 0%	8	+0		0%
Country-specific	15.34 Mt (4)	+11% / 0%	9	+0		0%
Country-specific	13.65 Mt (2)	+39% / 0%	10	+1		0%
Global	12.8 Mt (5)	+108% / 0%	11	+7		0%
Country-specific	10.06 Mt (1)	0% / 0%	12	-2		0%
Country-specific	10 Mt (2)	+2% / 0%	13	-1		0%
Country-specific	9.14 Mt (1)	0% / 0%	14	-1		0%
Country-specific	8.25 Mt (1)	0% / 0%	15	-1		0%
Country-specific	8.01 Mt (7)	+28% / 0%	16	+1		0%
Country-specific	7.65 Mt (1)	+133% / 0%	17	+6		0%
Country-specific	7.09 Mt (1)	0% / 0%	18	-3		0%
Country-specific	6.42 Mt (8)	+16% / 0%	19	+0		0%
Country-specific	6.31 Mt (1)	0% / 0%	20	-4		0%
Country-specific	6.26 Mt (1)	+32% / 0%	21	-1		0%
Country-specific	4.35 Mt (12)	+20% / +9%	22	+0		0%
Country-specific	3.92 Mt (2)	0% / 0%	23	-2		0%
Country-specific	3.68 Mt (4)	+104% / 0%	24	+2		0%
Country-specific	3.67 Mt (1)	n/a	25	n/a		0%



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Household devices and improved cookstoves



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Source: Abatable analysis, total issued credits includes the sum across four carbon registries (ACR, CAR, VCS, GS) as of December 2023. Year on Year (YoY) growth data is compared against December 2022; ¹**Rankings** based on total issuances. ²**Percentage of issuances under CCP scrutiny** The figures in this column represent the share of the developer's total issuances that are from methodologies submitted by registries for CCP approval.

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Developer name

C-Quest Capital

Impact Carbon

CO2balance UK Ltd.

MyClimate Foundation

Relief International

Burn Manufacturing Co

Vestergaard Frandsen Group SA

MicroEnergy Credits

UpEnergy

Hestian Innovation

DelAgua

Toyola Energy Services Limited

Value Network Venture Advisory Services (VNV Advisory)

Bangladesh Bondhu Foundation

Envirofit International

The African Stove Company Limited (TASC)

Microsol SAS

Proyecto Mirador

South Pole Holding Ag

KOKO Networks

Intraco

Livelihoods Fund

Sirreon Technology & Development (Beijing) Co., Ltd.

GERES

AERA Group

Portfolio focus	Issued credits (Mt) (#Projects)	YoY growth (Issued / Projects)	2023 rank vs 20221	Percentage of issuance under CCP scrutiny ²
Global	16.69 Mt (74)	+354% / +42%	1 +5	8
Global	15.59 Mt (78)	+26% / +53%	2 -1	8
Global	10.02 Mt (433)	+29% / +2%	3 -1	S S
Global	5.36 Mt (17)	+27% / 0%	4 +1	9
Country-specific	5.16 Mt (1)	0% / 0%	5 -2	10
Global	5 Mt (40)	+60% / +38%	6 +1	
Country-specific	4.48 Mt (1)	0% / 0%	7 -3	
Global	3.77 Mt (61)	+1,343% / 0%	8 +35	7
Global	3.7 Mt (81)	+151% / +11%	9 +11	3
Regional	3.43 Mt (44)	+128% / 0%	10 +9	5
Global	3.06 Mt (9)	+371% / +13%	11 +15	7
Country-specific	3.05 Mt (1)	0% / 0%	12 -4	10
Regional	2.97 Mt (29)	+443% / +4%	13 +17	
Country-specific	2.95 Mt (107)	+112% / 0%	14 +7	5
Global	2.87 Mt (34)	+4% / +3%	15 -6	
Global	2.84 Mt (8)	+647% / +33%	16 +20	10
Global	2.83 Mt (10)	+32% / 0%	17 -6	
Regional	2.7 Mt (5)	+13% / +67%	18 -8	10
Global	2.54 Mt (75)	+31% / 0%	19 -6	5
Country-specific	2.42 Mt (2)	0% / 0%	20 +81	10
Regional	2.36 Mt (14)	+2,215% / +40%	21 +38	6
Global	2.14 Mt (7)	+20% / +40%	22 -7	10
Country-specific	2.13 Mt (11)	+27% / +38%	23 -7	10
Global	2.01 Mt (3)	0% / 0%	24 -12	
Global	1.94 Mt (12)	+60% / +20%	25 -2	6

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Renewable Energy



Keep us up-to-date with your developer portfolio data and gain access to our latest market intelligence insights. Email: abatable.com

Source: Abatable analysis, total issued credits includes the sum across four carbon registries (ACR, CAR, VCS, GS) as of December 2023. Year on Year (YoY) growth data is compared against December 2022; 1Rankings based on total issuances. 2 Percentage of issuances under CCP scrutiny The figures in this column represent the share of the developer's total issuances that are from methodologies submitted by registries for CCP approval.

Note: Global as Portfolio focus indicates developers who develop projects across two continents. Country-specific are developers who only develop projects in one country. Regional indicates developers who develop within the same continent.

Developer name

EKI Energy Services Ltd (EnKing International)

Jaiprakash Power Ventures Limited

Himachal Baspa Power Company Ltd.

Hyundai Steel

Foz do Chapecó Energia S/A

CLP India Private Limited

PT. PLN (Persero)

Mytrah Energy (INDIA) Ltd.

TamilNadu Spinning Mills Association

Hebei Construction Investment New Energy Co., Ltd.

ReNew

Sanko Enerji Sanayi ve Ticaret A.Ş

CECEP Wind Power (Gansu) Co., Ltd.

Orange Renewable Power Pvt Ltd.

Emergent Ventures India Private Limited

Jianshitan Hydroelectric

Infinite Environmental Solutions LLP

South Pole Holding Ag

Ecofinance Negocios

Zuvan Energy Private Limited

Ruzgar Danismanlik

Sembcorp Green Infra Limited

Wind World (India) Limited

Guohua Wind Power Co., Ltd.

Limak Yatirim Enerji Uretim Isletme Hizmetleri

Portfolio focus	Issued credits (Mt) (#Projects)	YoY growth (Issued / Projects)	2023 rank vs 2022 ¹	Percentage of issuances under CCP scrutiny ²
Global	47.4 Mt (138)	+17% / +9%	1 +0	92%
Country-specific	29.09 Mt (2)	+5% / 0%	2 +0	100%
Country-specific	23.15 Mt (1)	+15% / 0%	3 +0	100%
Country-specific	22.13 Mt (2)	+38% / 0%	4 +0	100%
Country-specific	13.74 Mt (1)	+276% / 0%	5 +22	100%
Country-specific	13.08 Mt (14)	+9% / 0%	6 -1	100%
Country-specific	11.93 Mt (3)	+46% / 0%	7 +3	100%
Country-specific	11.58 Mt (6)	0% / 0%	8 -2	100%
Country-specific	11.13 Mt (6)	0% / 0%	9 -2	100%
Country-specific	10.81 Mt (10)	+5% / 0%	10 -2	100%
Country-specific	10.55 Mt (7)	+9% / 0%	11 -2	100%
Country-specific	8.67 Mt (9)	+10% / +13%	12 <mark>-1</mark>	100%
Country-specific	8.6 Mt (8)	+18% / 0%	13 +1	100%
Country-specific	7.98 Mt (12)	+7% / +33%	14 -1	100%
Country-specific	7.52 Mt (6)	0% / 0%	15 +3	100%
Country-specific	7.36 Mt (1)	+11% / 0%	16 +0	100%
Global	7.28 Mt (54)	+40% / +15%	17 +5	99%
Global	7.11 Mt (73)	+1% / +9%	18 -3	100%
Country-specific	6.73 Mt (1)	+21% / 0%	19 <mark>-1</mark>	100%
Country-specific	6.05 Mt (1)	+30% / 0%	20 +4	100%
Global	5.97 Mt (20)	+10% / +18%	21 -2	100%
Country-specific	5.9 Mt (17)	0% / 0%	22 -5	100%
Country-specific	5.52 Mt (18)	+15% / 0%	23 +0	100%
Country-specific	5.38 Mt (9)	+1% / 0%	24 -4	100%
Country-specific	5.19 Mt (2)	0% / 0%	25 -4	100%



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About Abatable



About Abatable

Abatable is a carbon market intelligence and credit procurement platform. Our mission is to empower every organisation to build a thriving future for climate, nature and people.

We have built a series of tools to help carbon project developers, buyers and investors navigate the market, split into two main categories: market intelligence and credit procurement.

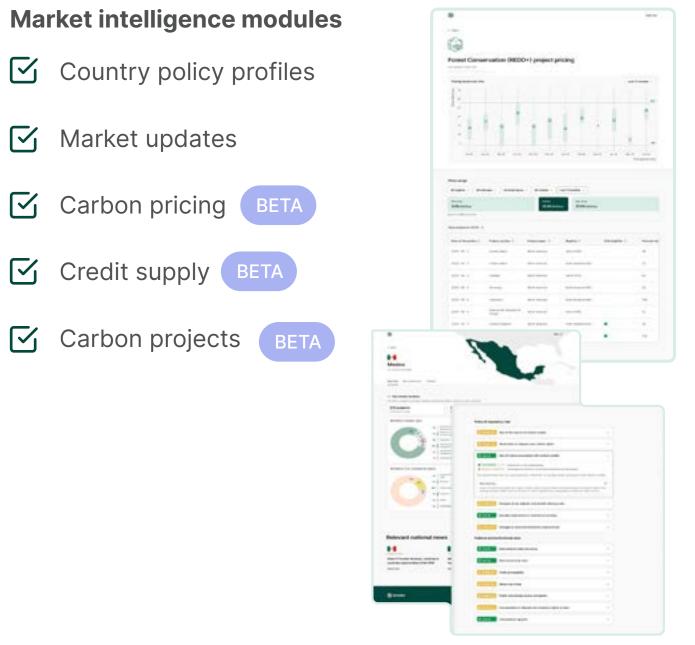
We believe providing the intelligence to allow those in the market to operate with confidence and the credit infrastructure to allow easy and transparrent transactions will enable effective, scalable climate action.

Our extensive carbon project developer network helps power these tools. Join our network to access data insights and get notified of new sourcing opportunities from buyers, advisors and investors.

Market intelligence platform

Navigate the carbon market

Abatable's market intelligence platform helps you understand the carbon market through data exploration tools, supported by comprehensive analysis.



Credit procurement platform

Deliver high-impact climate action

Our procurement platform provides buyers and investors with access into the carbon market to find and assess carbon projects and transact with them.

- Explore one of the largest networks of carbon developers
- Access pre-assessed projects exclusive to Abatable
- $\mathbf{\nabla}$ Discover early-stage opportunities
- Build compliant portfolios (i.e. CORSIA or CCPaligned)
- Benefit from end-to-end transaction support







MARKET INTELLIGENCE

Addressing fundamental carbon market challenges

Abatable's carbon market intelligence solutions allow users to get a comprehensive, interactive view of the carbon market, supported by expert in-house analysis.

Our modules enable users to access:

- Country risk profiles tailored for the VCM, covering ~80% of historical issuances

- Carbon pricing trends and forecasts, informed by over

5,000 historical transaction prices and broker quotes

- Historical issuance data and inventory analysis, from 11 main carbon registries with weekly updates

- In-depth methodology reviews, flagging potential quality pitfalls

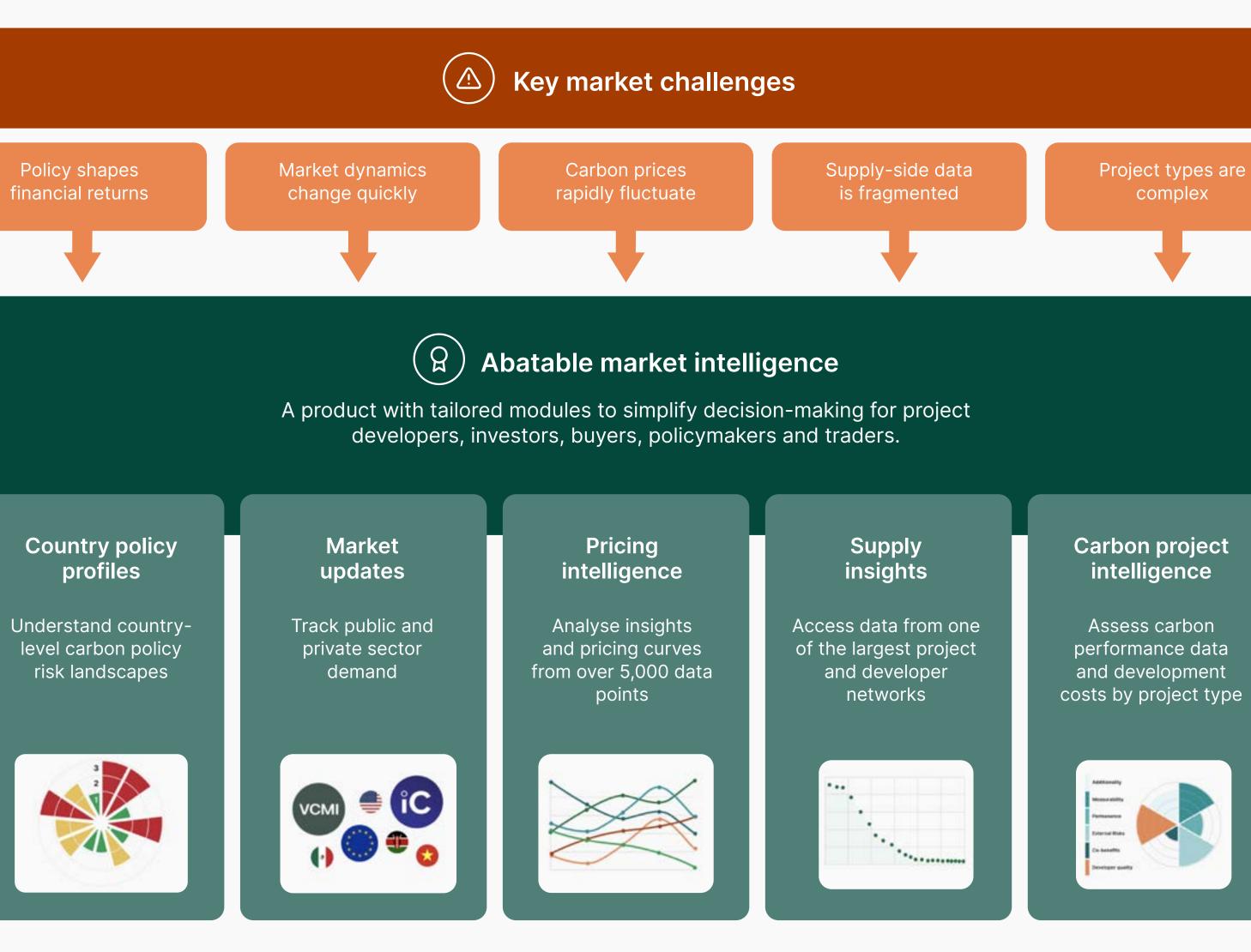
Carbon Compass @

Carbon market updates from # Abatable

Keep up-to-date on the latest market developments by signing up to Abatable's Carbon Compass Newsletter.

profiles

level carbon policy risk landscapes











SOLUTIONS FOR PROJECT DEVELOPERS **Delivering high-impact** climate action

Abatable provides companies and investors with a unique level of access to carbon projects, including early-stage opportunities. We do this through one of the largest carbon project networks, which companies can access with Requests for Proposals (RfPs) through Abatable's standardised system – making it easy for project developers to respond directly to market demand.

We work on behalf of our project partners to bring their environmental assets to market through our RfP platform and maximise reliable and long-term financial returns that best suit their needs.

Join our network of carbon project developers to get notified of new sourcing opportunities from buyers, advisors and investors.

Carbon credit distribution

Supporting carbon project developers and credit holders across the world to access high-integrity buyers and secure fair and long-term partnerships.

Access and participate in RfPs from across the market with a single standardised form. Skip the lengthy and bespoke submission processes. One submission, just a few clicks.

Access a wealth of post-RFP data on the performance of your offer against other submissions.



Access to finance

Connecting early-stage projects and developers in need of finance with investors through flexible and transparent solutions that deliver impact for both parties.

Abatable works with investors to help them identify high-quality investment opportunities at early stages of development.

Abatable acts as an originator to multiple investment funds with leading ESG standards.





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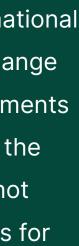
The Leather Market. 11-13 Weston St, SE1 3ER Londond, United Kingdom



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About Abatable

Abatable is a market intelligence and carbon credit sourcing platform for the voluntary carbon market. Our technology platform connects companies and climate investors to the largest network of climate projects across the globe. We exist to help every organisation build a thriving future for climate, nature and people. Find out more at <u>abatable.com</u>







Certified

