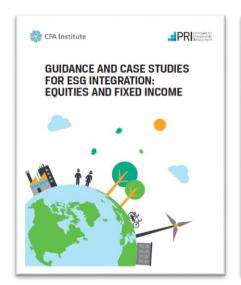
Global ESG Integration Study

CFA Institute and PRI

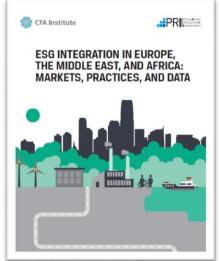
Switzerland

Overview

- In 2017, CFA Institute and Principles for Responsible Investment (PRI) set out to create a best-practice report and three regional reports to help investors understand how they can better integrate ESG factors into their equity, corporate bond, and sovereign debt portfolios
- The best-practice and Americas reports were released in September 2018. Two
 more reports covering EMEA and APAC will be released in early 2019







ESG Integration in
Asia Pacific
(APAC): Markets,
Practices, and
Data

Q2 2019



Methodology

- Surveying over 1,100 financial professionals, predominantly CFA members, around the world;
- Running 23 workshops in 17 major markets;
- Interviewing many practitioners and stakeholders;
- Publishing more than 30 case studies written by equity and fixed-income practitioners;
- Analyzing Bloomberg's ESG company disclosure scores; and
- Reviewing data from the PRI reporting framework, the largest global database of information on investors' ESG practices.

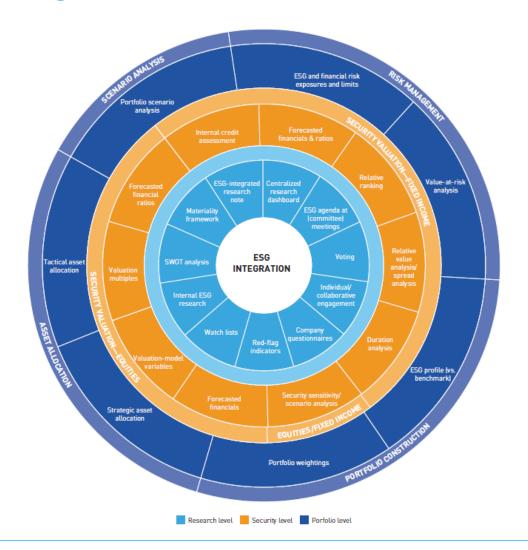
AMER	APAC	EMEA		
Brazil	Australia	France		
Canada	China	Germany		
United States	Hong Kong	Netherlands		
	India	Russia		
	Japan	South Africa		
	Singapore	Switzerland		
		United Arab Emirates		
		United Kingdom		

Abbreviations: AMER, Americas; APAC, Asia Pacific; EMEA, Europe, Middle East, and Africa.





The ESG integration framework





ESG Integration in the EMEA: Markets, Practices and Data

Overview of major findings







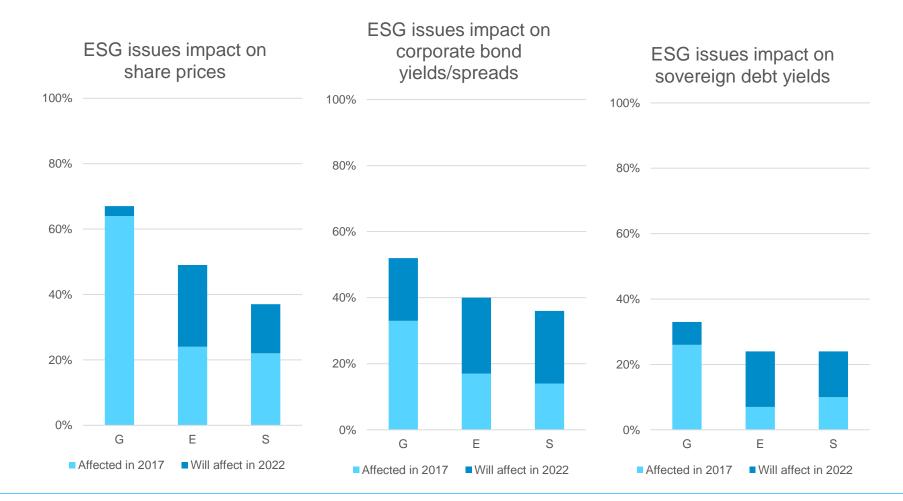
Regional findings: EMEA

- There is no "one best way" to do ESG integration and no "silver bullet" to ESG integration.
- Governance is the ESG factor most investors are integrating into their process.
- Environmental and social factors are gaining acceptance, but from a low base.
- ESG integration is farther along in the equity world than in fixed income.
- Portfolio managers and analysts are more frequently integrating ESG into the investment process, but rarely adjusting their models based on ESG data.
- The main drivers of ESG integration are risk management and client demand.
- The main barriers to ESG integration are a limited understanding of ESG issues and a lack of comparable ESG data.
- Investors acknowledge that ESG data has come a long way, but advances in quality and comparability of data still have a long way to go.
- It would be helpful for issuers and investors to agree upon a single ESG reporting standard that could streamline the data collection process and produce more quality data.
- Many workshop participants were concerned that ESG mutual funds and ETFs offered to investors may be driven by marketing decisions and may not be true ESG investment products.





The impact of ESG issues in 2017 and the expected impact in five years' time (2022)

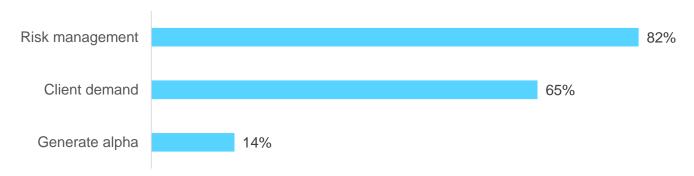




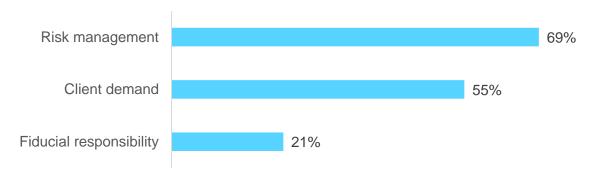


Drivers of ESG integration in Swiss capital markets

Main drivers to integrating ESG issues into investment analysis of equity investments



Main drivers to integrating ESG issues into investment analysis of fixed income investments



Note: Percentages represent those who thought each item was a main driver. Survey respondents could choose more than one answer.



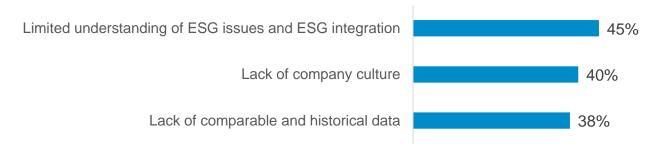


Barriers to ESG integration in Swiss capital markets

Main barriers to integrating ESG issues into investment analysis of equity investments



Main barriers to integrating ESG issues into investment analysis of fixed income investments

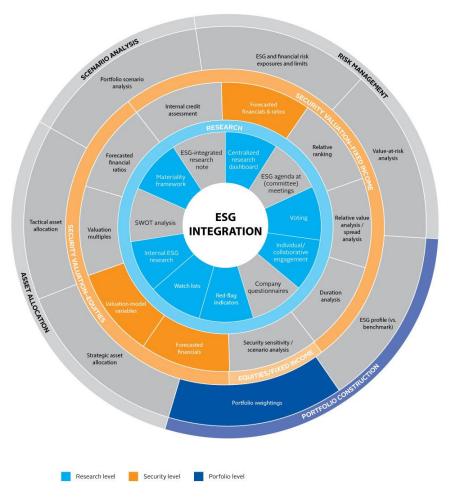


Note: Percentages represent those who thought each item was a main barrier. Survey respondents could choose more than one answer.





The ESG integration framework: application by Swiss-based investors

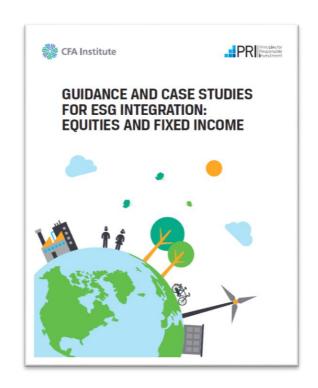






Guidance and Case Studies for ESG Integration: Equities and Fixed Income

Overview of major findings







Spotlight on equity: case study by RBC Global Asset Management

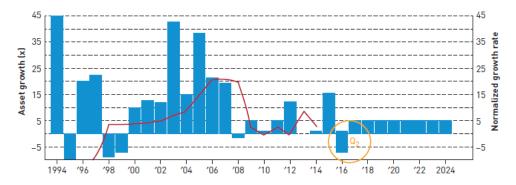
Fundamental Material ESG Scenario Analysis

DCF Scenario Analysis

Base-case DCF scenario (a cash flow return on investment framework)	44% target company share price upside		
ESG asset scenario (upside scenario): value generated from contingent assets through the use of big data analytics. Assumptions: Sales increased by 1–2% in years 5–10, but with similar EBIT margins and asset turns to the base case. Cost of capital remains the same.	+12 percentage point		

ESG liability scenario (downside scenario): assuming a data breach occurs that impacts the business (sales, margins, asset growth) for a year before recovery.

-17 percentage point





Spotlight on corporate bonds: case study by PIMCO

Integrating ESG in Corporate Credit Research

ESG heatmap for major banks by region

	US	Canada	UK	Europe (Core)	Australia	Japan	China	Legend:
15% Environmental								ESG Quality
Sustainable Lending Impact								Weaker
Environmental & Sustainability Plan								
Green Bond Issuance								
25% Social								Average
Systemic Importance / Regulatory Environment								
Integration of ESG in Underwriting / Product Safety								Stronger
Customer Privacy & Data Security								
60% Governance								
Culture / Business Conduct								
Risk Management / Risk Appetite								
Accounting Quality								
Board Quality								
Human Capital (training, expertise, incentives)								

Source: PIMCO analysis as of 30 June 2018. Major banks include global and domestically systemically important banks in each region. Percentages (15%, 25%, 60%) represent the relative weighting of each ESG pillar in the overall ESG score.



Spotlight on sovereign debt: case study by Colchester Global Investors

Integration of ESG factors into sovereign bonds: a case study of Russia

Colchester Global Investors ESG Integration Process.

Debt and External Sustainability Analysis:

- Macroeconomic Analysis: e.g., Real economy and composition
- Fiscal Position:

 e.g., Revenue/expenditure composition and elasticity
- Debt (gross and net):
 e.g., Incl. contingent liabilities, ownership and financing structure
- External Position:
 e.g., Balance of payments composition,
 external debt (public/private)

ESG Factors:

- Governance:

 e.g., Institutinal strength, business
 environment, control of corruption,
 government effectiveness
- Social:

 e.g., Human development, demographics,
 social and political stability
- Environmental:
 e.g., Disaster risk management, resource governance and sustainability

Financial Stability Score

Valuations Adjusted





Drivers of ESG integration in selected global capital markets

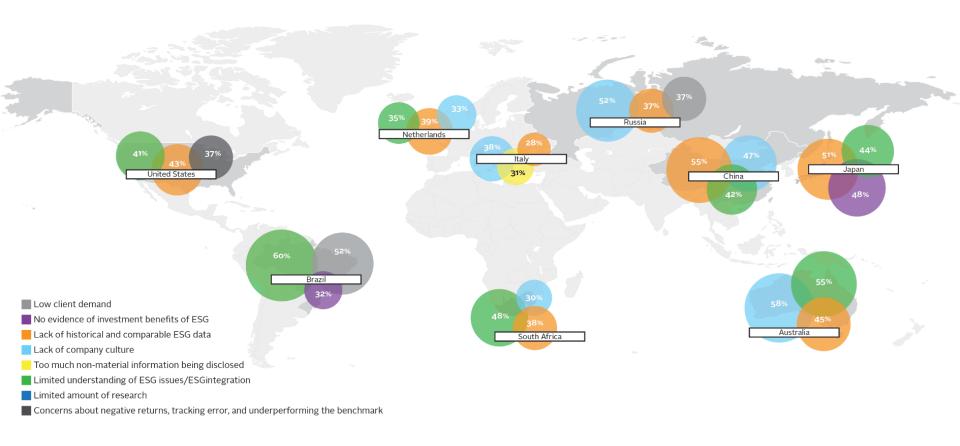
Equities





Barriers to ESG integration in selected global capital markets

Equities





Thank you

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