Insights into responsible investing

CREATE A POSITIVE IMPACT

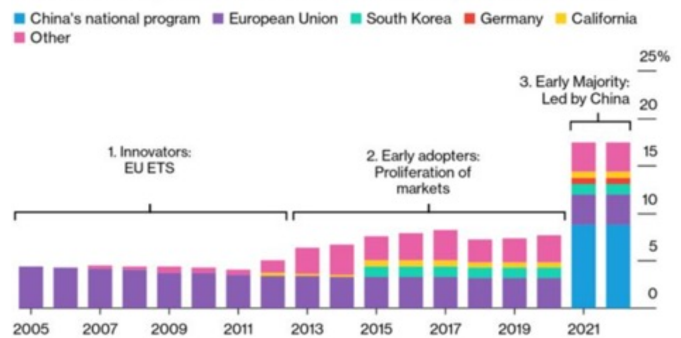
Wealth Management

Issue 12 | Q3 2023

What are carbon credits?

With the growing acknowledgement of the need to put a price on pollution, there has been an expansion in the global carbon market as these markets become established in more regions.

Carbon credits live within the compliance carbon markets (CCMs), also known as emissions trading systems or cap and trade programs. Almost a fifth of global emissions are now covered by cap and trade programs.



CCMs are regulated by international, national or regional governments. Carbon credits, also referred to as carbon allowances, are a commoditized product and represents a permit to emit CO2. In this system, governments or regulators set a limit on carbon emissions (a cap) with allowances either granted or auctioned to registered emitters. Some emitters release more CO2 than their allowance permits (credit deficiency), and others release less than their allowance (credit surplus); the excess can

Continued on page 2

What are carbon credits?, continued from page 1

then be traded to companies who require more credits to meet their obligations. This dynamic creates the supply and demand aspect of the carbon market and incentivizes emitters to reduce their carbon emissions.

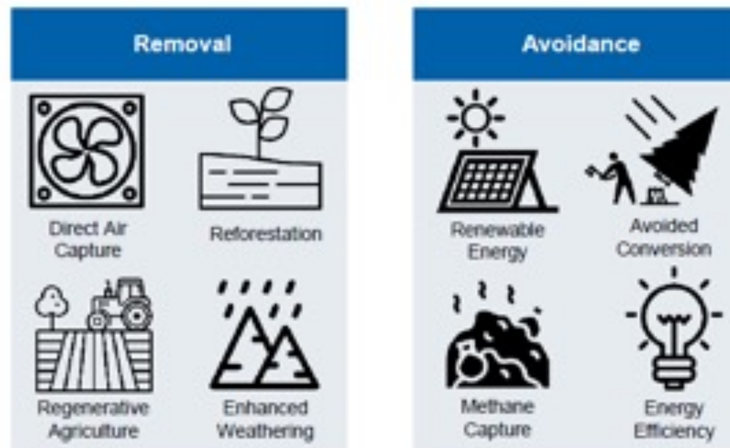
Carbon credits are traded in two types of markets

1. Primary carbon markets, which allow for carbon allowances to be bought and sold by regulated companies to align with regulator/government set emissions caps. Entities can then sell their surplus credits to entities in need of credits, while some regions allow regulated entities to purchase credits to meet obligations.
2. Secondary carbon markets, which allow for market participants (i.e. banks, trading companies) to provide liquidity to regulated entities in a cap and trade program. Participants are also able to hedge through carbon futures and derivatives, given that increased liquidity supports price discovery.

Carbon offsets

Within the global carbon markets, there are also voluntary carbon markets, where carbon offsets live. Carbon offsets are generated by projects that avoid, reduce or remove CO_2 from the atmosphere.

Offsets include:



The voluntary carbon markets (VCMs) are an unregulated system of issuers, verifiers, certifiers, exchanges and buyers which allow companies and other entities to purchase carbon offsets in order to reduce their greenhouse gas (GHG) emissions footprint. Demand for carbon offsets is accelerating with a 7x growth rate since 2018 and are expected to grow at a rate of 20x from now until 2030.*

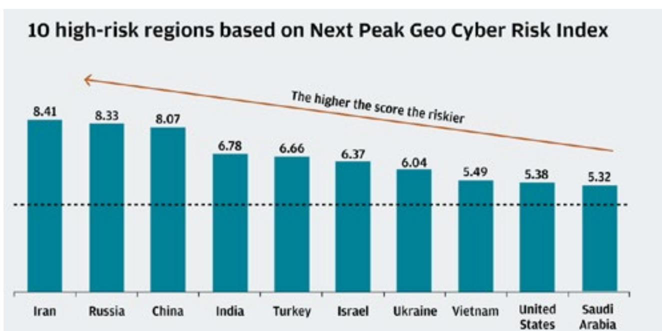
* RBC Capital Markets internal research

How advancements in AI are growing the importance of cybersecurity

Artificial intelligence (AI) “is the science and engineering of making intelligent machines, especially intelligent computer programs. It is related to the similar task of using computers to understand human intelligence, but AI does not have to confine itself to methods that are biologically observable.”[1] At its simplest form, AI combines computer science and robust datasets to enable problem solving, also encompassing machine learning and deep learning—subsets that are commonly mentioned in conjunction with AI.[2] The sectors most impacted are information technology, consumer discretionary, financials and communication services.[3]

How does this relate to environmental, social and governance (ESG) investing?

As the digital spaces continue to evolve, cybersecurity is increasingly a risk for broadening groups of stakeholders. Cybersecurity has transformed from a technological risk to a key metric for the social pillar, under ESG factors.[3] Companies are subject to an increasing amount of cyber-attacks and social engineering threats, which puts customers’ information and companies’ reputations at risk.[4] Cybersecurity issues also have a material impact on the broader industry and may increase costs to protect data.



Source: Next Peak (Horizontal line = average score 4.43). Note: Scores range from 0 (safest) to 10 (riskiest).

Cybersecurity has become a worldwide social concern, and it’s important to consider the region in which a firm operates as an important factor of cybersecurity risk.

According to Next Peak, China has a strong national cyber strategy and established cyber emergency response team. However, China topped the index for state cyber threat risk, due to weak cybercrime laws and alleged hacking activities. On the other hand, the U.S. has strong cyber capabilities supported by government. However, the U.S. remains a prime target for cybercrime, based on Next Peak’s analysis.

Continued on page 3

How advancements in AI are growing the importance of cybersecurity, continued from page 3

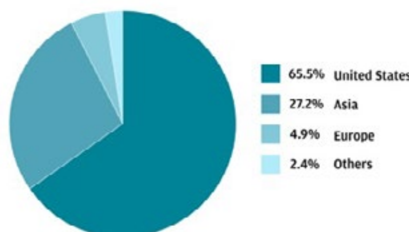
Source: MSCI, J.P. Morgan, Bloomberg Finance L.P.

The MSCI ACWI IMI Global Cyber Security Index shows that cybersecurity matters as an ESG concern. The index aims to represent companies that could potentially benefit from increased investment in firms that provide support and protection against cyberattacks. Though it underperformed the information technology index for most of 2020, the index outperformed the benchmark—showing a viable investment signal in this growing space.

What has changed?

As the digital economy continues to gain traction, cybersecurity is no longer just a software industry concern. It is becoming a major topic for management and investors, with a broader demographic increasingly more concerned with the social and technological implications of cybersecurity.[3]

The average total cost of a data breach has reached $4 million, growing the industry of protection. Core security spending reached $68 billion in 2020.[3]



Source: Bloomberg Finance L.P., J.P. Morgan.

Years of work on AI recently came to fruition with the release of new generative AI systems (generative meaning that this type of AI creates something that didn't previously exist). New open-source tools have capabilities to produce very human-like responses and creations.[5]

These breakthroughs in AI, though revolutionary, open new possibilities for cybersecurity risk.

With global cybersecurity threats growing 38% in 2022[6], the increase in AI advancements may impact cybersecurity growth in companies. It is critical that leaders act accordingly to these growing threats and may call for government oversight to ensure AI usage doesn't become detrimental to cybersecurity efforts.

Three main risks[7]

AI-generated phishing scams

Many phishing scams are easily recognized—they often lack proper grammar, spelling and use awkward phrasing. However, new open-source AI chatbots may create an opportunity for more sophisticated phishing scams with the new ability to converse seamlessly in many languages. Fortunately, detector technology for these chatbots exists and firms can integrate this tool into their IT infrastructure.

More accessible code for malicious intent

AI chatbots are becoming more proficient at generating code that can be manipulated into malicious actions such as hacking. On the flip side, firms are also equipped with these tools to prevent threats, and with proper employee training, AI chatbots can be used as a powerful tool to prevent cybersecurity threats.

Regulating AI usage and capabilities

If popular chatbot tools with millions of users were to be hacked, this poses a major risk of the dissemination of misinformation. Enhanced government oversight may be necessary to prevent this potentially large-scale risk. Additional data security regulations have been introduced globally to enhance the protection of personal information, reshaping corporate behavior toward data usage and security. In May 2018, the General Data Privacy Regulation in Europe (EU GDPR) was introduced and in June 2018, the California Consumer Privacy Act (CCPA) was passed. Growing compliance requirements will likely drive corporate spending higher and may lead to financial losses if companies commit misconduct.[3]

AI has enormous potential to add business value and contribute to society, however there are also potential social risks that it may have on society. When incorporating ESG factors into investment decisions, it is important for investors to consider cybersecurity as a social risk that is increasingly impacting a firm's bottom line through financial and reputational risks.

1. What is Artificial Intelligence | https://www-formal.stanford.edu/jmc/whatisai.pdf
2. What is artificial intelligence (AI) | https://www.ibm.com/topics/artificial-intelligence
3. Why is Cybersecurity Important to ESG | https://www.jpmorgan.com/insights/research/why-is-cybersecurity-important-to-esg
4. INTERNET MEDIA & SERVICES Sustainability Accounting Standard | https://www.sasb.org/wp-content/uploads/2018/11/Internet_Media_Services_Standard_2018.pdf
5. What is generative AI? The evolution of artificial intelligence | https://www.infoworld.com/article/3689973/what-is-generative-ai-the-evolution-of-artificial-intelligence.html
6. https://www.darkreading.com/attacks-breaches/check-point-research-reports-a-38-increase-in-2022-global-cyberattacks
7. The New Risks ChatGPT Poses to Cybersecurity | https://hbr.org/2023/04/the-new-risks-chatgpt-poses-to-cybersecurity

Growing pains

ESG—a booming trend in the responsible investing world—has become a politicized acronym, specifically in the U.S. This broad term, ESG, is often used to mean different things and has become synonymous with using a "screening and exclusions" approach. Some might not even remember what the acronym ESG stands for—environmental, social and governance.

Responsible investing defined

When RBC Wealth Management uses the term responsible investing, we mean the various uses of ESG data, factors or considerations into an investment portfolio.

ESG integration defined

ESG integration is systemically incorporating material ESG factors into investment decision making to identify potential risks and opportunities and to help improve long-term, risk-adjusted returns, alongside financial information to help inform choices. Material ESG factors are those identified as most relevant to the financial performance and enterprise value of a company. As such, material ESG factors have a real influence on investment outcomes.

Another way to describe ESG integration is enhanced due diligence or enhanced fundamental analysis: Using additional data for a greater view and appreciation of the potential risks and opportunities a company may face.

Imagine you're buying a home. You research mortgage interest rates, comparable prices in the area and your realtor walks you through a home you're interested in. But only half the doors are open. Are you willing to buy it? For most, the answer is no.

You want to see the rest of the rooms, check out the lighting, foundation and layout. Make sure there isn't mold, leaky pipes or other skeletons hiding behind those doors. All these factors are essential to assessing the value of that house for you and your family. Investors should do the same thing when they buy and sell other assets; consider as much information as possible.

When applying ESG integration, we are looking at material factors that are likely to impact a company's future growth and financial performance. It is not about a company's end-product: i.e. the can of soda. What is considered is how that can of soda is made, how it is marketed and if the company invests in wastewater recycling, for example. Last year's sales and the company's debt load are important information to consider. However, the company's future profits and stock prices can also be impacted by how much water that company uses and if it comes from water-stressed areas. Different industries have their own unique material factors.

Continued on page 6

Growing pains, continued from page 5

The growing pains

When people talk about ESG, they most likely mean different things. ESG has matured to the point where it is now facing criticism for both doing too much and not enough. Unfortunately, misinformation around what ESG is has sparked increased politicization that could ultimately limit investors' choices on how they construct their portfolio.

On the one hand, there is political pushback toward some investors who are being perceived as attempting to further an ideological agenda through the integration of ESG. On the other hand, there is criticism around some ESG integration approaches considered to be greenwashing and failing to evoke change or make an impact. Investors are taking these challenges as an opportunity to clarify their messages and definitions around ESG integration.

ESG is going through a teenage growth spurt, according to one professional on the panel at RBC Capital Markets' Global Financial Institutions Conference in New York, drawing comparisons with the stage of the financial markets 70 years ago, before the establishment of the SEC. The panelist explained, "We don't have definitions or standardized frameworks and benchmarks—these things are going to take time as this space matures and evolves."

Amid continued demand for responsible investing, regulators will focus on disclosure and reporting standards to safeguard investors and regain their confidence. There is an opportunity to more clearly define and better regulate this space to help mitigate greenwashing.

The confusion in this space has sparked legislation in certain regions to place bans on using ESG in investments. It doesn't need to be that way. Banning ESG applications could pose a material risk and hurt financial performance for investors by limiting the information they can use to make their own choices. ESG data doesn't care about politics. ESG integration is an apolitical, agnostic approach to help clients achieve their desired financial outcomes.

Advisor-client conversations

Investors have competing priorities when deciding how to construct their investment portfolio. What are your goals? What level of returns do you need to get there? What level of risk are you willing to take to achieve these returns? What values do you want to pass down to the next generation?

Understanding the responsible investing terminology and the process of using ESG data can help clear confusion as it presents an opportunity to further nurture existing client-advisor relationships and create meaningful connections for the next generation.

If aligning values, or the use of ESG data, is of interest and importance to you, contact your advisor to learn about the resources available. If you're returns-focused and looking to minimize risks within your wealth plan, then the integration of ESG data may be worth considering.

Survey says ... terminology matters

At RBC WM-U.S., we conducted three annual client surveys to help us gain more insights into the understanding of clients' knowledge of and interest in responsible investing (RI) and the applications of ESG data.

At RBC, we use the umbrella term responsible investing to reflect the various approaches used to deliberately incorporate environmental, social and governance (ESG) data and considerations into an investment portfolio. The four applications of RI are: ESG integration, ESG screening and exclusion, thematic ESG investing and impact investing.

Here is what our RBC WM-U.S. clients had to say.

2023 summary

1. Male and female clients equally agree achieving financial goals is, by far, the most important factor when choosing investments, even more important than professional recommendation of the investment, fees, risk profile and past performance combined.
2. The term responsible investing has a much more favorable impression among RBC WM-U.S. clients compared to other terms. It was four times more favorable than the term ESG investing.
3. Female clients are significantly more likely to have a discussion with their RBC financial advisor about responsible investing within the next year compared to male clients.
4. RBC WM-U.S. clients are most interested in ESG integration, compared to ESG screening and exclusion, impact investing, with thematic ESG investing being the least popular.
5. Global warming/climate change and reducing greenhouse gasses/CO2 were cited most frequently as important for climate action.
6. For philanthropic giving, the majority of both male and female RBC WM-U.S. clients give out of desire to make an impact and out of a sense of duty or obligation. We found that most RBC WM-U.S. clients give directly through donations of money, personal property or clothing. More than half volunteer their time.

A few additional takeaways

Attitudes toward RI and ESG were largely similar year-over-year. However, our 2023 survey found that significantly fewer clients feel companies provide misleading information about RI initiatives compared to 2022 ESG initiatives. In our opinion, this is encouraging to see clients feel companies are providing more transparent information about RI initiatives as the space continues to mature.

One-third of clients are not interested in screening sectors based on their personal values, driven largely by male clients. This relates to the application of ESG screening and exclusion. In our experience, clients may assume the definition of responsible investing or ESG means to screen or remove something from a portfolio; however, that fits the application ESG screening and exclusion, not the definition of responsible investing itself. At RBC Wealth Management, we use the umbrella term responsible investing to describe the various applications that use ESG data.

Good health and well-being are the most important factors for both male and female RBC WM-U.S. clients. Additionally, we found quality education and "climate action" are more important to female clients, while "decent work and economic growth", along with "industry, innovation and infrastructure" are more important to male clients.

The overall theme ... terminology matters

Understanding the terminology and various applications of responsible investing are very important in client-advisor conversations in order to meet your unique, personal financial goals. Reach out to your advisor f you are interested in learning more.

An online survey was sent to 22,000 RBC WM-U.S. clients in April 2023. The sample was balanced based on geographic division, gender and client assets. These results are based on 864 responses reflecting a 3.9% response rate. 49% of RBC WM-U.S. clients who responded are HNW. Where applicable, the results from the 2022 ESG Client Survey are included for year-over-year comparisons. The 2022 ESG Client Survey had 976 responses for a 4.9% response rate.

Source: RBC WM-U.S. RI-ESG Client Survey, April 2023.

Wealth Management

U.S. Investment and insurance products offered through RBC Wealth Management are not insured by the FDIC or any other federal government agency, are not deposits or other obligations of, or guaranteed by, a bank or any bank affiliate, and are subject to investment risks, including possible loss of the principal amount invested.

In the U.S., RBC Wealth Management operates as a division of RBC Capital Markets, LLC. In Canada, RBC Wealth Management includes, without limitation, RBC Dominion Securities Inc. (RBC DS)*, which is a foreign affiliate of RBC Capital Markets, LLC. *Member – Canadian Investor Protection Fund. This document has been prepared by an employee of RBC Wealth Management in the U.S. for use by RBC Wealth Management in the U.S. and RBC DS in Canada. Each of the aforementioned corporate entities and the Royal Bank of Canada are separate corporate entities which are affiliated.

Like any type of investing, ESG and responsible investing involves risks, including possible loss of principal. Past performance is no guarantee of future results. This material has been prepared without regard to the individual financial circumstances and objectives of persons who receive it. All opinions and estimates constitute the author's judgment as of the date of this publication, are subject to change without notice and are provided in good faith but without legal responsibility. It is not possible to invest directly in an index. Nothing in this communication constitutes legal, accounting or tax advice or individually tailored investment advice. RBC Wealth Management does not provide tax or legal advice. All decisions regarding the tax or legal implications of your investments should be made in connection with your independent tax or legal advisor. The information contained herein has been derived from sources believed to be reliable, but no representation or warranty, express or implied, is made by RBC Wealth Management, its affiliates or any other person as to its accuracy, completeness or correctness.

©2023 RBC Wealth Management, a division of RBC Capital Markets, LLC, registered investment adviser and Member NYSE/FINRA/SIPC.
All rights reserved.

23-08-01667_00824 (07/23)