# Remarks to the SEC Investor Advisory Committee

Presented by Dr. Jean Rogers
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Good morning. I am Dr. Jean Rogers, Founder and CEO of the Sustainability Accounting Standards Board (SASB). I'd like to thank the SEC Investor Advisory Committee for the opportunity to speak today.

SASB is an independent 501(c)3 non-profit whose mission is to issue standards for disclosure of sustainability issues that help public corporations disclose material, decision-useful information to investors in their mandatory filings such as the Forms 10-K or 20-F. That mission is accomplished through a rigorous process that includes evidence-based research and broad, balanced stakeholder participation. More than 2,800 individuals—affiliated with companies with $11T market capital and investors representing $23.4T assets under management—participated in industry working groups to provide input on SASB's standards. SASB has issued standards for 79 industries that help companies to comply with Regulation S-K in a cost-effective manner.

A company using SASB standards has available to it a short list of sustainability standards, most with quantifiable metrics, that are reasonably likely to be material to companies in its industry. The company is responsible for evaluating whether those matters are material to that company. SASB uses the legal standard of materiality established under the US federal securities laws.

Today I will discuss the questions the SEC has posed in its Regulation S-K Concept Release. In this release, the SEC asks "which, if any, sustainability disclosures are important to an understanding of a registrant's business and financial condition and whether there are considerations that make these disclosures important to investment and voting decisions." Because the costs of compiling and disclosing information about sustainability related matters are borne by the registrant, and ultimately all of its shareholders, disclosures must be important to voting and investment decisions. For this reason, materiality, as viewed through the lens of the reasonable investor, is central to this discussion and to any actions the Commission may take regarding sustainability disclosures.

In discussing SASB's response to the release, I will cover four primary topics: 1) rising investor demand for sustainability information, 2) the current inadequacies of sustainability disclosure, 3) the need for a market standard for the disclosure of material sustainability information, and 4) SASB's qualifications to fill this need.

**First, I will discuss investor demand for sustainability information, which has increased dramatically in the past 40 years.**

There has been an enormous increase in investor interest in sustainability-related information since the SEC last considered the need for rulemaking in this area, in the 1970s. In a 2015 CFA Institute survey, 73 percent of institutional investors indicated that they take environmental, social and governance (ESG) issues into account in their investment analysis and decisions, to help manage investment risks.[1] The number of customers using ESG data on Bloomberg terminals has *quadrupled* from 2010 to 2015.[2] More than one out of every $6 under professional management in the United States is invested based on SRI strategies.[3] Writing recently to CEOs, the chairman and CEO of the world's largest investment management corporation, BlackRock's Laurence Fink, made clear to corporations that BlackRock recognizes the financial and operational impact of certain sustainability-related issues.

**Second, I will discuss the frustration with and burden of current sustainability disclosure practices from both investor and registrant perspectives.**

In spite of investor demand, disclosures made today are not adequate to support investment and voting decisions. While sustainability disclosure exists, both inside the mandatory filings as well as outside, it is largely not material (as defined under U.S. securities laws) or decision-useful. It is not comparable, complete, or reliable. Most importantly, it has a significant positive bias. A 2015 PwC study found that 82 percent of investors said they are dissatisfied with how risks and opportunities are quantified; 79 percent of the investors polled said they are dissatisfied with the comparability of sustainability reporting between companies in the same industry.[4]

The four principal means by which investors currently obtain this information—the Form 10-K, standalone sustainability reports, questionnaires, and shareholder resolutions—are fraught with problems. I will take each in turn.

*The problem with sustainability disclosure in the Form 10-K is that while such disclosure is already required by law, there's a proliferation of boilerplate information.*

As the Commission has noted,[5] certain sustainability information should be disclosed under existing SEC rules. In particular, Item 303 of Regulation S-K requires that companies describe known trends, events, and uncertainties that are reasonably likely to have material impacts on their financial condition or operating performance in the MD&A section of Form 10-K or 20-F. SEC guidance clarifies that a disclosure duty exists under Item 303 "where a trend, demand, commitment, event or uncertainty is both presently known to management and reasonably likely to have material effects on the registrant's financial condition or results of operation"[6]). Also, Item 503 requires disclosures of significant risk factors.

Because of these requirements, companies often address sustainability matters in SEC filings—in fact, SASB research shows that three-quarters of the disclosure topics in SASB standards are already addressed. Importantly, however, more than 40 percent of all 10-K disclosure on

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[1] CFA Institute, ENVIRONMENTAL, SOCIAL AND GOVERNANCE SURVEY, p. 5 (June 2015), https://www.cfainstitute.org/Survey/esg_survey_report.pdf . Survey studied 1,325 institutional investors. *Id*. at 3.
[2] Bloomberg, SUSTAINABLE BUSINESS AND FINANCE: CUSTOMERS USING ESG DATA (2015), http://www.bloomberg.com/bcause/customers-using-esg-data.
[3] US SIF, 2016 REPORT ON US SUSTAINABLE, RESPONSIBLE AND IMPACT INVESTING TRENDS, http://www.ussif.org/Files/Publications/USSIF_ImpactofSRI_FINAL.pdf.
[4] PwC, SUSTAINABILITY DISCLOSURES: IS YOUR COMPANY MEETING INVESTOR EXPECTATIONS, (July 2015), http://www.pwc.com/us/en/cfodirect/publications/in-the-loop/sustainability-disclosure-guidance-sasb.html.
[5] Securities and Exchange Commission, FR-82, COMMISSION GUIDANCE REGARDING DISCLOSURE RELATED TO CLIMATE CHANGE, p. 3 (Feb. 2, 2010), https://www.sec.gov/rules/interp/2010/33-9106.pdf.
[6] Management's Discussion and Analysis of Financial Condition and Results of Operations, Exchange Act Release No. 6835 (May 18, 1989).

sustainability topics consists of boilerplate language.[7] (For examples, please see Appendix D.) Current sustainability disclosures in SEC filings do not provide investors with comparable, industry-specific data with which to evaluate risk and compare performance.

*The problem with standalone sustainability reports is that information is largely immaterial, not comparable, and biased.*

While stand-alone sustainability reports are available to investors in the "total mix" of information, they are not designed for investors and do not provide decision-useful information. While these reports often describe matters as "material," the term is not consistent with the definition under the U.S. securities law.[8] A recent study by researchers at Harvard[9] found that approximately 80 percent of what companies disclose in their sustainability reports is not material to investors. How is an investor to know which 20 percent is material? In the context of investment decision-making, these reports can "bury the shareholders in an avalanche of trivial information," an outcome that the Supreme Court sought to avoid in establishing the materiality standard in the *TSC v. Northway* decision.[10] Because the leading framework that supports preparation of these standalone reports is designed for use by a range of stakeholders, it contains over 400 Key Performance Indicators for companies to select from, resulting in low comparability between peers in the same industry.

The most important problem with sustainability reports, from an investor perspective, is the positive bias. A 2013 study of highly rated (GRI A and A+)[11] sustainability reports revealed that *90 percent of known negative events were not reported* by the company.[12] These reports were found to "camouflage real sustainable-development problems, presenting an idealized version of company situations."[13] This phenomenon is sometimes referred to as "greenwashing."

In conclusion, stand-alone sustainability reports do not produce investor-grade information, and they do not present a true and fair representation of performance on *material* factors, which is what investors need in order to understand and price risk.[14]

*The problem with questionnaires is selective disclosure and corporate burden*.

Investor frustration with the availability and quality of sustainability disclosures in Commission filings or in stand-alone sustainability reports is evidenced by the extent to which investors seek ESG data directly from companies. In a 2014 PwC survey, 89 percent of institutional investors

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[7] See Appendix B for an overview of SASB research findings on the current state of sustainability disclosures in SEC filings. More detailed analysis has been published and is available in the form of SASB industry research briefs, available at http://www.sasb.org/approach/our-process/industry-briefs.

[8] This presents risks for issuers, since under Section 10(b) and Rule 10b-5 of the Securities Exchange Act they can be held liable for material false statements made outside the 10-K.

[9] Mozaffar Khan, George Serafeim and Aaron Yoon, *Corporate Sustainability: First Evidence on Materiality*, THE ACCOUNTING REVIEW (Harvard Business School, March 9, 2015), http://hbswk.hbs.edu/item/corporate-sustainability-first-evidence-on-materiality.

[10] 426 U.S. at 448-49 (1976).

[11] See discussion infra, p. 20.

[12] Olivier Boiral, *Sustainability Reports as Simulacra? A Counter-Account of A and A+ GRI Reports*, ACCOUNTING, AUDITING & ACCOUNTABILITY JOURNAL, Vol. 26, No. 7, p. 1036–71 (2013), http://www.emeraldinsight.com/doi/pdfplus/10.1108/AAAJ-04-2012-00998.

[13] *Id.*, at p. 1061.

[14] EY, TOMORROW'S INVESTMENT RULES 2.0: EMERGING RISK AND STRANDED ASSETS HAVE INVESTORS LOOKING FOR MORE FROM NONFINANCIAL REPORTING (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf.

indicated they are very likely to request ESG information directly from the company (e.g., via questionnaires).[15]

Companies are annually subject to ESG evaluations by 150 ratings systems on approximately 10,000 performance metrics, leading to "survey fatigue."[16] In addition to the cost burden, this practice of selective disclosure favors large investors who can conduct surveys and command responses. For any information that is material, it might also run afoul of the SEC's Regulation FD (Fair Disclosure).

*The last resort, shareholder resolutions, are costly and inefficient for both companies and investors.*

Further evidence of investor dissatisfaction with the poor quality and availability of decision-useful sustainability disclosures is seen with the rise of ESG related resolutions, which today account for 67 percent of all shareholder proposals.

These four various approaches to obtaining material sustainability information are costly for companies and their shareholders, and inefficient for investors.

**Third, I will explain why effective sustainability disclosure to investors requires a market standard.**

Sustainability issues often constitute the types of "risks," "trends," and "uncertainties" that issuers should address in their SEC filings. The absence of a market standard for disclosure of material ESG factors has made it difficult for issuers to comply with, and for the Commission to enforce, effective disclosure under Regulation S-K.[17] I will now discuss what type of market standard will yield effective sustainability disclosure.

*Because of the nature of sustainability issues, industry-specific standards are needed***.**

The market standard for sustainability disclosure must be industry-specific. Industries have distinct profiles with respect to value drivers, resource needs, operating contexts, regulatory environment, and customer expectations, all of which can potentially give risk to material information. For example, exposure to counterfeit drugs is likely to be material for pharmaceuticals companies (but not mining). Product safety is likely to be material for automobile companies (but not real estate). Water risk is likely to be material for beverage manufacturers and agriculture (but not banking). Carbon emissions are likely to be material for marine transportation (but not stock exchanges). An industry lens is essential to keep sustainability disclosures linked to business strategy, cost-effective for registrants, and decision-

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[15] PwC, SUSTAINABILITY GOES MAINSTREAM: INSIGHTS INTO INVESTOR VIEWS, p. 7 (May 2014), https://www.pwc.com/us/en/pwc-investor-resource-institute/publications/assets/pwc-sustainability-goes-mainstream-investor-views.pdf.

[16] Gregory Unruh, David Kiron, Nina Kruschwitz, Martin Reeves, Holger Rubel, and Alexander Meyer zum Felde, *Investing for a Sustainable Future*, MIT SLOAN MGMT. REV., p. 11 (May 2016), http://marketing.mitsmr.com/offers/SU2016/57480-MITSMR-BCG-Sustainability2016.pdf?utm_source=WhatCounts%2c+Publicaster+Edition&utm_medium=email&utm_campaign=surpt16&utm_content=Download+the+Report+(PDF)&cid=1.

[17] In a June 9, 2016 webinar on the Concept Release and sustainability hosted by Financial Executives International, with more than 300 attendees, 65.2% of participants indicated that disclosure reform needs to address the establishment of a standard for the disclosure of sustainability-related information (in order to reduce liability risks, eliminate cost burdens, and eliminate duplicative disclosure). Also, 71.8% of participants indicated that such a market standard would: streamline their responses to investor inquiries regarding sustainability information and reduce the costs thereof; improve understanding and management of sustainability issues, and level the playing field. The full webinar is available at http://event.on24.com/wcc/r/1188808/2E6E10B609363E6EC24E85D3DDA66C70.

useful for investors. SASB research confirms that the materiality of sustainability issues varies greatly from industry to industry (see Appendix B).

An industry-specific approach to sustainability disclosure is favored by investors. Financial analysts interpret the performance of companies and their securities through an industry lens. Nearly three-quarters of respondents to an EY investor survey considered industry-specific reporting criteria and key performance indicators (KPIs) to be very or somewhat beneficial to their investment decision making.[18] However, in the absence of industry-specific standards, investors lack complete, comparable data sets on sustainability performance. (For examples of the varying quality of sustainability disclosure, see Appendix D). Industry-by-industry standards will allow for peer-to-peer comparison and benchmarking. They will also make the information available to all investors, at the same time, avoiding selective disclosure of material information in uncontrolled environments.

*Line item requirements are not appropriate for sustainability issues.*

Line-item requirements are generally not appropriate for sustainability issues because sustainability issues are likely not material for all companies; when they are material, they manifest in unique ways and thus require industry-specific metrics. Requiring these line items to be disclosed would result in a corporate disclosure burden and a large volume of information that is immaterial to investors.

Securities law already provides us with the answer: if an issue is likely to materially affect the financial condition or operating performance of a company, then disclosure to investors is compelled. The patterns of materiality for sustainability topics are industry-specific. Therefore, a market standard for effective sustainability disclosure must take an industry approach.

**Last, I will discuss how SASB standards enable effective sustainability disclosure.**

SASB was founded in 2011 as an independent 501 (c)(3) standards-setting organization in order to advance research initially conducted at the Initiative for Responsible Investment (IRI) in the Kennedy School of Government at Harvard University. The SASB board of directors, currently chaired by former New York City Mayor Michael Bloomberg, is distinguished by the level of regulatory and securities law expertise of its members. Former SEC Chair Mary Schapiro is vice chair of SASB's board. Former SEC Chair Elisse Walter, former SEC Commissioner Aulana Peters, and former FASB Chair Robert Herz have served on SASB's board for several years. Alan Beller, former Director of the SEC's Division of Corporation Finance and Senior Counselor to the SEC, joined SASB's board in June 2016. SASB's staff, which now numbers 30, is made up of professionals with backgrounds in finance, accounting, economics, sustainability, and law. The standards setting function is organized by sector and staffed by analysts with sector experience and quantitative analysis skills.

SASB standards are designed to help registrants effectively disclose material sustainability-related information and comply with existing regulatory obligations, working within the framework of existing U.S. securities laws. SASB has identified disclosure topics that meet the materiality test set forth by the Supreme Court and used by the SEC in setting its standards –

[18] EY, TOMORROW'S INVESTMENT RULES 2.0: EMERGING RISK AND STRANDED ASSETS HAVE INVESTORS LOOKING FOR MORE FROM NONFINANCIAL REPORTING, p. 24 (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf.

that is, information that would alter the "total mix" of information available to the reasonable investor, and, consistent with the two-part test[19] that companies use to determine their disclosure obligations, would affect the financial condition or operating performance of a company. The standards are cost-effective, identifying the minimum set of disclosure topics likely to constitute material information for companies in an industry. On average, each SASB standard includes just five topics and 13 metrics per industry. In order to keep SASB standards cost-effective for registrants, SASB relies on metrics already in use by industry, from roughly 200 entities, such as CDP, EPA, OSHA, GRI, and industry organizations such as IPIECA, EPRI and GRESB (see Appendix C).

SASB's provisional standards are the result of intensive research and dialogue, in what has been the most comprehensive analysis of the relationship between sustainability information and the disclosure requirements of federal securities laws ever performed. SASB has used an inclusive and transparent standards-development process.[20] More than 2,800 individuals—affiliated with companies with $11T market capital and investors representing $23.4T assets under management—participated in industry working groups. In these working groups, 82 percent of issuers and investors agreed that the proposed disclosure topics in SASB standards would likely constitute financially material information.

Importantly, SASB standards are the only sustainability standards available for all industries of the economy. SASB develops standards for 79 industries, because each industry has a unique profile with respect to environmental, social, or governance factors that are reasonably likely to be material to an investor. (For an overview of SASB disclosure topics by industry, please see Appendix A.) SASB standards enable companies to provide quantitative performance data, along with management's narrative, on sustainability-related risks in an industry context. This enables investors to discern risk profiles, evaluate corporate performance in the context of industry performance, and adjust investment decisions accordingly.

Sustainability disclosures have not kept pace with investor needs. The SEC's rules governing MD&A and risk factors would seem to require much sustainability disclosure; what has been missing is a comprehensive, industry-specific, and materiality-based set of standards and metrics that would facilitate such disclosure. SASB's framework is the only sustainability reporting solution specifically designed to meet the needs of the U.S. capital markets. SASB provides the tools for companies to make better disclosures consistent with SEC requirements.

Because of SASB's approach, with its emphasis on due process, use of the U.S. securities laws as its framework, and industry-specificity, we believe it would be appropriate for the SEC to acknowledge the SASB framework as a credible set of standards and metrics that can be used by companies to fulfill their regulatory reporting requirements.

By addressing sustainability disclosure via the disclosure effectiveness initiative, the SEC has an opportunity to reduce boilerplate information, eliminate selective disclosure, alleviate corporate disclosure fatigue, and improve investor decision-making. SASB is grateful for the Commission's work to help disclosure evolve to meet the challenges and opportunities

[19] Management's Discussion and Analysis of Financial Condition and Results of Operations, Exchange Act Release No. 6835 (May 18, 1989).

[20] Provisional SASB standards were set in accordance with the best practices of the American National Standards Institute (ANSI). SASB is an ANSI-accredited standards-setting organization.

companies and their investors face in the 21st century. We fully support your efforts to modernize disclosure while protecting investors and facilitating efficient functioning of the markets and formation of capital.

Thank you for your time today.

# Appendix A: Disclosure Tables

## Disclosure Topics

### Health Care

| | Biotechnology | Pharmaceuticals | Medical Equipment and Supplies | Health Care Delivery | Health Care Distributors | Managed Care |
|---|---|---|---|---|---|---|
| Environment | ▪ Energy, water and waste efficiency | ▪ Energy, water and waste efficiency | ▪ Energy, water and waste efficiency | ▪ Energy and waste efficiency<br>▪ Climate change impacts on human health and infrastructure | ▪ Fuel efficiency | ▪ Climate change impacts on human health |
| Social Capital | ▪ Safety of clinical trial participants<br>▪ Access to Medicines<br>▪ Counterfeit drugs<br>▪ Ethical marketing<br>▪ Affordability and fair pricing<br>▪ Drug safety and side-effects | ▪ Safety of clinical trial participants<br>▪ Access to Medicines<br>▪ Counterfeit drugs<br>▪ Ethical marketing<br>▪ Affordability and fair pricing<br>▪ Drug safety and side-effects | ▪ Product safety<br>▪ Affordability and fair pricing<br>▪ Ethical marketing | ▪ Quality of care and patient satisfaction<br>▪ Access for low-income patients<br>▪ Patient privacy and electronic health records | ▪ Product safety<br>▪ Counterfeit drugs | ▪ Access to coverage<br>▪ Customer privacy and technology standards |
| Human Capital | ▪ Employee recruitment, development and retention<br>▪ Employee health and safety | ▪ Employee recruitment, development and retention<br>▪ Employee health and safety | | ▪ Employee recruitment, development and retention | | |
| Innovation | | | ▪ Product design and lifecycle management | | ▪ Product lifecycle management | ▪ Improved outcomes |
| Governance | ▪ Corruption and bribery<br>▪ Manufacturing and supply chain quality management | ▪ Corruption and bribery<br>▪ Manufacturing and supply chain quality management | ▪ Corruption and bribery<br>▪ Manufacturing and supply chain quality management | ▪ Fraud and unnecessary procedures<br>▪ Pricing and billing transparency | ▪ Corruption and bribery | ▪ Plan performance<br>▪ Pricing and billing transparency |

## Disclosure Topics

### Financials

| | Commercial Banks | Investment Banking & Brokerage | Asset Management & Custody Activities | Consumer Finance | Mortgage Finance | Exchanges | Insurance |
|---|---|---|---|---|---|---|---|
| Environment | | | | | ▪ Environmental risk to mortgaged properties | | ▪ Environmental risk exposure |
| Social Capital | ▪ Financial inclusion and capacity building<br>▪ Customer privacy and data security | | ▪ Transparent information and fair advice for customers | ▪ Financial inclusion<br>▪ Customer privacy and data security<br>▪ Transparent information and fair advice for customers<br>▪ Responsible lending and debt prevention | ▪ Transparent information and fair advice for customers<br>▪ Responsible lending and debt prevention | ▪ Promoting transparent and efficient capital markets | ▪ Plan performance |
| Human Capital | | ▪ Employee incentives and risk-taking<br>▪ Employee inclusion | ▪ Employee incentives and risk-taking<br>▪ Employee inclusion | | | | |
| Business Model & Innovation | ▪ Integration of environmental, social and governance risk factors in credit risk analysis | ▪ Integration of environmental, social and governance risk factors in advisory, underwriting, and brokerage activities | ▪ Integration of environmental, social and governance risk factors in investment management and advisory | | | | ▪ Integration of environmental, social and governance risk factors in investment management<br>▪ Policies designed to incentivize responsible behavior |
| Leadership & Governance | ▪ Management of the legal and regulatory environment<br>▪ Systemic risk management | ▪ Management of the legal and regulatory environment<br>▪ Systemic risk management | ▪ Management of the legal and regulatory environment<br>▪ Systemic risk management | | ▪ Management of the legal and regulatory environment | ▪ Managing conflicts of interest<br>▪ Managing business continuity and technology risks | ▪ Systemic risk management |

# Disclosure Topics

## Technology & Communications

| | Hardware | EMS & ODM | Semiconductors | Software & IT Services | Internet Media & Services | Telecom |
|---|---|---|---|---|---|---|
| Environment | | • Water & waste management in manufacturing | • GHG emissions<br>• Energy management in manufacturing<br>• Water & waste management in manufacturing | • Environmental footprint of hardware infrastructure | • Environmental footprint of hardware infrastructure | • Environmental footprint of operations |
| Social Capital | • Product security | | | • Data privacy & freedom of expression<br>• Data security | • Data privacy, advertising standards, and freedom of expression<br>• Data security | • Data privacy<br>• Data security |
| Human Capital | • Employee inclusion | • Fair labor practices | • Recruiting & managing a global, skilled workforce<br>• Employee health & safety | • Recruiting & managing a global, diverse skilled workforce | • Employee recruitment, inclusion, and performance | |
| Innovatio n | • Product lifecycle management | • Product lifecycle management | • Product lifecycle management | | | • Product end-of-life management |
| Leadership & Governance | • Supply chain management & materials sourcing | • Supply chain management & materials sourcing | • Supply chain management & materials sourcing<br>• Intellectual property protection & competitive behavior | • Managing systemic risks from technology disruptions<br>• Intellectual property protection & competitive behavior | • Intellectual property protection & competitive behavior | • Managing systemic risks from technology disruptions<br>• Competitive behavior |

# Disclosure Topics

## Non-Renewable Resources

| | Oil & Gas – Exploration & Production | Oil & Gas – Midstream | Oil & Gas – Refining & Marketing | Oil & Gas – Services | Coal Operations | Iron & Steel Producers | Metals & Mining | Construction Materials |
|---|---|---|---|---|---|---|---|---|
| Environment | • GHG emissions<br>• Air quality<br>• Water management<br>• Biodiversity impacts | • GHG & other air emissions<br>• Ecological impacts | • GHG emissions<br>• Air quality<br>• Water management<br>• Hazardous materials management | • Emissions reduction services & fuels management<br>• Water management services<br>• Chemicals management<br>• Ecological impact management | • GHG emissions<br>• Water management<br>• Waste management<br>• Biodiversity impacts | • GHG emissions<br>• Air quality<br>• Energy management<br>• Water management<br>• Waste management | • GHG emissions<br>• Air quality<br>• Energy management<br>• Water management<br>• Waste & hazardous materials management<br>• Biodiversity impacts | • GHG emissions<br>• Air quality<br>• Energy management<br>• Water management<br>• Waste management<br>• Biodiversity impacts |
| Social Capital | • Community relations<br>• Security, Human Rights & Rights of Indigenous Peoples | | | | • Community relations & rights of Indigenous Peoples | | • Community relations<br>• Security, Human Rights & Rights of Indigenous Peoples | |
| Human Capital | | | | | • Workforce health, safety & well-being<br>• Labor relations | • Workforce health, safety & well-being | • Workforce health, safety & well-being<br>• Labor relations | • Workforce health, safety & well-being |
| Business Model & Innovation | | | • Product specifications & clean fuel blends | | | | | • Product innovation |
| Leadership & Governance | • Business ethics & payments transparency<br>• Health, safety& emergency management<br>• Reserves valuation & capital expenditures<br>• Management of the legal & regulatory environment<br>• Contractor & supply chain management | • Competitive behavior<br>• Operational safety, emergency preparedness & response | • Pricing integrity & transparency<br>• Health, safety & emergency management<br>• Management of the legal & regulatory environment | • Business ethics & payments transparency<br>• Health, safety & emergency management<br>• Management of the legal & regulatory environment | • Reserves valuation & capital expenditures | • Supply chain management | • Business ethics & payments transparency | • Pricing integrity & transparency |

# Disclosure Topics

## Transportation

| | Automobiles | Auto Parts | Car Rental & Leasing | Airlines | Air Freight & Logistics | Marine Transportation | Rail Transportation | Road Transportation |
|---|---|---|---|---|---|---|---|---|
| Environment | • Materials Efficiency & Recycling | • Energy Management<br>• Materials Efficiency & Waste Management | | • Environmental Footprint of Fuel Use | • Environmental Footprint of Fuel Use | • Environmental Footprint of Fuel Use<br>• Ecological Impacts | • Environmental Footprint of Fuel Use | • Environmental Footprint of Fuel Use |
| Social Capital | • Product Safety | • Product Safety | • Customer safety | | | | | |
| Human Capital | • Labor Relations | | | • Labor Relations | • Fair Labor Practices | | | • Driver Working Conditions |
| Business Model & Innovation | • Fuel Economy & Use-phase Emissions | • Product Lifecycle Management | • Fleet Fuel Economy & Utilization | | | | | |
| Leadership & Governance | • Materials Sourcing | • Competitive Behavior<br>• Materials Sourcing | | • Competitive behavior<br>• Accidents & Safety Management | • Accidents & Safety Management<br>• Supply Chain Management | • Business Ethics<br>• Accidents & Safety Management | • Competitive behavior<br>• Accidents & Safety Management | • Accidents & Safety Management |

# Disclosure Topics

## Services

| | Education | Professional Services | Hotels & Lodging | Casinos & Gaming | Restaurants | Leisure Facilities | Cruise Lines | Advertising & Marketing | Media Production & Distribution | Cable & Satellite |
|---|---|---|---|---|---|---|---|---|---|---|
| Environment | | | • Energy & Water Management<br>• Ecosystem Protection & Climate Adaptation | • Energy Management | • Energy & Water Management<br>• Food & Packaging Waste Management | • Energy Management | • Fuel Use & Air Emissions<br>• Discharge Management & Ecological Impacts | | | • Infrastructure Energy Use & Fleet Fuel Consumption |
| Social Capital | • Quality of Education & Gainful Employment<br>• Marketing & Recruiting Practices | • Professional Integrity<br>• Data Security | | • Responsible Gaming | • Food Safety<br>• Nutritional Content | • Customer & Worker Safety | • Shipboard Health & Safety Management | • Advertising Integrity<br>• Data Privacy | • Journalistic Integrity & Sponsorship Identification<br>• Media Pluralism | • Data Privacy<br>• Data Security |
| Human Capital | | • Workforce Diversity & Engagement | • Fair Labor Practices | • Smoke-free Casinos | • Fair Labor Practices | | • Fair Labor Practices | • Workforce Diversity & Inclusion | | |
| B. Model & Innovation | | | | | | | | | | |
| Leadership & Governance | | | | • Internal Controls on Money Laundering<br>• Political Spending | • Supply Chain Management & Food Sourcing | | • Accident Management | | • Intellectual Property Protection & Media Piracy | • Managing Systemic Risks from Technology Disruptions<br>• Competitive Behavior & Open Internet |

# Disclosure Topics

## Resource Transformation

| | Chemicals | Aerospace & Defense | Electrical & Electronic Equipment | Industrial Machinery & Goods | Containers & Packaging |
|---|---|---|---|---|---|
| Environment | ▪ Greenhouse Gas Emissions<br>▪ Air Quality<br>▪ Energy & Feedstock Management<br>▪ Water Management<br>▪ Hazardous Waste Management | ▪ Energy Management<br>▪ Hazardous Waste Management | ▪ Energy Management<br>▪ Hazardous Waste Management | ▪ Energy Management | ▪ Greenhouse Gas Emissions<br>▪ Air Quality<br>▪ Energy Management<br>▪ Water Management<br>▪ Waste Management |
| Social Capital | | ▪ Data Security<br>▪ Product Safety | ▪ Product Safety | | ▪ Product Safety |
| Human Capital | | | | ▪ Employee Health & Safety | |
| B. Model & Innovation | ▪ Safety & Environmental Stewardship of Chemicals & Genetically Modified Organisms<br>▪ Product Design for Use-phase Efficiency | ▪ Fuel Economy & Emissions in Use-phase | ▪ Product Lifecycle Management & Innovation for Environmental Efficiency | ▪ Fuel Economy & Emissions in Use-phase<br>▪ Remanufacturing Design & Services | ▪ Product Lifecycle Management |
| Leadership & Governance | ▪ Political Spending<br>▪ Health, Safety, and Emergency Management | ▪ Business Ethics<br>▪ Supply Chain Management & Materials Sourcing | ▪ Business Ethics & Competitive Behavior<br>▪ Materials Sourcing | ▪ Materials Sourcing | ▪ Materials Sourcing |

# Disclosure Topics

## Consumption I

| | Agricultural Products | Meat, Poultry, and Dairy | Processed Foods | Non-Alcoholic Beverages | Alcoholic Beverages | Tobacco | Household & Personal Products |
|---|---|---|---|---|---|---|---|
| Environment | ▪ Greenhouse Gas Emissions<br>▪ Energy & Fleet Fuel Management<br>▪ Water Withdrawal<br>▪ Land Use & Ecological Impacts | ▪ Greenhouse Gas Emissions<br>▪ Energy Management<br>▪ Water Withdrawal<br>▪ Land Use & Ecological Impacts | ▪ Energy & Fleet Fuel Management<br>▪ Water Management | ▪ Energy & Fleet Fuel Management<br>▪ Water Management | ▪ Energy Management<br>▪ Water Management | | ▪ Water Management |
| Social Capital | ▪ Food Safety & Health Concerns | ▪ Food Safety | ▪ Food Safety<br>▪ Health & Nutrition<br>▪ Product Labeling & Marketing | ▪ Health & Nutrition<br>▪ Product Labeling & Marketing | ▪ Responsible Drinking & Marketing | ▪ Public Health<br>▪ Marketing Practices | |
| Human Capital | ▪ Fair Labor Practices & Workforce Health & Safety | ▪ Workforce Health & Safety | | | | | |
| B. Model & Innovation | ▪ Climate Change Impacts on Crop Yields | ▪ Antibiotic Use In Animal Production<br>▪ Animal Care & Welfare | ▪ Packaging Lifecycle Management | ▪ Packaging Lifecycle Management | ▪ Packaging Lifecycle Management | | ▪ Packaging Lifecycle Management<br>▪ Product Environmental, Health, and Safety Performance |
| Leadership & Governance | ▪ Environmental & Social Impacts of Ingredient Supply Chains<br>▪ Management of the Legal & Regulatory Environment | ▪ Environmental & Social Impacts of Animal Supply Chains<br>▪ Environmental Risks in Animal Feed Supply Chains | ▪ Environmental & Social Impacts of Ingredient Supply Chains | ▪ Environmental & Social Impacts of Ingredient Supply Chains | ▪ Environmental & Social Impacts of Ingredient Supply Chains | | ▪ Environmental & Social Impacts of Palm Oil Supply Chain |

# Disclosure Topics

## Consumption II

| | Food Retailers & Distributors | Drug Retailers & Conv. Stores | Multiline & Specialty Retailers & Dist. | E-Commerce | Apparel, Accessories & Footwear | Building Products & Furnishings | Appliance Manufacturing | Toys & Sporting Goods |
|---|---|---|---|---|---|---|---|---|
| Environment | ▪ Air Emissions from Refrigeration<br>▪ Energy & Fleet Fuel Management<br>▪ Food Waste Management | ▪ Energy Management in Retail | ▪ Energy Management in Retail & Distribution | ▪ Energy & Water Footprint of Hardware Infrastructure<br>▪ Logistics & Packaging Efficiency | | ▪ Energy Management in Manufacturing | | |
| Social Capital | ▪ Data Security<br>▪ Food Safety<br>▪ Product Health & Nutrition<br>▪ Product Labeling & Marketing | ▪ Data Security & Privacy<br>▪ Management of Controlled Substances<br>▪ Patient Health Outcomes | ▪ Data Security | ▪ Data Security & Fraud Protection<br>▪ Data Privacy | ▪ Management of Chemicals in Products | ▪ Management of Chemicals in Products | ▪ Product Safety | ▪ Chemical & Safety Hazards of Products |
| Human Capital | ▪ Fair Labor Practices | | ▪ Workforce Diversity & Inclusion<br>▪ Fair Labor Practices | ▪ Employee Recruitment, Inclusion, and Performance | | | | |
| B. Model & Innovation | | | | | | ▪ Product Lifecycle Environmental Impacts | ▪ Product Lifecycle Environmental Impacts | |
| Leadership & Governance | ▪ Management of Environmental & Social Impacts in the Supply Chain | ▪ Drug Supply Chain Integrity | ▪ Product Sourcing, Packaging, and Marketing | | ▪ Raw Materials Sourcing & Innovation<br>▪ Labor Conditions in the Supply Chain<br>▪ Environmental Impacts in the Supply Chain | ▪ Wood Sourcing | | ▪ Labor Conditions in the Supply Chain |

# Disclosure Topics

## Renewable Resources & Alternative Energy

| | Biofuels | Solar Energy | Wind Energy | Fuel Cells & Industrial Batteries | Pulp & Paper Products | Forestry & Logging |
|---|---|---|---|---|---|---|
| Environment | ▪ Air Quality<br>▪ Water Management in Manufacturing | ▪ Energy Management in Manufacturing<br>▪ Water Management in Manufacturing<br>▪ Hazardous Materials Management<br>▪ Community & Ecological Impacts of Project Development | | ▪ Energy Management | ▪ Greenhouse Gas Emissions<br>▪ Air Quality<br>▪ Energy Management<br>▪ Water Management | ▪ Ecosystem Services & Impacts |
| Social Capital | | | | | | ▪ Rights of Indigenous Peoples |
| Human Capital | | | ▪ Workforce Health & Safety | ▪ Workforce Health & Safety | | ▪ Workforce Health & Safety |
| Business Model & Innovation | ▪ Product Formulation & Impacts on Food Markets<br>▪ Lifecycle Emissions Balance | ▪ Management of Energy Infrastructure Integration & Related Regulations<br>▪ Product Lifecycle Environmental Impacts | ▪ Design to Mitigate Community & Ecological Impacts<br>▪ Materials Efficiency | ▪ Product Efficiency<br>▪ Product End-of-Life Management | | ▪ Climate Change Adaptation |
| Leadership & Governance | ▪ Management of the Legal & Regulatory Environment<br>▪ Operational Safety, Emergency Preparedness, and Response<br>▪ Sourcing & Environmental Impacts of Feedstock Production | ▪ Materials Sourcing | ▪ Materials Sourcing | ▪ Materials Sourcing | ▪ Fiber Sourcing & Recovery | |

# Appendix B: Examples of Industry Specific Issues

| Industry | Disclosure Topic | Value Driver Impacted | Selected Metrics |
|---|---|---|---|
| Automobiles | Fuel Economy & Use-phase Emissions | - Revenue | • Sales-weighted average passenger fleet fuel economy, consumption, or emissions, by region |
| Auto Parts | Product Safety | - Reputation<br>- Liabilities | • Number of recalls and total units recalled |
| Oil & Gas – Exploration & Production | Reserves Valuation & Capital Expenditures | - Assets<br>- CAPEX<br>- Cost of Capital | • Sensitivity of hydrocarbon reserve levels to future price projection scenarios that account for a price on carbon emissions.<br>• Estimated carbon dioxide emissions embedded in proved hydrocarbon reserves |
| Restaurants | Food Safety | - Revenue<br>- Reputation | • Number of recalls, total amount of food product recalls<br>• Number of confirmed foodborne illness outbreaks, percentage resulting in CDC investigation. |
| Agricultural Products | Climate Change Impacts on Crop Yields | - Revenue<br>- Cost of Capital | • Average crop yield and five-year standard deviation per major crop type by major operating region<br>• Identification of principal crops and discussion of risks and opportunities presented by climate change |
| Pharmaceuticals | Counterfeit Drugs | - Revenue<br>- OPEX<br>- Reputation | • Description of methods and technologies used to maintain traceability of products throughout the supply chain and prevent counterfeiting.<br>• Description of process for alerting end customers and business partners of potential or known risks associated with counterfeit products. |
| Biotechnology | Affordability & Fair Pricing | - Revenue<br>- Reputation | • Ratio of weighted average rate of net price increases (for all products) to the annual increase in the U.S. Consumer Price Index. |
| Real Estate | Energy Management | - OPEX<br>- Assets | • Like-for-like change in energy consumption of portfolio area with data coverage, by property subsector.<br>• Percentage of eligible portfolio that (1) has obtained an energy rating and (2) is certified to ENERGY STAR®, by property subsector. |

*Please refer to the interactive online version of the SASB Materiality Map™ for a comparison of likely material sustainability issues across different industries and sectors.* [*www.sasb.org/materiality/sasb-materiality-map/.*](http://www.sasb.org/materiality/sasb-materiality-map/)

# Appendix C: Sample of Industry Metrics Referenced in SASB Standards

## Health Care

- WHO Prequalification of Medicines Programme (PQP)
- FDA FAERS and MedWatch
- FDA Clinical Investigator Inspections
- Rx-360 International Pharmaceutical Supply Chain Consortium
- Centers for Medicare & Medicaid Services requirements
- Provisions of the Patient Protection and Affordable Care Act (PPACA)
- Hospital Values Based Purchasing Performance score
- HIPAA and HITECH

## Financials

- FINRA
- Basel III
- Federal Financial Institutions Examination Council's (FFIEC
- Equator Principles (EP III)
- Dodd-Frank Act Stress Test (DFAST)
- COSO ERM Framework
- Dodd-Frank Wall Street Reform and Consumer Protection Act
- FEMA special flood hazard areas

## Technology & Communication

- EICC Validated Audit Process
- EPEAT® • Basel Action Network's e-Steward® standard
- U.S. EPA's Responsible Recycling Practices (R2) standard
- (SEC) CF Disclosure Guidance: Topic No. 2, Cybersecurity
- International Electrotechnical Commission - IEC 62474
- ENERGY STAR®
- Digital Advertising Alliance (DAA) Self-Regulatory Program
- Children's Online Privacy Protection Act (COPPA)
- Directive 2002/58/EC (ePrivacy Directive)
- National Institute of Standards andTechnology (NIST)

## Non-Renewable Resources

- Transparency International's Corruption Perception Index
- IFC Performance Standards on Environmental and Social Sustainability
- IPIECA Oil and Gas Industry Guidance on Voluntary Sustainability Reporting
- Renewable Volume Obligation (RVO)
- International Union for Conservation of Nature (IUCN) Protected Areas
- Pipeline and Hazardous Materials Safety Administration (PHMSA)
- ANSI/API Recommended Practice 754 – Process Safety Performance Indicators for the Refining and Petrochemical Industries
- Mine Safety and Health Administration (MSHA)

## Transportation

- New Car Assessment Program
- EU End of Life of Vehicle Directive
- NHTSA
- Corporate Average Fuel Economy
- AIAG
- Federal Aviation Administration (FAA)
- International Civil Aviation Organization (ICAO)
- Federal Motor Carrier Safety Administration (FMCSA) - Behavior Analysis and Safety Improvement Categories (BASICs)
- International Maritime Organization (IMO) metrics and conventions
- International Convention for the Prevention of Pollution from Ships (MARPOL)
- Federal Rail Administration (FRA) Recommended Violation Defects

## Services

- Student Right-to-Know-Act
- Gainful Employment Rule
- National Council on Problem Gambling's Internet Responsible Gambling Standards
- CDC Foodborne illness standards
- USDA Dietary Guidelines for Americans
- Advertising Self-Regulatory Council

## Consumption

- Marine Stewardship Council
- Roundtable for Responsible Soy
- Roundtable for Sustainable Palm Oil
- Rainforest Alliance
- Sustainable Agriculture Initiative
- World Health Organization (WHO) Acute Toxicity Hazard Categories
- Global Food Safety Initiative (GFSI)
- Natural Resources Conservation Service (NRCS) Comprehensive Nutrient Management Plan (CNMP)
- Food Safety and Inspection Service (FSIS) of the U.S. Department of Agriculture (USDA)
- USDA Smart Snacks in School criteria
- Children's Food and Beverage Initiative (CFBAI) Uniform Nutrition Criteria
- FDA's Recalls, Market Withdrawals, & Safety Alerts
- USDA's Current Recalls and Alerts
- Children's Food and Beverage Initiative (CFBAI) Uniform Nutrition Criteria
- Sustainable Apparel Coalition Higg Index
- ICTI CARE Process (ICP)
- California DTSC Candidate Chemicals List
- U.S. Green Building Council's (USGBC) LEED
- ISO 14040 and ISO14044
- ENERGY STAR®
- WaterSense
- ANSI/BIFMA e3 level®: Business Furniture

## Resource Transformation

- REACH substances of very high concern (SVHC)
- American Chemistry Council's Responsible Care Management System
- World Health Organization (WHO) Acute Toxicity Hazard Categories
- Center for Chemical Process Safety's "Process Safety Leading and Lagging Metrics
- U.S. Consumer Product Safety Commission
- Airworthiness Directives - FAA, ESSA
- OECD Anti-corruption guidelines
- EPEAT®
- Basel Action Network's e-Steward® standard
- U.S. EPA's Responsible Recycling Practices (R2) standard
- (SEC) CF Disclosure Guidance: Topic No. 2, Cybersecurity
- International Electrotechnical Commission - IEC 62474
- ENERGY STAR®
- Heavy Duty (HD) National Program
- Forest Stewardship Council
- Sustainable Forest Initiative
- Programme for the Endorsement of Forest Certification
- American Tree Farm System

## Renewable Resources & Alternative Energy

- Renewable Fuel Standard (EPA RFS2 )
- International Food Policy Research Institute Global Hunger Index
- California Air Resources Board Low Carbon Fuel Standard Program
- European Union Renewable Energy Directive
- Roundtable on Sustainable Biomaterials (RSB) certification
- Basel Action Network's e-Steward® standard
- U.S. EPA's Responsible Recycling Practices (R2) standard
- IEC 61400-1, Edition 3.0—Design requirements
- Forest Stewardship Council
- Sustainable Forest Initiative
- Programme for the Endorsement of Forest Certification
- American Tree Farm System
- International Finance Corporation's (IFC) Performance Standards on Environmental and Social Sustainability
- International Union for Conservation of Nature (IUCN) Protected Areas
- United Nations Environment Program
- International Labour Organization (ILO) conventions

## Infrastructure

- EPA Hazard Potential Classification
- U.S. EPA National Environmental Policy Act (NEPA)
- National Institute of Standards and Technology (NIST) Smart Grid Interoperability Standards
- Department of Energy's (DOE) Federal Energy Management Program (FEMP) M&V Guidelines
- State renewable portfolio standards (RPS)
- System Average Interruption Duration Index (SAIDI)
- U.S. National Primary Drinking Water Regulations
- The U.S. Safe Drinking Water Act
- The European Drinking Water Directive
- World Health Organization (WHO) Guidelines for Drinking-water Quality
- FEMA Special Flood Hazard Areas (SFHA)
- Global Real Estate Sustainability Benchmark (GRESB) Real Estate Survey Guidance
- US Green Building Council LEED
- Green Globes
- ENERGY STAR
- HERS® Index Score
- WaterSense

# Appendix D: Range of Disclosure Quality on Material Topics in Form 10-K

## Health Care Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | **Bristol Myer Squibb - Form 10-K for FY 2015** | **AstraZeneca – Form 20-F for FY 2015** | |
| Pharmaceuticals | Employee Recruitment, Development, and Retention | Failure to attract and retain highly qualified personnel could affect our ability to successfully develop and commercialize products.<br><br>Our success is largely dependent on our continued ability to attract and retain highly qualified scientific, technical and management personnel, as well as personnel with expertise in clinical research and development, governmental regulation and commercialization. Competition for qualified personnel in the biopharmaceutical field is intense. We cannot be sure that we will be able to attract and retain quality personnel or that the costs of doing so will not materially increase. | To achieve our strategic priorities, we continue to acquire, retain and develop a talented and diverse workforce united in the pursuit of our Purpose and Values.<br><br>… Voluntary employee turnover increased marginally to 9.2% in 2015 from 8.8% in 2014. However, the voluntary employee turnover rate among our high performers in 2015 reduced to 4.0% from 6.8% in 2014. We seek to reduce regretted turnover through more effective hiring and induction, high-level reviews of resignations, risk assessments and retention plans. | HC0102-16 - Employee turnover by voluntary and involuntary for: Executives/Senior Managers, Mid-level Managers, Professionals, All others (EEO-1 categories: technicians, sales, admin support, service workers). |
| | | **Sanofi – Form 20-F for FY 2015** | **Pfizer – Form 10-K for FY 2015** | |
| Pharmaceuticals | Counterfeit Drugs | Counterfeit versions of our products could harm our patients and reputation.<br><br>Our industry continues to be challenged by the vulnerability of distribution channels to illegal counterfeiting and the presence of counterfeit products in a growing number of markets and over the Internet. Counterfeit products are frequently unsafe or ineffective, and can potentially be life-threatening. To distributors and patients, counterfeit products may be visually indistinguishable from the authentic version. Reports of adverse reactions to counterfeit drugs or increased levels of counterfeiting could materially affect patient confidence in the authentic product, and harm the business of companies such as ours or lead to litigation. In addition, it is possible that adverse events caused by unsafe counterfeit products could mistakenly be attributed to the authentic product. If a product of ours was the | Counterfeit Products<br><br>… We undertake significant efforts to counteract the threats associated with counterfeit medicines, including, among other things, working with the FDA and other regulatory authorities and multinational coalitions to combat the counterfeiting of medicines and supporting efforts by law enforcement authorities to prosecute counterfeiters; assessing new and existing technologies to seek to make it more difficult for counterfeiters to copy our products and easier for patients and healthcare providers to distinguish authentic from counterfeit medicines; implementing business practices designed to protect patient health; promoting public policies intended to hinder counterfeiting; working diligently to raise public awareness about the dangers of counterfeit medicines; and working collaboratively with | HC0102-20 - Description of methods and technologies used to maintain traceability of products throughout the supply chain and prevent counterfeiting. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | subject of counterfeits, we could incur substantial reputational and financial harm. | wholesalers, pharmacies, customs offices, and law enforcement agencies to increase inspection coverage, monitor distribution channels, and improve surveillance of distributors and repackagers. | |
| | | **Biogen Inc. – Form 10-K for FY 2015** | **Alexion Pharmaceuticals – Form 10-K for FY 2015** | |
| Biotechnology | Manufacturing & Supply Chain Quality Management | Risks Relating to Compliance with [current Good Manufacturing Practices] cGMP.<br><br>We and our third-party providers are generally required to maintain compliance with cGMP and other stringent requirements and are subject to inspections by the FDA and comparable agencies in other jurisdictions to confirm such compliance. Any delay, interruption or other issues that arise in the manufacture, fill-finish, packaging, or storage of our products as a result of a failure of our facilities or the facilities or operations of third parties to pass any regulatory agency inspection could significantly impair our ability to develop and commercialize our products. Significant noncompliance could also result in the imposition of monetary penalties or other civil or criminal sanctions and damage our reputation. | Manufacturing<br><br>… In March 2013, we received a Warning Letter (Warning Letter) from the FDA regarding compliance with current Good Manufacturing Practices (cGMP) at ARIMF. The Warning Letter followed receipt of a Form 483 Inspectional Observations by the FDA in connection with an FDA inspection that concluded in August 2012. The observations relate to commercial and clinical manufacture of Soliris at ARIMF. We responded to the Warning Letter in a letter to the FDA dated in April 2013. As previously announced, the FDA issued Form 483s in August 2014 and August 2015 relating to observations at ARIMF. The inspectional observations from the August 2015 letter have since been closed out by the FDA. The observations are inspectional and do not represent a final FDA determination of compliance. We continue to manufacture products, including Soliris, in this facility. While the resolution of the issues raised in the Warning Letter is difficult to predict, we do not currently believe a loss related to this matter is probable or that the potential magnitude of such loss or range of loss, if any, can be reasonably estimated. | HC0101-29 - Description of FDA enforcement actions taken in response to violations of current good manufacturing practices (cGMP), including: product deemed adulterated, form 483s, suggested recall (Class I, II, III), Warning Letters, Border Alerts, license suspension or revocation, product seizure, Consent Decrees, criminal prosecution. Description of corrective actions implemented in response to actions. |
| | | **Quest Diagnostics – Form 10-K for FY 2015** | **Davita Healthcare – Form 10-K for FY 2015** | |
| Health Care Delivery | Quality of Care & Patient Satisfaction | We strive to provide the highest quality possible and, to meet that goal, we have adopted the Quest Diagnostics Quality Program. This program includes policies and procedures that document, measure and monitor the effectiveness of our laboratory operations in providing and improving quality | Two principal non-financial metrics we track are quality clinical outcomes and teammate turnover. We have developed our own composite index for measuring improvements in our clinical outcomes, which we refer to as the DaVita Quality Index (DQI). Our clinical outcomes as measured by DQI have improved | HC0301-01 - Hospital Values Based Purchasing Total Performance score, broken down by Clinical Process Domain score, Outcome Domain score, and Patient Experience Domain score. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | and meeting the requirements of the agencies that regulate the U.S. clinical laboratory testing industry. | over each of the past several years which we believe directly decreases patient mortalities. Our patient mortality percentages have decreased from 19.0% in 2001 to 13.7% in 2014. | HC0301-02 - Number of Serious Reportable Events (SREs) as defined by the National Quality Forum. |
| | | **Abbot Laboratories – Form 10-K for FY 2015** | **Baxter International – Form 10-K for FY 2015** | |
| Medical Equipment & Supplies | Product Safety | Significant safety concerns could arise for Abbott's products, which could have a material adverse effect on Abbott's revenues and financial condition.<br><br>… If serious safety issues arise with an Abbott product, sales of the product could be halted by Abbott or by regulatory authorities. Safety issues affecting suppliers' or competitors' products also may reduce the market acceptance of Abbott's products. In addition, in the ordinary course of business, Abbott is the subject of product liability claims and lawsuits alleging that its products or the products of other companies that Abbott promotes have resulted or could result in an unsafe condition for or injury to patients. | The company is undertaking a field corrective action with respect to the SIGMA Spectrum Infusion Pump, which is predominantly sold in the United States. The United States Food and Drug Administration (FDA) categorized the action as a Class 1 recall during the second quarter of 2014. Remediation is expected to include software-related corrections and a replacement pump in a limited number of cases. In 2014, the company recorded a charge of $93 million related primarily to cash costs associated with remediation efforts and utilized $4 million in 2014. During 2015, the company refined its expectations relating to the costs associated with the remediation effort and recorded partial reversals of the cash and non-cash reserves totaling $26 million and $10 million, respectively. | HC0201-01 - List of products recalled.<br><br>HC0201-02 - List of products listed in the FDA's MedWatch Safety Alerts for Human Medical Products (Medical Devices) database. |
| | | **Centene Corp – Form 10-K for FY 2015** | **UnitedHealth Group - Form 10-K for FY 2015** | |
| Managed Care | Plan Performance | The governmental healthcare programs in which we participate are subject to the satisfaction of certain regulations and performance standards. For example, under Health Reform Legislation, Congress authorized CMS and the states to implement managed care demonstration programs to serve dually eligible beneficiaries to improve the coordination of their care. Participation in these demonstration programs is subject to CMS approval and the satisfaction of conditions to participation, including meeting certain performance requirements. Our inability to improve or maintain adequate quality scores and star ratings to meet government performance requirements or to match the | Beginning in 2015, quality bonus payments were paid only to plans rated 4 stars and higher. We expect that approximately 56% of our Medicare Advantage members will be in plans rated four stars or higher for payment year 2016 compared with approximately 39% of members in plans rated four stars or higher for payment year 2015. We further expect that at least 63% of our Medicare Advantage members will be in plans rated four stars or higher for payment year 2017. We continue to dedicate substantial resources to advance our quality scores and star ratings to strengthen our local market programs and further improve our performance. | HC0303-07 - Mean Medicare Advantage plan rating (1—5 stars) for each of the following plan types: HMO, local PPO, regional PPO, PFFS, and SNP. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | performance of our competitors could result in limitations to our participation in or exclusion from these or other government programs. | | |

## Financials Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | **Prudential Financial Inc.- Form 10-K for FY 2015** | **American International Group - Form 10-K for FY 2015** | |
| Insurance | Environmental Risk Exposure | The occurrence of natural or man-made disasters could adversely affect our operations, results of operations and financial condition.<br><br>The occurrence of natural disasters, including hurricanes, floods, earthquakes, tsunamis, tornadoes, fires, explosions, pandemic disease and man-made disasters, including acts of terrorism and military actions, could adversely affect our operations, results of operations or financial condition, including in the following respects:<br><br>... Finally, climate change may increase the frequency and severity of weather related disasters. In addition, climate change regulation may affect the prospects of companies and other entities whose securities we hold and other counterparties, including reinsurers, and affect the value of investments, including real estate investments we hold or manage for others. We cannot predict the long-term impacts on us from climate change or related regulation. | Natural Catastrophe Risk… We recognize that climate change has implications for insurance industry exposure to natural catastrophe risk. With multiple levels of risk management processes in place, we actively analyze the latest climate science and policy to anticipate potential changes to our risk profile, pricing models and strategic planning. For example, we continually consider changes in climate and weather patterns as an integral part of the underwriting process. In addition, we are committed to providing innovative insurance products and services to help our clients be proactive against the threat of climate change, including expanding natural disaster resilience, promoting adaptation, and reducing greenhouse gas emissions.<br><br>… The estimates below are the Occurrence Exceedance Probability (OEP) losses, which reflect losses that may occur in any single event due to the defined peril. The 1-in-100 and 1-in-250 PMLs are the probable maximum losses from a single natural catastrophe event with probability of 1 percent and 0.4 percent in a year, respectively. The following table presents an overview of OEP modeled losses for top perils and countries.<br><br>*[SEE TABLE ON PAGE 184]* | FN0301-01 - Probable Maximum Loss (PML) of insured products from weather-related natural catastrophes, by insurance segment, type of event, and type of risk insured.<br><br>FN0301-02 - Total annual losses attributable to insurance payouts from (1) modeled natural catastrophes and (2) non-modeled natural catastrophes.<br><br>FN0301-03 - Description of how environmental risks are integrated into: (1) The underwriting process for individual contracts (2) The management of firm-level risks and capital adequacy<br><br>FN0301-04 - List of markets, regions, and/or events for which the registrant declines to voluntarily write coverage for weather-related natural catastrophe risks. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | **American International Group - Form 10-K for FY 2015** | **Aviva - Form 20-F for FY 2015** | |
| Insurance | Integration of Environmental, Social, and Governance Risk Factors in Investment Management | We understand that climate change potentially poses a serious financial threat to society as a whole, with implications for the insurance industry in areas such as catastrophe risk perception, pricing and modeling assumptions. Because there is significant variability associated with the impacts of climate change, we cannot predict how physical, legal, regulatory and social responses may impact our business.<br>Such catastrophic events, and any relevant regulations, could expose us to:<br><br>... • loss resulting from a decline in the value of our invested assets;<br><br>... • declines in value and/or losses with respect to companies and other entities whose securities we hold and counterparties we transact business with and have credit exposure to, including reinsurers, and declines in the value of investments; and | The Committee agreed the refreshed Aviva Group Corporate Responsibility (CR) strategy during 2015… The CR strategy was considered and approved by the Committee because CR is integral to the way we run our whole business and we recognise that our CR performance and reputation helps build the pride of our employees and win the trust of our customers.<br><br>... Governance Committee Responsibilities and allocation of agenda time<br>… Corporate Responsibility – 11%<br>- Recommend and review the Group's CR strategy and monitor external developments and environmental regulations.<br>- Review the Group's Environment and Climate Change Business Standard and monitor compliance with the CR strategy.<br>- Work with the Risk Committee to monitor any CR risk exposures.<br><br>Activities during 2015 … Corporate Responsibility<br>- The Committee received reports from management during the year on the Aviva Community Fund, the Group's low carbon investment strategy, the Group's health and safety compliance and the Group's Human Rights Policy | FN0301-16 - Discussion of how environmental, social, and governance (ESG) factors are integrated into the investment of policy premiums<br><br>FN0301-17 - Discussion of the investment portfolio risks presented by climate change, natural resource constraints, human rights concerns, or other broad sustainability trends. |
| | | **Goldman Sachs Group - Form 10-K for FY 2015** | **HSBC Holdings - Form 20-F for FY 2015** | |
| Investment Banking & Brokerage | Integration of Environmental, Social, and Governance Risk Factors in Advisory, Underwriting, and Brokerage Activities | Our commodities activities, particularly our physical commodities activities, subject us to extensive regulation and involve certain potential risks, including environmental, reputational and other risks that may expose us to significant liabilities and costs.<br><br>… These activities subject us and/or the entities in which we invest to extensive and evolving federal, state and local energy, environmental, antitrust and other governmental laws and | Climate business<br><br>HSBC helps facilitate investment in areas including infrastructure and renewable energy that help lower carbon dioxide emissions. In 2015, the Group issued a green bond for the first time when HSBC France raised E500m ($554m) to fund customers and projects in the following sectors: renewables, energy efficiency, sustainable waste and water management, sustainable land use, climate | FN0102-15 - Discussion of how environmental, social, and governance (ESG) factors are incorporated into core products and services<br><br>FN0102-16 - Amount of sustainability-focused services, activities, and products, broken down by: (1) origination, (2) market making, and (3) advisory and underwriting |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | regulations worldwide, including environmental laws and regulations relating to, among others, air quality, water quality, waste management, transportation of hazardous substances, natural resources, site remediation and health and safety. Additionally, rising climate change concerns may lead to additional regulation that could increase the operating costs and profitability of our investments. | change adaptation, and clean buildings and transportation.<br><br>HSBC also pledged to invest $1bn in a portfolio of green, social or sustainable bonds. We also helped CLP Windfarms become the first Indian corporate to issue a public green bond, and Vestas Wind Systems, based in Denmark, issue the first green bond by a wind turbine manufacturer… We helped finance 466 efficient buses in 2015, in countries including Ghana and South Africa. Since the team was created in 2005, it has helped finance 4,500 buses and equipment such as workshops and ticketing systems. We are also a member of the United Nations Partnership on Sustainable, Low Carbon Transport. In 2015, we also helped finance three renewable energy deals in the US, and an energy efficiency programme in the UK to install around seven million electricity and gas smart meters in homes and businesses. | FN0102-17 - Deal size of advisory and underwriting transactions for companies in the following sectors/industries: Energy/Oil & Gas, Materials/Basic Materials, Industrials, and Utilities |
| | | **Bank of America - Form 10-K for FY 2015** | **HSBC Holdings - Form 20-F for FY 2015** | |
| Commercial Banks | Customer Privacy & Data Security | A cyber attack, information or security breach, or a technology failure of ours or of a third party could adversely affect our ability to conduct our business, manage our exposure to risk or expand our businesses, result in the disclosure or misuse of confidential or proprietary information, increase our costs to maintain and update our operational and security systems and infrastructure, and adversely impact our results of operations, liquidity and financial condition, as well as cause reputational harm.<br><br>Our businesses are highly dependent on the security and efficacy of our infrastructure, computer and data management systems, as well as those of third parties with whom we interact. Cyber security risks for financial institutions have significantly increased in recent years in part because of the proliferation of new technologies, the use of the Internet and telecommunications technologies to conduct financial transactions, and the increased | HSBC remains susceptible to a wide range of cyber risks that impact and/or are facilitated by technology. The threat from cyber attacks is a concern for our organisation and failure to protect our operations from internet crime or cyber attacks may result in financial loss and/or loss of customer data or other sensitive information which could undermine our reputation and our ability to attract and keep customers.<br>For example, in 2015 a case was detected in which a former HSBC employee exposed online details of 86,000 US consumer mortgage customers, and pay details for 2,000 current and former HSBC employees. The regulators were notified, and customers contacted and offered credit protection services.<br><br>Moreover, during 2015, we were subjected to 23 ‘denial of service’ attacks on our external facing websites across the Group. A denial of | FN0101-06 - Number of data security breaches and percentage involving customers’ personally identifiable information<br><br>FN0101-07 - Discussion of management approach to identifying and addressing vulnerabilities and threats to data security |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | sophistication and activities of organized crime, hackers, terrorists and other external parties, including foreign state actors… | service attack is the attempt to intentionally disrupt, paralyse and potentially extract data from a computer network by flooding it with data sent simultaneously from many individual computers. | |
| | | **First Data Corp.- Form 10-K for FY 2015** | **Discover Financial Services - Form 10-K for FY 2015** | |
| Consumer Finance | Customer Privacy & Data Security | Fraud by merchants or others could have a material adverse effect on our business, financial condition, and results of operations.<br><br>We may be subject to potential liability for fraudulent electronic payment transactions or credits initiated by merchants or others. Examples of merchant fraud include when a merchant or other party knowingly uses a stolen or counterfeit credit, debit or prepaid card, card number, or other credentials to record a false sales transaction, processes an invalid card, or intentionally fails to deliver the merchandise or services sold in an otherwise valid transaction. Criminals are using increasingly sophisticated methods to engage in illegal activities such as counterfeiting and fraud. It is possible that incidents of fraud could increase in the future. Failure to effectively manage risk and prevent fraud would increase our chargeback liability or other liability. Increases in chargebacks or other liability could have a material adverse effect on our business, financial condition, and results of operations. | Fraudulent activity associated with our products or our networks could cause our brands to suffer reputational damage, the use of our products to decrease and our fraud losses to be materially adversely affected.<br><br>We are subject to the risk of fraudulent activity associated with merchants, customers and other third parties handling customer information. The risk of fraud continues to increase for the financial services industry in general. We incurred fraud losses of $112 million and $113 million for the years ended December 31, 2015 and 2014, respectively. Credit and debit card fraud, identity theft and related crimes are prevalent and perpetrators are growing ever more sophisticated. Our resources and fraud prevention tools may be insufficient to accurately predict and prevent fraud. Additionally, our risk of fraud continues to increase as acceptance of the Discover card grows internationally and we expand our direct banking business and introduce new products and features. Our financial condition, the level of our fraud charge-offs and other results of operations could be materially adversely affected if fraudulent activity were to significantly increase. | FN0201-04 - Amount of fraudulent transaction activity, percentage from: (1) card-not-present fraud and (2) card-present and other fraud.<br><br>FN0201-05 - Description of data security and fraud prevention efforts related to new and emerging technologies and/or new and emerging threats |
| | | **MasterCard Inc. - Form 10-K for FY 2015** | **Synchrony Financial - Form 10-K for FY 2015** | |
| Consumer Finance | Transparent Information & Fair Advice for Customers | Regulations affecting the global payments industry may materially and adversely affect our overall business and results of operations.<br><br>... Consumer Financial Protection Bureau ("CFPB") - In the United States, the CFPB could regulate consumer financial products, including amending existing requirements or imposing | Consumer Financial Services Regulation<br><br>…On June 19, 2014, we entered into a consent order with the CFPB (the "2014 CFPB Consent Order") that required us to refund $56 million to cardholders who enrolled in a debt cancellation product over the telephone from January 2010 to October 2012 ($11 million of | FN0201-06 - Amount of legal and regulatory fines and settlements associated with disclosure, transparency, or marketing |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | new ones. The CFPB also has supervisory and independent examination authority as well as enforcement authority over certain financial institutions, their service providers, and other entities, which could include us due to our processing of credit, debit and prepaid transactions. It is not clear whether and/or to what extent the CFPB will regulate broader aspects of payment card networks. | which was refunded prior to the 2014 CFPB Consent Order), pay civil money penalties of $3.5 million, and implement a compliance plan related to the sale of "add-on" products to the extent the Bank restarts telesales of such products (which were discontinued in October 2012). In the second quarter of 2015, we completed the consumer refunds. | |
| | | **Fannie Mae - Form 10-K for FY 2015** | **Ocwen Financial Corporation - Form 10-K for FY 2015** | |
| Mortgage Finance | Environmental Risk to Mortgaged Properties | The occurrence of a major natural or other disaster in the United States could negatively impact our credit losses and credit-related expenses, and could disrupt our business operations in the affected geographic area or nationally.<br><br>We conduct our business in the residential and multifamily mortgage markets and own or guarantee the performance of mortgage loans throughout the United States. The occurrence of a major natural or environmental disaster, terrorist attack, cyber attack, pandemic, or similar event (a "major disruptive event") in a regional geographic area of the United States could negatively impact our credit losses and credit-related expenses in the affected area or, depending on the nature of the event, nationally. | A significant portion of our business is in the states of California, Florida, New York, Texas and New Jersey, and our business may be significantly harmed by a slowdown in the economy or the occurrence of a natural disaster in those states.<br><br>A significant portion of the mortgage loans that we originate and service are secured by properties in California, Florida, New York, Texas and New Jersey. Any adverse economic conditions in these markets, including a downturn in real estate values, will likely increase our obligations to advance delinquent principal and interest and to make advances for delinquent taxes and insurance and foreclosure costs and the upkeep of vacant property in foreclosure to the extent that we determine that such amounts are recoverable. We could also be adversely affected by business disruptions triggered by natural disasters or acts or war or terrorism in these geographic areas | FN0202-01 - Number and value of mortgage loans in Federal Emergency Management Agency (FEMA) special flood hazard areas<br><br>FN0202-02 - Description of how climate change and other environmental risks are incorporated into mortgage origination and underwriting<br><br>FN0202-03 - Amount and percentage of credit risk for mortgage loans that is attributable to default risk from weather-related natural catastrophes, by geographic region |

## Technology & Communications Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **MSI - Form 10-K for FY 2012** | **EMC - Form 10-K for FY 2012** | |
| Hardware | Product lifecycle management | We are subject to a wide range of product regulatory and safety, consumer, worker safety and environmental laws.<br><br>… Laws focused on: the energy efficiency of electronic products and accessories; recycling of both electronic products and packaging; reducing or eliminating certain hazardous substances in electronic products; and the transportation of batteries continue to expand significantly.<br><br>... These laws impact our products and negatively affect our ability to manufacture and sell products competitively. We expect these trends to continue. In addition, we anticipate that we will see increased demand to meet voluntary criteria related to reduction or elimination of certain constituents from products, increasing energy efficiency, and providing additional accessibility. | Material use and waste is a second major area of impact for the IT industry.<br><br>We are continuously pursuing opportunities to reduce material used in our products and operations, recycle what cannot be reused, and handle any waste with integrity and responsibility for the environment and human health. We are working with our suppliers and industry peers to identify substitutes for materials that can damage our ecology and human health. For example, we have eliminated the use of leaded solder in our products and reduced brominated flame retardants by greater than 50% in all new printed circuit boards. We are currently working with our suppliers to evaluate alternatives for the use of phthalates, a material of high concern, in our products. We have also identified and qualified a plasticizer for our cable sheathing that is free of halogens, PVCs, and phthalates though demand within the industry is not yet sufficient to mitigate the supply chain risks of switching to this substitute material. | TC0103-03 - Percentage of products by revenue that contain IEC 62474 declarable substances.<br><br>TC0103-04 - Percentage of eligible products by revenue meeting the requirements for EPEAT® certification or equivalent. |
| | | **Applied Materials - Form 10-K for FY 2012** | **Intel - Form 10-K for FY 2012** | |
| Semiconductors | Energy Management in Manufacturing | Applied is exposed to risks as a result of ongoing changes in the various industries in which it operates.<br><br>The global semiconductor, flat panel display, solar and related industries in which Applied operates are characterized by ongoing changes affecting some or all of these industries that impact demand for and/or the profitability of Applied's products, including:<br><br>... - the increasing focus on reducing energy usage and improving the environmental impact and sustainability associated with manufacturing operations. | We seek to reduce our global GHG emissions by investing in energy conservation projects in our factories and working with suppliers to improve energy efficiency. We take a holistic approach to power management, addressing the challenge at the silicon, package, circuit, micro-architecture, macro architecture, platform, and software levels. We recognize that climate change may cause general economic risk<br><br>… We have been purchasing wind power and other forms of renewable energy at some of our major sites for several years. We purchase renewable energy certificates under a multi-year contract. This purchase has placed Intel | TC0201-03 - Total energy consumed, percentage grid electricity, percentage renewable energy |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | at the top of the EPA's Green Power Partnership for the past four years and is intended to help stimulate the market for green power, leading to additional generating capacity and, ultimately, lower costs. | |
| | | **Jabil Circuit - Form 10-K for FY 2013** | **Benchmark - Form 10-K for FY 2012** | |
| Electronic Manufacturing Services & Original Design Manufacturing | Supply chain management & materials sourcing | Compliance or the failure to comply with current and future environmental, health and safety, product stewardship and producer responsibility laws or regulations could cause us significant expense.<br><br>We are subject to a variety of federal, state, local and foreign environmental, health and safety, product stewardship and producer responsibility laws and regulations, including those relating to the use, storage, discharge and disposal of hazardous chemicals used during our manufacturing process, those governing worker health and safety, those requiring design changes, supply chain investigation or conformity assessments or those relating to the recycling or reuse of products we manufacture | Sustainability<br><br>… Our sustainability priorities include: upholding the principle of human rights and observing fair labor practices within our organization and our supply chain; protecting the environment by conserving energy and natural resources and preventing pollution through appropriate management technology and practices; ensuring ethical organizational governance; and applying fair, transparent and accountable operating practices. All Benchmark manufacturing facilities are either currently certified or undergoing certification to ISO 14001. We have endorsed the Electronics Industry Citizenship Coalition Code of Conduct, and flowed specific requirements to our supply chain through our Purchase Order Terms and Conditions, Supplier Assurance Manual, and Supplier Code of Conduct. We have also completed a B-level Global Reporting Initiative (GRI) Report as a baseline for our sustainability efforts. | TC0101-10 - Percentage of products by revenue that contain critical materials.<br><br>TC0101-11 - Percentage of tungsten, tin, tantalum, and gold smelters within the supply chain that are verified conflict-free<br><br>TC0101-12 - Discussion of the management of risks associated with the use of critical materials and conflict minerals |

## Transportation Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Kansas City Southern - Form 10-K for FY 2015** | **CSX Corporation - Form 10-K for FY 2015** | |
| Rail Transportation | Accident & Safety Management | The operation of any railroad carries with it an inherent risk of catastrophe, mechanical failure, collision, and property loss... Collisions, environmental mishaps, or other accidents can cause serious bodily injury, death and extensive property damage, particularly when such accidents occur in heavily populated areas... Even with insurance, if any | The Company measures and reports safety and service performance. The Company strives for continuous improvement in these measures through training, innovation and investment... At CSX, operational success is built on employee commitment to maintaining a constant focus on safety. CSX remains the industry leader with the lowest personal injury | TR0401-06 - Number of accidents and incidents<br><br>TR0401-07 - (1) Total recordable injury rate, (2) fatality rate, and (3) near miss frequency rate. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | catastrophic interruption of service occurs, KCS may not be able to restore service without a significant interruption to operations which could have an adverse effect on KCS's consolidated financial statements. | across Class I railroads this year. The FRA reportable personal injury frequency index improved 9 percent year over year to 0.89. The reported FRA train accident frequency rate weakened 2 percent year over year to 2.45. | |
| | | **CH Robinson - Form 10-K for FY 2015** | **FedEx Corp. - Form 10-K for FY 2015** | |
| Air Freight & Logistics | Environmental Footprint of Fuel Use | Changing fuel costs and interruptions of fuel supplies may have an impact on our net revenue margins. In our truckload transportation business, which is the largest source of our net revenues, fluctuating fuel prices may result in decreased net revenue margin. While our different pricing arrangements with customers and contracted carriers make it very difficult to measure the precise impact, we believe that fuel costs essentially act as a pass-through cost to our truckload business. In times of fluctuating fuel prices, our net revenue margin may also fluctuate. | In furtherance of our commitment to protecting the environment, we have made significant progress over the last several years in an effort to increase FedEx Express vehicle fuel efficiency 30% from a 2005 baseline by 2020 — we have already reached more than 29% cumulative improvement in fuel economy. Having nearly achieved our goal, the company expects to surpass and then revisit the goal in 2016. We also continue with our goal to reduce aircraft emissions by 30% by 2020 on an emissions per available-ton-mile basis, a goal that we increased from 20% in 2012. We have also established a goal of obtaining 30% of our jet fuel from alternative fuels by the year 2030. These efforts help us continue to reduce our environmental footprint as evidenced in 2014 when we saved 100 million gallons of jet fuel at FedEx Express and avoided more than 976,000 metric tons of carbon emissions — all while our volumes were up. | TR0202-01 - Gross global Scope 1 emissions.<br><br>TR0202-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets, and an analysis of performance against those targets.<br><br>TR0202-03 - Total fuel consumed, percentage renewable for (1) road transport and (2) air transport |
| | | **Ford Motor Company - Form 10-K for FY 2015** | **General Motors - Form 10-K for FY 2015** | |
| Automobiles | Product Safety | Should we or government safety regulators determine that a safety or other defect or a noncompliance exists with respect to certain of our vehicles prior to the start of production, the launch of such vehicle could be delayed until such defect is remedied. The costs associated with any protracted delay in new model launches necessary to remedy such defects, or the cost of recall campaigns or warranty costs to remedy such defects in vehicles that have been sold, could be substantial. These recall and warranty costs could be exacerbated to the extent they relate to global platforms. Furthermore, launch delays or recall actions also could adversely affect our | Recall Campaigns<br><br>... We recorded recall-related charges of $1.1 billion in the year ended December 31, 2015 including adjustments to prior periods of $0.3 billion. Adjustments to prior periods relate to changes in estimated costs based on new information including claims emergence and development patterns. There were approximately 12 million vehicles subject to recalls announced in the year ended December 31, 2015. | TR0101-06 - Number of vehicles recalled. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | reputation or market acceptance of our products as discussed above under "Lower-than-anticipated market acceptance of Ford's new or existing products or services. | | |
| | | **Delta Airlines - Form 10-K for FY 2015** | **China Southern Airlines - Form 20-F for FY 2015** | |
| Airlines | Accidents & Safety Management | We are at risk of losses and adverse publicity stemming from a serious accident involving our aircraft.<br><br>An aircraft crash or other serious accident could expose us to significant liability. Although we believe that our insurance coverage is appropriate, we may be forced to bear substantial losses from an accident in the event that the coverage was not sufficient. In addition, any accident involving an aircraft that we operate or an aircraft that is operated by an airline that is one of our regional carriers or codeshare partners could create a negative public perception about safety, which could harm our reputation, resulting in air travelers being reluctant to fly on our aircraft and therefore harm our business. | The Group endeavors to maintain strict compliance with all laws and regulations applicable to flight safety<br><br>… The Air Safety Management Department of the Company implements safety-related training programs on an ongoing basis in all of the Group's operations to raise the safety awareness of all employees. As a result, overall flight safety has gradually improved. For "incidents" which include various events and conditions prescribed by the CAAC which do not involve serious personal injury or material damage to flight equipment, the Group has kept the number consistently below what is prescribed by the CAAC. For example, the Company's "Air Transportation Incidents Per Ten Thousands Hours Ratio" was 0.034, 0.012 and 0.02 in 2015, 2014 and 2013, respectively. In comparison, CAAC's published maximum acceptable Air Transportation Incidents Per Ten Thousands Hours Ratio was 0.5, 0.5 and 0.5 in 2015, 2014 and 2013, respectively. This ratio is defined as the number of occurrences of air transportation incident for every 10,000 hours of flight time. | TR0201-08 - Description of implementation and outcomes of Safety Management System<br><br>TR0201-09 - Number of accidents |
| | | **Seaspan Corp. - Form 20-F for FY 2015** | **Matson Inc. - Form 10-K for FY 2015** | |
| Marine Transportation | Environmental Footprint of Fuel Use | Clean Air Act<br>The Clean Air Act, or the CAA, and its implementing regulations subject our vessels to vapor control and recovery requirements when cleaning fuel tanks and conducting other operations in regulated port areas and to air emissions standards for our engines while operating in U.S. waters. The EPA has adopted standards that apply to certain engines installed on U.S. vessels and to marine diesel fuels produced and distributed in the United States. These standards, which are | Effective in 2015, Horizon received a conditional waiver (subsequently transferred to Matson pursuant to the Horizon Acquisition) from the EPA ECA regulations for three diesel-powered vessels used in the Alaska service that permits the use of 2.0 percent sulfur content fuel on these vessels for a limited time, subject to the installation and testing of an exhaust gas cleaning system (known as 'scrubbers') on such vessels. The conditional waiver includes a schedule by which such installation and testing is to be completed, with | TR0301-04 - Air emissions for the following pollutants NOx, SOx, and particulate matter (PM) |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | being implemented in two stages (effective in 2011 and 2016, respectively) are consistent with Annex VI of MARPOL and establish significant reductions for vessel emissions of particulate matter, sulfur oxides and nitrogen oxides. | dates of installation ranging from the second half of 2015 to the end of 2016. The estimated costs for the installation of scrubbers on all three vessels is approximately $27.7 million, of which approximately $10.1 million was incurred as of December 31, 2015 related to the installation on one vessel. The Company expects the installation of the other two vessels to be completed later in 2016. | |
| | | **J.B, Hunt Transport - Form 10-K for FY 2015** | **Knight Transportation - Form 10-K for FY 2015** | |
| Road Transportation | Environmental Footprint of Fuel Use | Rapid changes in fuel costs could impact our periodic financial results.<br><br>Fuel costs can be very volatile. We have a fuel surcharge revenue program in place with the majority of our customers, which has historically enabled us to recover the majority of higher fuel costs. Most of these programs automatically adjust weekly depending on the cost of fuel. However, there can be timing differences between a change in our fuel cost and the timing of the fuel surcharges billed to our customers. In addition, we incur additional costs when fuel price increases cannot be fully recovered due to our engines being idled during cold or warm weather and empty or out-of-route miles that cannot be billed to customers. Rapid increases in fuel costs or shortages of fuel could have a material adverse effect on our operations or future profitability. As of December 31, 2015, we had no derivative financial instruments to reduce our exposure to fuel-price fluctuations. | We are subject to commodity price risk with respect to purchases of fuel. The price and availability of diesel fuel can fluctuate due to market factors that are beyond our control. Because we do not recover the full amount of fuel price increases, we believe fuel surcharges are effective at mitigating some, but not all, of the risk of high fuel prices. As of December 31, 2015, we did not have any derivative financial instruments to reduce our exposure to fuel price fluctuations, but we may use such instruments in the future. At our average level of fuel purchasing during 2015, a 10% increase in the average price per gallon, net of fuel surcharge collection, would decrease pretax earnings, on an annualized basis, by approximately $6.4 million. | R0402-01 - Gross global Scope 1 emissions<br><br>TR0402-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets, and an analysis of performance against those targets<br><br>R0402-03 - Total fuel consumed, percentage renewable |

## Non-Renewable Resources Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Chevron Corp. - Form 10-K for FY 2015** | **Royal Dutch Shell - Form 20-F for FY 2015** | |
| Oil & Gas – Exploration & Production | Greenhouse Gas Emissions | Consideration of GHG issues and the responses to those issues through international agreements and national, regional or state legislation or regulations are integrated into the company's strategy and planning, capital investment reviews, and risk management tools and processes, where applicable. They are also factored into the company's long-range supply, demand and energy price forecasts. These forecasts reflect long-range effects from renewable fuel penetration, energy efficiency standards, climate-related policy actions, and demand response to oil and natural gas prices. The actual level of expenditure required to comply with new or potential GHG emissions laws and regulations and amount of additional investments in new or existing technology or facilities, such as carbon dioxide injection, is difficult to predict with certainty and is expected to vary depending on the actual laws and regulations enacted in a jurisdiction, the company's activities in it and market conditions. | Our direct GHG emissions decreased from 76 million tonnes of CO2 equivalent in 2014 to 72 million in 2015. The level of flaring in our Upstream businesses fell by 8% in 2015 compared with 2014, despite an increase in flaring levels in Malaysia in line with increased oil production in 2015. Our emissions also decreased as a result of divestments (for example, in Nigeria and the Geelong refinery in Australia), a higher level of maintenance shutdowns and the start-up of Quest. These decreases were partially offset by updated Global Warming Potentials (GWPs). GWP is an index used to compare the impact of emissions from various greenhouse gases to the impact of emissions from the equivalent mass of CO2. Our 2014 reporting was based on the GWPs from the Second Assessment Report published by the International Panel on Climate Change (IPCC). Consistent with updated UK regulations, our 2015 reporting is based on the GWPs from the Fourth Assessment Report. For example, as a result, GWP for methane increased from 21 to 25. | NR0101-01 - Gross global Scope 1 emissions, percentage covered under a regulatory program, percentage by hydrocarbon resource<br><br>NR0101-02 - Amount of gross global Scope 1 emissions from: (1) combustion, (2) flared hydrocarbons, (3) process emissions, (4) directly vented releases, and (5) fugitive emissions/leaks<br><br>NR0101-03 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets, and an analysis of performance against those targets |
| | | **Exxon Mobil Corporation - Form 10-K for FY 2015** | **Royal Dutch Shell - Form 20-F for FY 2015** | |
| Oil & Gas – Exploration & Production | Health, safety & emergency management | Safety, business controls, and environmental risk management.<br><br>Our results depend on management's ability to minimize the inherent risks of oil, gas, and petrochemical operations, to control effectively our business activities, and to minimize the potential for human error. We apply rigorous management systems and continuous focus to workplace safety and to avoiding spills or other adverse environmental events. For example, we work to minimize spills through a combined program of effective operations integrity management, ongoing upgrades, key | Safety is central to the responsible delivery of energy. We develop and operate our facilities with the aim of preventing any incidents that may harm our employees, contractors or nearby communities, or cause damage to our assets or adversely impact the environment... While we continually work to minimise the likelihood of incidents, some do occur. We investigate all incidents to understand the underlying causes and translate these into improvements in standards or ways of working that can be applied broadly across similar facilities in Shell. As set out in "Performance indicators" on pages 20-21, our total recordable case frequency (injuries per million working hours) was 0.94 in | NR0101-17 - (1) Total Recordable Injury Rate (TRIR), (2) Fatality Rate, and (3) Near Miss Frequency Rate for (a) full-time employees, (b) contract employees, and (c) short-service employees.<br><br>NR0101-18 -Process Safety Event (PSE) rates for Loss of Primary Containment (LOPC) of greater consequence (Tier 1) |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | equipment replacements, and comprehensive inspection and surveillance | 2015, compared with 0.99 in 2014, and there were 51 operational Tier 1 process safety events in 2015, compared with 57 in 2014. | |
| | | **Freeport-McMoRan Inc. - Form 10-K for FY 2015** | **Rio Tinto - Form 20-F for FY 2015** | |
| Metals & Mining | Greenhouse Gas Emissions | Regulation of greenhouse gas emissions and climate change issues may increase our costs and adversely affect our operations.<br><br>Many scientists believe that emissions from the combustion of carbon-based fuels contribute to greenhouse effects and, therefore, contribute to climate change. Carbon-based energy is a significant input in our operations, and our revenues include sales of oil, natural gas liquids and natural gas, and other carbon-based energy products. The potential physical impacts of climate change on our operations are highly uncertain, and would vary by operation based on particular geographic circumstances. As a result of the Paris Agreement reached during the 21st Conference of the Parties to the United Nations Framework Convention on Climate Change in 2015, a number of governments have pledged ""Nationally Determined Contributions"" to control and reduce greenhouse gas emissions. In the U.S., the EPA has finalized regulations governing greenhouse gas emissions from new, modified, and existing power plants. While these rules are being challenged in court, increased regulation of greenhouse gas emissions may increase our costs and may also affect the demand for the oil and gas we produce. | Climate change and energy.<br><br>In 2008 we set a target of ten per cent reduction in total greenhouse gas (GHG) emissions intensity, to be achieved by 2015. We have exceeded this target and reduced our total GHG emissions intensity by 21.1 per cent compared with 2008. This represents a reduction in our total GHG emissions of 18.1 million tonnes of carbon dioxide equivalent (CO2-e) over the same period. We have extended our GHG emission intensity target period to 2020. The new target is for a 24 per cent reduction in emissions intensity from our 2008 baseline. Our climate change programme focuses on reducing the energy intensity of our operations, as well as the carbon intensity of our energy. Our total GHG emissions were 31.3 million tonnes of CO2-e in 2015, 2.5 million tonnes lower than in 2014.<br><br>Our business is inherently energy intensive. The majority of our GHG emissions are generated as a result of energy use (electricity, fuel) and chemical processes (anodes and reductants) during mining, milling and smelting activities at our sites. The majority (67 per cent) of the electricity we use is from hydro, wind and solar power. In 2015 we commissioned a 1.7MW hybrid photovoltaic/diesel solar project to supply power to our mining operations at Weipa. This is the first time a remote operation has been supplied with power from solar photovoltaics on this scale." | NR0302-01 - Gross global Scope 1 emissions, percentage covered under a regulatory program.<br><br>NR0302-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets, and an analysis of performance against those targets |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Alcoa Inc. - Form 10-K for FY 2015** | **BHP Billiton Ltd. - Form 20-F for FY 2014/2015** | |
| Metals & Mining | Water Management | Climate change, climate change legislation or regulations and greenhouse effects may adversely impact Alcoa's operations and markets.<br><br>…. The potential physical impacts of climate change on the Company's operations are highly uncertain, and will be particular to the geographic circumstances. These may include changes in rainfall patterns, shortages of water or other natural resources, changing sea levels, changing storm patterns and intensities, and changing temperature levels. These effects may adversely impact the cost, production and financial performance of Alcoa's operations. | We anticipate climate change is likely to make the patterns and cycles of water flow less predictable and require our operations to implement adaptive responses. Managing our shared water resources is therefore a complex task for our business.<br><br>... We report on our water use publicly, consistent with the Input Output model of the Minerals Council of Australia's Water Accounting Framework (WAF). We are working with the ICMM to support broader adoption across the industry. The WAF aims to improve data integrity and comparability across the sector to allow a more meaningful analysis on which to base policy making and deliver improved outcomes.<br><br>Under the WAF, water is categorised as Type 1 (close to drinking water standards), Type 2 (suitable for some purposes), and Type 3 (unsuitable for most purposes). In FY2015, our total water input (water intended for use) was 340,200 megalitres across the Group, with 85 per cent defined as Type 2 or Type 3. Our use of Type 2 and Type 3 water demonstrates our approach to utilising lower-quality water wherever feasible. | R0302-05 - Total fresh water withdrawn, percentage recycled, percentage in regions with High or Extremely High Baseline Water Stress<br><br>R0302-06 - Number of incidents of non-compliance with water-quality permits, standards, and regulations |
| | | **USG Corporation - Form 10-K for FY 2015** | **CRH - Form 20-F for FY 2015** | |
| Construction Materials | Product Innovation | The adoption of green building codes and standards such as the Leadership in Energy and Environmental Design, or LEED, rating system established by the U.S. Green Building Council to encourage the design and construction of buildings that are environmentally friendly, combined with an increase in customer preference for products that can assist in obtaining LEED credit or are otherwise environmentally preferable, has increased demand for products, systems and services that contribute to building sustainable spaces. Many of our products meet the requirements for the awarding of LEED credits, | CRH believes that excellence in environmental management, together with a proactive approach to addressing the challenges and opportunities of climate change, is fundamental to making our businesses better. The Group works with stakeholders including customers and the wider building materials industry to implement programmes that promote energy and resource efficiency, achieve targeted emissions reductions, enhance biodiversity and realise environmentally driven product and process innovation. | NR0401-11 - Percentage of products that can be used for credits in sustainable building design and construction certifications.<br><br>NR0401-12 - Total addressable market and share of market for products that reduce energy, water, and/or material impacts during usage and/or production |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | and we continue to develop new products and systems to address market demand for products that enable construction of buildings that require fewer natural resources to build, operate and maintain. Our competitors also have developed and introduced to the market more environmentally responsible products.<br><br>We expect that there will be increased demand over time for products, systems and services that meet regulatory and customer sustainability standards and preferences and decreased demand for products that produce significant greenhouse gas emissions. | In 2015 CRH products incorporated a significant 23 million tonnes of externally sourced alternative raw materials. Recycled asphalt pavement and shingles together now provide a fifth of asphalt requirements in our US operations, while lower carbon warm-mix asphalt now accounts for approximately 40% of the Group's US asphalt sales. We also provide low carbon cement for sustainable construction applications. | |
| | | **Vulcan Materials - Form 10-K for FY 2015** | **CEMEX - Form 20-F for FY 2015** | |
| Construction Materials | Greenhouse Gas Emissions | Climate change and climate change legislation or regulations may adversely impact our business — A number of governmental bodies have introduced or are contemplating legislative and regulatory change in response to the potential impacts of climate change. Such legislation or regulation, if enacted, potentially could include provisions for a ""cap and trade"" system of allowances and credits or a carbon tax, among other provisions.<br><br>… There is also a potential for climate change legislation and regulation to adversely impact the cost of purchased energy and electricity. The impacts of climate change on our operations and the company overall are highly uncertain and difficult to estimate. However, climate change legislation and regulation concerning greenhouse gases could have a material adverse effect on our future financial position, results of operations or cash flows. | Enabling a Low-Carbon and Resource-Efficient Industry. We dedicate significant efforts to address key sustainability-related issues, from biodiversity and conservation to renewable energy, climate change and emissions monitoring. Climate change poses significant challenges to our society, and we are committed to applying our skills and, technologies to contribute to the development of a low-carbon economy. We have successfully increased alternative fuel substitution rates to 26.6% in 2015, and are well on track to meet our ambitious target of 35% substitution rate by 2020. CEMEX has been working for more than a decade in the identification, documentation and registry of different projects that mitigate carbon emissions beyond the business-as-usual scenario.<br><br>As of March 31, 2015, CEMEX achieved the approval for 23 carbon dioxide offset projects registered either under the Clean Development Mechanism ("CDM") or the Verified Carbon Standard representing a total reduction potential of almost three million tons of carbon dioxide per year. | NR0401-01 - Gross global Scope 1 emissions, percentage covered under a regulatory program<br><br>NR0401-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets, and an analysis of performance against those targets |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Valero Energy - Form 10-K for FY 2015** | **Statoil - Form 20-F for FY 2015** | |
| Oil & Gas – Refining & Marketing | Health, safety & emergency management | A significant interruption in one or more of our refineries could adversely affect our business.<br><br>Our refineries are our principal operating assets. As a result, our operations could be subject to significant interruption if one or more of our refineries were to experience a major accident or mechanical failure, be damaged by severe weather or other natural or man-made disaster, such as an act of terrorism, or otherwise be forced to shut down. If any refinery were to experience an interruption in operations, earnings from the refinery could be materially adversely affected (to the extent not recoverable through insurance) because of lost production and repair costs. Significant interruptions in our refining system could also lead to increased volatility in prices for crude oil feedstocks and refined products, and could increase instability in the financial and insurance markets, making it more difficult for us to access capital and to obtain insurance coverage that we consider adequate. | Statoil uses serious incident frequency (SIF) as a key indicator to monitor safety performance. This indicator (number of serious incidents, including near misses, per million hours worked) combines actual consequences of incidents and the potential for incidents to develop into serious or major accidents. The SIF has significantly improved over the last years, from 1.1 incidents per million hours worked in 2011 to 0.6 incidents per million hours worked in 2015.<br><br>Total recordable injuries per million hours worked (TRIF) improved from 3.0 in 2014 to 2.7 in 2015. The TRIF for Statoil's employees was 2.3 and the TRIF for Statoil's contractors was 2.8. | NR0103-09 - (1) Total Recordable Injury Rate (TRIR), (2) Fatality Rate, and (3) Near Miss Frequency Rate for (a) full-time employees and (b) contract employees<br><br>NR0103-10 - Process Safety Event (PSE) rates for Loss of Primary Containment (LOPC) of greater consequence (Tier 1) and lesser consequence (Tier 2). |
| | | **Chevron Corp - Form 10-K for FY 2015** | **Statoil - Form 20-F for FY 2015** | |
| Oil & Gas – Refining & Marketing | Water Management | The company's operations could be disrupted by natural or human causes beyond its control<br><br>... Chevron's risk management systems are designed to assess potential physical and other risks to its operations and assets and to plan for their resiliency. While capital investment reviews and decisions involve uncertainty analysis, which incorporates potential ranges of physical risks such as storm severity and frequency, sea level rise, air and water temperature, precipitation, fresh water access, wind speed, and earthquake severity, among other factors, it is difficult to predict with certainty the timing, frequency or severity of such events, any of which could have a material adverse effect on the company's results of operations or financial condition. | Changes in physical climate parameters could impact the costs of Statoil's operations, for example through restrained water availability and prolonged droughts, or through increasing frequency of other extreme weather events.<br><br>… Statoil is committed to using resources efficiently and strives to apply high standards for waste management, emissions to air and impact on ecosystems – in all operations. Statoil's fresh water consumption decreased from 14.8 million cubic metres in 2014 to 14.5 million cubic metres in 2015. Improving water efficiency in the onshore activities in North America through means such as water recycling and substituting fresh water with brackish water, is a priority. | NR0103-05 - Total fresh water withdrawn, percentage recycled, percentage in regions with High or Extremely High Baseline Water Stress |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Steel Dynamics - Form 10-K for FY 2015** | **ArcelorMittal - Form 20-F for FY 2015** | |
| Iron & Steel Producers | Energy Management | The cost and availability of electricity and natural gas are also subject to volatile market conditions.<br><br>Steel producers like us consume large amounts of energy, inasmuch as mini-mills melt ferrous scrap in electric arc furnaces and use natural gas to reheat steel or steel billets for rolling into finished products. We rely on third parties for the supply of energy resources we consume in our steelmaking activities. The prices for and availability of electricity, natural gas, oil and other energy resources are also subject to volatile market conditions, often affected by weather conditions as well as political and economic factors beyond our control. As large consumers of electricity and gas, we must have dependable delivery in order to operate. Accordingly, we are at risk in the event of an energy disruption | Energy efficiency is not only an effective first response to reducing carbon emissions, it also reduces costs, not only for the Company but those who make use of its steel.<br><br>… In the U.S., the Company has ongoing activities in place with the aim of reducing energy consumption at all of its facilities by one per cent each year over the next ten years through a special Department of Energy initiative. In 2014, 24 energy projects were completed which saved the Company approximately $20.4 million. In 2015, five major projects came online that are expected to save the Company over $7 million yearly. The Company continues to work towards both the goal of reducing energy intensity by ten per cent by 2023 and reducing yearly energy costs. In the Europe segment, the Energize program is on track to meet its target of a 12% savings in energy intensity between 2011 and 2016. | NR0301-04 - Total purchased electricity consumed, percentage renewable.<br><br>NR0301-05 - Total fuel consumed, percentage from: (1) coal, (2) natural gas, (3) renewable sources |

## Services Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Starbucks Corporation - Form 10-K for FY 2013** | **Yum! Brands - Form 10-K for FY 2013** | |
| Restaurants | Food Safety | Incidents involving food-borne illnesses, food tampering, food contamination or mislabeling, whether or not accurate, as well as adverse public or medical opinions about the health effects of consuming our products, could harm our business.<br><br>… Any report linking us to the use of unclean water, food-borne illnesses or food tampering, contamination, mislabeling or other food-safety issues could damage our brand value and severely hurt sales of our beverages and food products, and possibly lead to product liability claims, litigation (including class actions) or damages. | In late December 2012 our KFC China sales began to be negatively impacted by intense media attention surrounding an investigation by the Shanghai FDA (SFDA) into poultry supply management at our China Division. In January 2013 the SFDA concluded its investigation and released its recommendations to Yum! China. During 2013 our team in China undertook a comprehensive review of our supply chain, incorporated the SFDA's recommendations and, as part of our commitment to quality, took additional steps to further strengthen our overall poultry supply chain practices, including increased testing of product received from suppliers. | SV0203-05 - Percentage of restaurants inspected by a food safety oversight body, percentage receiving critical violation<br><br>SV0203-06 - Number of recalls, total amount of food product recalled.<br><br>SV0203-07 - Number of confirmed foodborne illness outbreaks, percentage resulting in CDC investigation. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | … KFC China sales were further negatively impacted beginning in April of 2013 by the intense media surrounding avian flu in China. The combined impacts of the media attention surrounding the SFDA investigation and avian flu resulted in a 13% decline in China Division same-store sales for the full year. Operating Profit for 2013 declined 26%, prior to foreign currency translation, due primarily to sales de-leverage at KFC. | |
| | | **Yum! Brands - Form 10-K for FY 2013** | **Darden Restaurants - Form 10-K for FY 2013/2014** | |
| Restaurants | Nutritional Content | We could be party to litigation that could adversely affect us by increasing our expenses or subjecting us to significant monetary damages and other remedies.<br><br>… In addition, the restaurant industry has been subject to claims that relate to the nutritional content of food products, as well as claims that the menus and practices of restaurant chains have led to the obesity of some customers. We may also be subject to this type of claim in the future and, even if we are not, publicity about these matters (particularly directed at the quick service and fast-casual segments of the industry) may harm our reputation and adversely affect our results. | Health and Wellness<br><br>In September 2011, we announced a comprehensive health and wellness commitment to reduce our calorie and sodium footprints and to provide greater choice and variety on our children's menus. Across our brands, we are working toward a 10 percent reduction of calories and sodium over five years and a 20 percent reduction of calories and sodium over 10 years. And we are establishing specific nutrition standards to guide the development of our children's meals to simplify parental search for healthier options that their children enjoy. | SV0203-08 - Percentage of meal options consistent with the Dietary Guidelines for Americans or foreign equivalent, sales from these options<br><br>SV0203-09 - Percentage of children's meal options consistent with national dietary guidelines for children or foreign equivalent, sales from these options. |
| | | **Hilton Worldwide - Form 10-K for FY 2013** | **Marriot International - Form 10-K for FY 2013** | |
| Hotels & Lodging | Energy & Water Management | We are subject to the business, financial and operating risks inherent to the hospitality industry, any of which could reduce our revenues and limit opportunities for growth.<br><br>… changes in operating costs, including energy, food, compensation, benefits and insurance | Environmental Responsibility and "Green" Hotels.<br><br>Our sustainability strategy supports business growth and reaches beyond our hotels to preserve and protect our planet's natural resources. Marriott's environmental goals are to: (1) further reduce energy and water consumption by 20% by 2020; (2) empower our hotel development partners to build green hotels; (3) green our multi-billion dollar supply | SV0201-01 - Total energy consumed, percentage grid electricity, percentage renewable<br><br>SV0201-02 - Total water withdrawn, percentage recycled, percentage in regions with High or Extremely High Baseline Water Stress. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | chain; (4) educate and inspire associates and guests to conserve and preserve; and (5) address environmental challenges through innovative conservation initiatives including rainforest protection and water conservation.<br><br>… Working in partnership with the U.S. Green Building Council (USGBC) for Leadership in Energy and Environmental Design (LEED®) and the Green Building Certification Institute (GBCI), Marriott is empowering our hotel development partners to build green hotels. In 2011, we developed the first LEED Volume Program (LVP) to provide a streamlined path to certification for the hospitality industry through a green hotel prototype. The LEED Volume Program that Marriott offers can save our owners 25 percent in energy and water consumption for the life of their buildings and should recover their initial investment in two to six years. Marriott has more than 110 LEED-certified buildings, with more in the development pipeline. | |
| | | **Boyd Gaming Corp. - Form 10-K for FY 2013** | **Caesar's Entertainment- Form 10-K for FY 2013** | |
| Casinos & Gaming | Energy Management | Energy price increases may adversely affect our cost of operations and our revenues.<br><br>Our casino properties use significant amounts of electricity, natural gas and other forms of energy. In addition, our Hawaiian air charter operation uses a significant amount of jet fuel. While no shortages of energy or fuel have been experienced to date, substantial increases in energy and fuel prices, including jet fuel prices, in the United States have, and may continue to, negatively affect our results of operations. The extent of the impact is subject to the magnitude and duration of the energy and fuel price increases, of which the impact could be material. In addition, energy and gasoline price increases could result in a decline of disposable income of potential customers, an increase in the cost of travel | As part of our Code of Commitment, we accept our duty to help preserve the planet for current and future generations. For the past five years, we have been advancing a strategy to reduce our effect on the environment in our main areas of impact. Our multi-year strategy, CodeGreen, is a structured, data-driven and disciplined program that leverages the passion of our employees and engages our guests and suppliers. Since our baseline year of 2007, we have reduced energy consumption across all our properties by more than 18%, and greenhouse gas emissions by more than 20%, both on an air-conditioned square foot basis, and we reduced absolute water consumption by 7%. Nearly 25% of our total waste was recycled in 2012. Additionally, we have received Green Key certifications at all 31 of our properties with | SV0202-01 - Total energy consumed, percentage grid electricity, percentage renewable |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | and a corresponding decrease in visitation and spending at our properties, which could have a significant adverse effect on our business, financial condition and results of operations. | hotels in North America, most at the four key level. | |
| | | **Norwegian Cruise Lines - Form 10-K for FY 2013** | **Carnival Corp. - Form 10-K for FY 2013** | |
| Cruise Lines | Fuel Use & Air Emissions | We are subject to complex laws and regulations, including environmental laws and regulations, which could adversely affect our operations and any changes in the current laws and regulations could lead to increased costs or decreased revenue.<br><br>… The U.S. and various state and foreign government and regulatory agencies have enacted or are considering new environmental regulations and policies, such as requiring the use of low-sulfur fuels, increasing fuel efficiency requirements and further restricting emissions, including those of green-house gases. Compliance with such laws and regulations may entail significant expenses for ship modification and changes in operating procedures which could adversely impact our operations as well as our competitors' operations. | Maritime Environmental Regulation<br><br>… Our environmental efforts are focused on, among other things, reducing emissions such as greenhouse gases ("GHGs")... sulfur oxide ("SOx") and nitrogen oxide ("NOx"). These emissions result from the combustion of the marine fuels consumed by our ships, which accounts for substantially all of our total GHG and other emissions. Further, reducing fuel consumption continues to be one of our most important cross-brand initiatives, which has and will continue to help reduce emissions and mitigate the impact of high fuel prices. We have and will continue to implement our energy-saving strategy through our environmental management systems. This strategy includes installing some of the best available energy reduction technologies on our ships, such as propulsion and cooling systems, and evaluating alternative fuels and emission reduction technologies. In addition, we are designing more energy efficient ships that will enter our fleet in the future, while continuing to reduce the fuel consumption of our existing fleet.<br><br>We measure our ability to use direct energy efficiently by calculating the amount of primary source energy we consume. We have achieved a 21% cumulative reduction in unit fuel consumption since 2007 and look to further manage and reduce our fuel consumption costs in the future. We control our GHG and other emissions by managing our energy consumption. Our ship fuel consumption and emission rates and our total ship fuel GHG emissions are as follows:<br><br>*[SEE TABLE ON PAGE 23]* | SV0205-01 - Gross global Scope 1 emissions<br><br>SV0205-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions-reduction targets, and an analysis of performance against those targets<br><br>SV0205-03 - Total energy consumed, percentage from (1) heavy fuel oil, (2) onshore power supply (OPS), and (3) renewables<br><br>SV0205-04 - Air emissions for the following pollutants: NOx , SOx , and particulate matter (PM)<br><br>SV0205-05 - Average Energy Efficiency Design Index (EEDI) for new ships. |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Walt Disney Company - Form 10-K for FY 2012/2013** | **Vail Resorts - Form 10-K for FY 2013/2014** | |
| Leisure Facilities | Energy Management | The businesses in the Parks and Resorts segment generate revenues predominately from the sale of admissions to theme parks; sales of food, beverage and merchandise; charges for room nights at hotels; sales of cruise vacation packages; and sales and rentals of vacation club properties. Significant costs include … utilities… | Environmental Stewardship and Social Responsibility<br><br>Environmental stewardship is a core philosophy for us. Our resorts operate in some of the world's greatest natural environments, and we are compelled to care for and conserve them. Through our sustainability program, we focus on resource conservation, forest health and building stronger local communities through contributions to local non-profits. Our environmental stewardship efforts are diverse and touch nearly every area of our operations. One of the most encompassing programs is our commitment to energy reduction. After reaching an initial goal to reduce our energy consumption by 10%, we have set a new goal of another 10% reduction by 2020. | SV0204-01 - Total energy consumed, percentage grid electricity, percentage renewable |

## Resource Transformation Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Braskem S.A. - Form 20-F for FY 2015** | **E. I. Du Pont de Nemours and Company - Form 10-K for FY 2015** | |
| Chemicals | Product Design for Use-phase Efficiency | Chemical Distribution Unit<br><br>… Our Chemical Distribution Unit distributes a large and diverse portfolio of products consisting of more than 1,000 products. We classify the products distributed by our Chemical Distribution Unit as:<br><br>· solvents, including aliphatic solvents, aromatic solvents, synthetic solvents and ecologically-friendly solvents (having lower toxicity and greater biodegradability than standard solvents) … | Business Segments<br><br>... DuPont Sustainable Solutions, within the company's Safety & Protection segment, is comprised of two business units: clean technologies and consulting solutions. Effective January 1, 2016, the clean technologies business unit will become part of the Industrial Biosciences segment with the focus on working with customers to improve the performance, productivity and sustainability of their products and processes. The company will explore a range of options to maximize the growth of the consulting solutions business unit which effective January 1, 2016 will be reported within Other. Sustainable solutions net sales accounted for about 2 percent of the company's | RT0101-14 - Revenue from products designed for use-phase resource efficiency |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | total consolidated net sales for the years ended December 31, 2015, 2014 and 2013, respectively. | |
| | | **Syngenta - Form 10-K for FY 2015** | **E. I. Du Pont de Nemours and Company - Form 10-K for FY 2015** | |
| Chemicals | Greenhouse Gas Emissions | Overview<br><br>… In future years, climate change may have both positive and negative impacts on Syngenta's results.… Legislation may be enacted in the future that limits carbon dioxide emissions in the manufacture of Syngenta's products or increases the costs associated with such emissions. Syngenta works actively to make its production operations more energy efficient and to reduce the rate of carbon dioxide emissions per unit of sales revenue. | Climate Change<br><br>The company believes that climate change is an important global issue that presents risks and opportunities. Expanding upon significant global greenhouse gas (GHG) emissions and other environmental footprint reductions made in the period 1990-2010, as of 2014 the company reduced its environmental footprint, achieving reductions of 9 percent in GHG emissions intensity and 8 percent in water consumption versus a 2010 baseline. In addition, as of 2014, the company achieved an 11 percent reduction in energy intensity from non-renewable resources versus a 2010 baseline. The company continuously evaluates opportunities for existing and new product and service offerings in light of the anticipated demands of a low-carbon economy. | RT0101-01 - Gross global Scope 1 emissions, percentage covered under a regulatory program<br><br>RT0101-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emission-reduction targets and an analysis of performance against those targets |
| | | **LyondellBasell Industries N.V. - Form 10-K for FY 2015** | **Braskem S.A. - Form 20-F for FY 2015** | |
| Chemicals | Water Management | Costs and limitations on supply of raw materials and energy may result in increased operating expenses.<br><br>… Additionally, there is growing concern over the reliability of water sources, including around the Texas Gulf Coast where several of our facilities are located. The decreased availability or less favorable pricing for water as a result of population growth, drought or regulation could negatively impact our operations. | Compliance with Environmental Laws in Brazil<br><br>… Additionally, we have a series of recycling programs that includes recycling of solid waste and wastewater. We recycle or reuse 26.8% of the solid waste generated by our facilities and 28.2% of the water used in our production processes. | RT0101-07 - (1) Total water withdrawn, percentage in regions with High or Extremely High Baseline Water Stress and (2) percentage recycled water usage |
| | | **Gen Cable Corporation - Form 10-K for FY 2015** | **Ingersoll-Rand - Form 10-K for FY 2015** | |
| Electrical & Electronic Equipment | Product Lifecycle Management & Innovation for | Changes in the legislative environment could affect the growth and other aspects of important markets served by us. The wire and cable industry growth has been partially driven | Global climate change and related regulations could negatively affect our business. | RT0202-07 - Percentage of eligible products by revenue that meet ENERGY STAR® criteria<br>Quantitative |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | Environmental Efficiency | by energy related legislation, including alternative and renewable energy sources, investment incentives for utilities and government infrastructure spending. We cannot predict the impact, positive or negative, of legislative efforts or changes in laws or industry standards on our future financial results, cash flows or financial position. | We have committed to increase energy efficiency and reduce our climate impact with operational and product-related climate targets, including among other initiatives: ... (ii) $500 million investment in product-related research and development from 2015-2020 to fund the long-term reduction of greenhouse gas emissions… | RT0202-08 - Revenue from renewable energy-related and energy efficiency-related products |
| | | **Sealed Air Corporation - Form 10-K for FY 2015** | **Packaging Corporation - Form 10-K for FY 2015** | |
| Containers & Packaging | Energy Management | Raw material pricing, availability and allocation by suppliers as well as energy-related costs may negatively impact our results of operations, including our profit margins.<br><br>We use petrochemical-based raw materials to manufacture many of our products. The prices for these raw materials are cyclical, and increases in market demand or fluctuations in the global trade for petrochemical- based raw materials and energy could increase our costs. | Energy supply. Energy at our packaging mills is obtained through purchased or self-generated fuels and electricity. Fuel sources include natural gas, by-products of the containerboard manufacturing and pulping process (including black liquor and wood waste), purchased wood waste, coal, and oil. Each of our mills self-generates process steam requirements from by-products (black liquor and wood waste), as well as from the various purchased fuels. The process steam is used throughout the production process and also to generate electricity.<br><br>In 2015, our packaging mills consumed about 59 million MMBTU's of fuel to produce both steam and electricity. Of the 59 million MMBTU's consumed, about 59% was from mill generated by-products, and 41% was from purchased fuels. Of the 41% in purchased fuels, 54% was from natural gas, 32% was from purchased wood waste, and 14% was from coal and other purchased fuels. | RT0204-04 - Total energy consumed, percentage grid electricity, percentage renewable |
| | | **Sealed Air Corporation - Form 10-K for FY 2015** | **Crown Holdings – Form 10-K for FY 2015** | |
| Containers & Packaging | Product Lifecycle Management | Environmental, Health and Safety Matters<br><br>… In some jurisdictions in which our packaging products are sold or used, laws and regulations have been adopted or proposed that seek to regulate, among other things, minimum levels of recycled or reprocessed content and, more generally, the sale or disposal of packaging materials. We maintain programs designed to | ENVIRONMENTAL MATTERS<br><br>… The Company is dedicated to a long-term environmental protection program and has initiated and implemented many pollution prevention programs with an emphasis on source reduction. The Company continues to reduce the amount of metal used in the manufacture of steel and aluminum containers through "lightweighting" programs. The | RT0204-10 - Percentage of raw materials from (1) recycled content (2) renewable resources<br><br>RT0204-11 - Revenue from products that are reusable, recyclable, and/or compostable |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | comply with these laws and regulations and to monitor their evolution. | Company recycles nearly 100% of scrap aluminum, steel and copper used in its manufacturing processes. Many of the Company's programs for pollution prevention reduce operating costs and improve operating efficiencies. | RT0204-12 - Description of strategies to reduce the environmental impact of packaging throughout its lifecycle |
| | | **Boeing - Form 10-K for FY 2015** | **General Dynamics - Form 10-K for FY 2015** | |
| Aerospace & Defense | Fuel Economy & Use-phase Emissions | Airline Industry Environment<br><br>… Airline financial performance also plays a role in the demand for new capacity. Airlines continue to focus on increasing revenue through alliances, partnerships, new marketing initiatives, and effective leveraging of ancillary services and related revenues. Airlines are also relentlessly focusing on reducing costs by renewing fleets to leverage more efficient airplanes and in 2015 benefited significantly from lower fuel costs | Our Aerospace group is at the forefront of the business-jet industry. We deliver a family of Gulfstream aircraft, provide aircraft services and perform completions for aircraft produced by other original equipment manufacturers (OEMs).<br><br>… Gulfstream has an ongoing environmental sustainability program, including the use of renewable fuels. In 2015, we finalized an industry-first, three-year agreement that provides Gulfstream with a consistent supply of renewable fuels for daily flight operations from its headquarters in Savannah, Georgia. Each gallon of renewable fuel burned is expected to achieve a more than 50-percent reduction in greenhouse gas emissions on a lifecycle basis, relative to petroleum-based jet fuel. | RT0201-09 - Revenue from alternative energy-related products<br><br>RT0201-10 - Discussion of strategies and approach to address fuel economy and greenhouse gas emissions of products |
| | | **Deere & Company- Form 10-K for FY 2015** | **Cummins Inc. - Form 10-K for FY 2015** | |
| Industrial Machinery & Goods | Fuel Economy & Emissions in Use-phase | ENVIRONMENTAL MATTERS<br><br>… The U.S. Environmental Protection Agency has issued stringent emissions regulations for off-road engines, and governmental agencies throughout the world are similarly enacting more stringent laws to reduce off-road engine emissions. John Deere has achieved and plans to continue to achieve compliance with these regulations through significant investments in the development of new engine technologies and after-treatment systems. Compliance with emissions regulations has added and will continue to add to the cost of John Deere's products. | Product Environmental Compliance<br><br>… We received certification from the EPA that we met both the EPA 2013 and 2014 greenhouse gas (GHG) regulations and rules. The EPA 2013 regulations add the requirement of On-Board Diagnostics, which were introduced on the ISX15 in 2010, across the full on-highway product line in 2013 in addition to maintaining the same near-zero emission levels of NOx and Particulate Matter (PM) required in 2010. On-Board Diagnostics provide enhanced service capability with standardized diagnostic trouble codes, service tool interface, in-cab warning lamp and service information availability. The new GHG and fuel-efficiency regulations were required for all heavy-duty diesel and natural gas engines beginning in January 2014. Our GHG | RT0203-03 - Sales-weighted fleet fuel efficiency for medium- and heavy-duty vehicles.<br><br>RT0203-04 - Sales-weighted fuel efficiency for non-road equipment<br><br>RT0203-06 - Sales-weighted emissions of (a) NOx and (b) PM for: (1) marine diesel engines, (2) locomotive diesel engines, and (3) other non-road diesel engines |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | certification was the first engine certificate issued by the EPA and uses the same proven base engine with the XPI fuel system, Variable Geometry Turbocharger (VGTTM), Cummins Aftertreatment System with DPF and SCR technology. | |

## Consumption I – Food & Beverage Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Dr. Pepper Snapple - Form 10-K for FY 2014** | **Coca-Cola FEMSA - Form 20-F for FY 2014** | |
| Non-Alcoholic Beverages | Health & Nutrition | We may not effectively respond to changing consumer preferences, trends, health concerns and other factors.<br><br>Consumers' preferences can change due to a variety of factors, including the age and ethnic demographics of the population, social trends, negative publicity, economic downturn or other factors. For example, consumers are increasingly concerned about health and wellness, focusing on the caloric intake associated with regular CSDs and the use of artificial sweeteners in diet CSDs. As such, the demand for CSDs has decreased as consumers have shifted towards NCBs, such as water, ready-to-drink teas and sports drinks. If we do not effectively anticipate these trends and changing consumer preferences, then quickly develop new products in response, our sales could suffer. Developing and launching new products can be risky and expensive. We may not be successful in responding to changing markets and consumer preferences, and some of our competitors may be better able to respond to these changes, either of which could negatively affect our business and financial performance. | In our company we are conscious that weight issues and obesity are worldwide health problems, which need a collective effort for their solution. We believe that neither beverages nor any other product by itself is the direct cause of these problems, as they are complicated issues related to dietary habits and physical activity. However, as industry leaders, we would like to be a part of the solution. That is why we are committed to find, together with public and private institutions of the countries in which we operate, a comprehensive solution to this problem. Through innovation, we have developed new products and expanded the availability of low or zero calorie beverages as well as bottled water. Approximately 40% of our brands are calorie free or low- or non-caloric beverages. In addition, we inform our consumers through front labeling on nutrient composition and caloric content of our beverages. | CN0201-05 - Revenue from (1) zero- and low-calorie, (2) no-added-sugar, and (3) artificially sweetened beverages<br><br>CN0201-06 - Description of the process to identify and manage products and ingredients of concern and emerging dietary preferences |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **PepsiCo Inc. - Form 10-K for FY 2014** | **The Coca-Cola Company - Form 10-K for FY 2014** | |
| Non-Alcoholic Beverages | Water Management | Our business, financial condition or results of operations may be adversely affected by increased costs, disruption of supply or shortages of raw materials and other supplies.<br><br>… Water is also a limited resource in many parts of the world. The lack of available water of acceptable quality and increasing pressure to conserve water in areas of scarcity and stress may lead to supply chain disruption, adverse effects on our operations or higher production costs that could adversely affect our business, financial condition or results of operations. | Water Quality and Quantity<br><br>Our Company has a robust water stewardship and management program and continues to work to improve water use efficiency, treat wastewater prior to discharge and achieve our goal of replenishing the water that we and our bottling partners source and use in our finished products. We regularly assess the specific water-related risks that we and many of our bottling partners face and have implemented a formal water risk management program. We are actively collaborating with other companies, governments, nongovernmental organizations and communities to advocate for needed water policy reforms and action to protect water availability and quality around the world. We are working with our global partners to develop and implement sustainability-related water projects that address local needs. We are encouraging improved water efficiency and conservation efforts throughout our system. Through these integrated programs, we believe that our Company is in an excellent position to leverage the water-related knowledge we have developed in the communities we serve — through source water availability assessments and planning, water resource management, water treatment, wastewater treatment systems and models for working with communities and partners in addressing water and sanitation needs. As demand for water continues to increase around the world, we expect commitment and continued action on our part will be crucial to the successful long-term stewardship of this critical natural resource. | CN0201-03 - (1) Total water withdrawn and (2) total water consumed, percentage of each in regions with High or Extremely High Baseline Water Stress |
| | | **Boston Beer - Form 10-K for FY 2014** | **Diageo - Form 10-K for FY 2014** | |
| Alcoholic Beverages | Responsible Drinking & Marketing | Changes in Public Attitudes and Drinker Tastes Could Harm the Company's Business. Regulatory Changes in Response to Public Attitudes Could Adversely Affect the Company's Business. | We will continue to work with others to implement programmes that tackle misuse in ways that go beyond these Commitments. The choice of programme in each market reflects local stakeholder concerns but our focus is | CN0202-07 - Description of efforts to promote responsible consumption of alcohol |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | The alcoholic beverage industry has become the subject of considerable societal and political attention in recent years, due to increasing public concern over alcohol-related social problems, including driving under the influence, underage drinking and health consequences from the misuse of alcohol, including alcoholism. As an outgrowth of these concerns, the possibility exists that advertising by beer producers could be restricted, that additional cautionary labeling or packaging requirements might be imposed, that further restrictions on the sale of alcohol might be imposed or that there may be renewed efforts to impose increased excise or other taxes on beer sold in the United States. | always on initiatives that can be shown to shift awareness, attitudes and behaviour.<br><br>This year, Diageo supported 373 programmes, including Commitments programmes in 53 countries, many of which have been evaluated to show measurable effects on awareness, attitudes and behaviour. Johnnie Walker's Join the Pact campaign has a goal to give one million kilometres of safe rides home to consumers across the globe who have pledged never to drink and drive. So far it has given about 423,025 rides, representing around 265,491 kilometres. | |
| | | **AmBev SA - Form 10-K for FY 2014** | **Diageo - Form 10-K for FY 2014** | |
| Alcoholic Beverages | Water Management | Climate change, or legal, regulatory or market measures to address climate change, may negatively affect our business or operations, and water scarcity or poor quality could negatively impact our production costs and capacity.<br><br>... We also face water scarcity and quality risks. The availability of clean water is a limited resource in many parts of the world, facing unprecedented challenges from climate change and the resulting change in precipitation patterns and frequency of extreme weather, overexploitation, increasing pollution, and poor water management. We have implemented an internal strategy in order to considerably reduce the use of water in our operative plants, however, as demand for water continues to increase around the world, and as water becomes scarcer and the quality of available water deteriorates, we may be affected by increasing production costs or capacity constraints, which could adversely affect our business and results of operations. | Water is the main ingredient in all of Diageo's brands. To sustain our production growth around the world and respond to the growing global demand for water, Diageo aims to improve water use efficiency and minimise the amount of water used at production sites, particularly in water-stressed areas.<br><br>Performance: Diageo used 6.9 litres of water to produce one litre of packaged product, a 2.4% decrease from 2013. While some savings are the result of major investments, most come from operational improvements related to equipment, processes, culture and behaviours. | CN0202-02 - (1) Total water withdrawn and (2) total water consumed, percentage of each in regions with High or Extremely High Baseline Water Stress |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Archer Daniels Midland - Form 10-K for FY 2014** | **Fresh Del Monte - Form 10-K for FY 2014** | |
| Agricultural Products | Water Withdrawal | … In addition, if certain non-agricultural commodity raw materials, such as water or certain chemicals used in the Company's processing operations, are not available, the Company's business could be disrupted. Any major lack of available water for use in certain of the Company's processing operations could have a material adverse impact on operating results. Certain factors which may impact the availability of non-agricultural commodity raw materials are out of the Company's control including, but not limited to, disruptions resulting from weather, economic conditions, manufacturing delays or disruptions at suppliers, shortage of materials, and unavailable or poor supplier credit conditions. | We have experienced crop disease, insect infestation, severe weather and other adverse environmental conditions from time to time, including hurricanes, droughts, floods and earthquakes in our sourcing locations. Severe weather conditions may occur with higher frequency or may be less predictable in the future due to the effects of climate change. When crop disease, insect infestations, severe weather, earthquakes and other adverse environmental conditions destroy crops planted on our farms or our suppliers' farms or prevent us from exporting them on a timely basis, we may lose our investment in those crops or our purchased fruit cost may increase.<br><br>… [Our] Asset impairment and other charges, net, was $11.2 million in 2014 compared with $37.1 million in 2013… Asset impairments and other charges (credits), net, for 2014 were: … $1.3 million asset impairment charge related to the adverse effect to our non-tropical fruit plantations of continued drought conditions in Chile in the other fresh produce segment. | CN0101-06 - (1) Total water withdrawn and (2) total water consumed, percentage of each in regions with High or Extremely High Baseline Water Stress<br><br>CN0101-07 - Discussion of water withdrawal risks and description of management strategies and practices to mitigate those risks |
| | | **Bunge Ltd. - Form 10-K for FY 2014** | **Adecoagro SA - Form 20-F for FY 2014** | |
| Agricultural Products | Climate Change Impacts on Crop Yields | Adverse weather conditions, including as a result of future climate change, may adversely affect the availability, quality and price of agricultural commodities and agricultural commodity products, as well as our operations and operating results.<br><br>… Our sugar production depends on the volume and sucrose content of the sugarcane that we cultivate or that is supplied to us by third-party growers. Both sugarcane crop yields and sucrose content depend significantly on weather conditions, such as rainfall and prevailing temperatures, which can vary substantially. For example, droughts and other adverse weather conditions in the Center-South of Brazil have resulted in reduced crop yields across the region in recent years | Unpredictable weather conditions, pest infestations and diseases may have an adverse impact on agricultural production and may reduce the volume and sucrose content of sugarcane that we can cultivate and purchase in a given harvest.<br><br>… We experienced drought conditions during the first half of 2013 in the countries where we operate, which resulted in a reduction of approximately 21% to 31% in our yields for the 2012/2013 harvest, for corn and soybean, compared with our historical averages. The actual yields following the drought generated a decrease in Initial Recognition and Changes in Fair Value of Biological Assets and Agricultural Produce in respect of corn, soybean and the remaining crops of $5.9 million, $16.6 million | CN0101-21 - Average crop yield and five-year standard deviation per major crop type by major operating region<br><br>CN0101-22 - Identification of principal crops and discussion of risks and opportunities presented by climate change |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | and $2.7 million, respectively, for the year ended December 31, 2013. | |
| | | **Pilgrim's Pride - Form 10-K for FY 2014** | **Industrias Bachoco - Form 20-F for FY 2014** | |
| Meat, Poultry & Dairy | Food Safety | If our poultry products become contaminated, we may be subject to product liability claims and product recalls.<br><br>Poultry products may be subject to contamination by disease-producing organisms, or pathogens, such as Listeria monocytogenes, Salmonella and generic E.coli. These pathogens are generally found in the environment, and, as a result, there is a risk that, as a result of food processing, they could be present in our processed poultry products. These pathogens can also be introduced as a result of improper handling at the further processing, foodservice or consumer level. These risks may be controlled, although not eliminated, by adherence to good manufacturing practices and finished product testing. We have little, if any, control over proper handling once the product has been shipped. Illness and death may result if the pathogens are not eliminated at the further processing, foodservice or consumer level. Even an inadvertent shipment of contaminated products is a violation of law and may lead to increased risk of exposure to product liability claims, product recalls and increased scrutiny by federal and state regulatory agencies and may have a material adverse effect on our business, reputation and prospects. | During 2013, the Company informed the National Service of Sanity, Safety and Food Quality (SENASICA, by its Spanish acronym) the presence of a H7N3 avian flu outbreak in some of the Company's farms located in the state of Guanajuato and in the limits of the Jalisco and Guanajuato states. The financial effects derived from the outbreak were a charge to cost of sales in 2013 for $350,821 related to the destruction of birds and eggs inventory. | CN0102-11 - Number of recalls issued, total weight of products recalled. |
| | | **Kraft Foods Group - Form 10-K for FY 2014** | **Campbell Soup Co. - Form 10-K for FY 2013/2014** | |
| Processed Foods | Food Safety | Product recalls or other product liability claims could materially and adversely affect us.<br><br>Selling products for human consumption involves inherent legal and other risks, including product contamination, spoilage, product tampering, allergens, or other adulteration. We could decide to, or be required to, recall products due to suspected or | Voluntary Product Recall<br><br>On November 8, 2013, the company voluntarily recalled a range of Plum products packaged in resealable pouches after discovering a manufacturing defect that may cause spoilage in some pouches. In the first quarter of 2014, the company recognized costs of $16 ($11 after tax or $.03 per share) associated with the | CN0103-08 - Notice of food safety violations received, percentage corrected<br><br>CN0103-09 - Number of recalls issued, total amount of food product recalled |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | confirmed product contamination, adulteration, misbranding, tampering, or other deficiencies. Product recalls or market withdrawals could result in significant losses due to their costs, the destruction of product inventory, and lost sales due to the unavailability of the product for a period of time. We could be adversely affected if consumers lose confidence in the safety and quality of certain food products or ingredients, or the food safety system generally. Adverse attention about these types of concerns, whether or not valid, may damage our reputation, discourage consumers from buying our products, or cause production and delivery disruptions. | recall, including estimates for customer returns and consumer rebates, costs associated with returned product and the disposal and write-off of inventory. | |
| | | **Mondelez International - Form 10-K for FY 2014** | **PepsiCo Inc. - Form 10-K for FY 2014** | |
| Processed Foods | Health & Nutrition | We must correctly predict, identify and interpret changes in consumer preferences and demand and offer new products to meet those changes.<br><br>… Prolonged negative perceptions concerning the health implications of certain food products could influence consumer preferences and acceptance of some of our products and marketing programs. For example, recently, consumers have increasingly focused on health and wellness, including weight management and reducing sodium and added sugar consumption. In addition, consumer preferences differ by region, and we must monitor and adjust our use of ingredients to respond to these regional preferences. We might be unsuccessful in our efforts to effectively respond to changing consumer preferences and social expectations. Continued negative perceptions and failure to satisfy consumer preferences could materially and adversely affect our reputation, product sales, financial condition and results of operations. | Continue to broaden the range of our product portfolio, including expanding our offerings of more nutritious products… We anticipate that the consumer demand for convenient, functional nutrition, fruits, vegetables, protein and value-added dairy, local and natural ingredients, and better-for-you snacking and beverage options will continue to grow as consumer tastes and preferences continue to evolve. To meet this growing demand, we plan to continue to grow our portfolio of more nutritious products as well as to reduce added sugar, sodium and saturated fat in certain key brands, while continuing to focus on the great taste consumers expect from our beverages, foods and snacks. At the end of 2014, approximately 20% of our net revenue came from our nutrition businesses. We expect that our increased investments in global research and development will enable us to continue to meet the growing demand for convenient, nutritious products and a broad variety of snack and beverage options. | CN0103-10 – Revenue from products labeled and/or marketed to promote health and nutrition attributes<br><br>CN0103-11 - Revenue from products that meet Smart Snacks in School criteria or foreign equivalent.<br><br>CN0103-12 - Description of the process to identify and manage products and ingredients of concern and emerging dietary preferences |

## Consumption II – Consumer Goods & Retailing Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Hanes Brands Inc. - Form 10-K for FY 2015** | **VF Corporation - Form 10-K for FY 2015** | |
| Apparel, Accessories & Footwear | Management of Chemicals in Products | Governmental Regulation and Environmental Matters<br><br>We are subject to U.S. federal, state and local laws and regulations that could affect our business, including those promulgated under the Occupational Safety and Health Act, the Consumer Product Safety Act, the Flammable Fabrics Act, the Textile Fiber Product Identification Act, the rules and regulations of the Consumer Products Safety Commission and various environmental laws and regulations. Some of our international businesses are subject to similar laws and regulations in the countries in which they operate. Our operations also are subject to various international trade agreements and regulations. While we believe that we are in compliance in all material respects with all applicable governmental regulations, current governmental regulations may change or become more stringent or unforeseen events may occur, any of which could have a material adverse effect on our financial position or results of operations. | Sustainability<br><br>VF's approach to Sustainability and Responsibility ("S&R") is to responsibly manage its business, from the way it makes, distributes and markets products to the ways it preserves the environment and supports local communities. In 2014, VF launched its inaugural S&R Report, a compilation of the many actions and investments taking place across VF for our businesses to operate in a sustainable manner. During 2015, VF continued to expand its global sustainability infrastructure and governance practices by requiring our top brands to report on their S&R practices and strategies on at least an annual basis.<br><br>… Other current initiatives include… iii) continuing our innovative approach to responsible chemical management in our supply chain via the CHEM-IQSM chemical management program, an industry-leading method that allows us to identify and eliminate harmful chemicals before they enter our manufacturing process. | CN0501-01 - Description of processes to maintain compliance with restricted substances regulations<br><br>CN0501-02 - Description of processes to assess and manage risks associated with chemicals in products |
| | | **L Brands - Form 10-K for FY 2015** | **PVH Corp - Form 10-K for FY 2015** | |
| Apparel, Accessories & Footwear | Labor Conditions in the Supply Chain | We may be impacted by our manufacturers' ability to manufacture and deliver products in a timely manner, meet quality standards and comply with applicable laws and regulations.<br><br>... Our business could also suffer if our third-party manufacturers fail to comply with applicable laws and regulations. While our internal and vendor operating guidelines promote ethical business practices and our employees periodically visit and monitor the operations of our third-party manufacturers, we do not control these manufacturers or their practices. The violation of labor, environmental or other laws by a third-party manufacturer | We require our manufacturers, and the manufacturers used by our licensees (and the licensees themselves), to operate in compliance with applicable laws, rules and regulations regarding working conditions, employment practices and environmental compliance. Additionally, we impose upon our business partners operating guidelines that require additional obligations in those areas in order to promote ethical business practices, and our staff and third parties we retain for such purposes periodically visit and monitor the operations of these independent parties to determine compliance. We are a signatory of the Accord on Fire and Building Safety in | CN0501-05 - Percentage of (1) tier 1 suppliers and (2) suppliers beyond tier 1 that have been audited to a labor code of conduct, percentage conducted by a third-party auditor<br><br>CN0501-06 - Priority non-conformance rate and associated corrective action rate for suppliers' labor code of conduct audits<br><br>CN0501-07 - Discussion of greatest (1) labor and (2) environmental, health, and safety risks in the supply chain |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | used by us, or the divergence of a third-party manufacturer's or partner's labor or environmental practices from those generally accepted as ethical or appropriate, could interrupt or otherwise disrupt the shipment or finished products to us or damage our reputation.<br><br>These risks could have a material adverse effect on our results of operations, financial condition and cash flows. | Bangladesh to improve fire and building safety in Bangladesh's apparel factories and we continue to collaborate with factories, suppliers, industry participants and other engaged stakeholders to improve the lives of our factory workers and others in our sourcing communities | |
| | | **Stanley Black & Decker - Form 10-K for FY 2015** | **Whirlpool Corp. - Form 10-K for FY 2015** | |
| Appliance Manufacturing | Product Safety | The Company's products could be recalled.<br><br>The Consumer Product Safety Commission or other applicable regulatory bodies may require the recall, repair or replacement of the Company's products if those products are found not to be in compliance with applicable standards or regulations. A recall could increase costs and adversely impact the Company's reputation. | As part of our ongoing effort to deliver quality products to consumers, we are currently investigating a limited number of potential quality and safety issues globally. As necessary, we undertake to effect repair or replacement of appliances in the event that an investigation leads to the conclusion that such action is warranted. As part of that process, in 2015, Whirlpool engaged in thorough investigations of incident reports associated with two of its dryer production platforms developed by Indesit, prior to Whirlpool's acquisition of Indesit in October 2014.<br><br>… In September 2015, we recorded a liability related to this corrective action. We estimate the most probable cost of the corrective action is €245 million (approximately $274 million as of September 30, 2015). Approximately 90% of the affected units were manufactured by Indesit prior to its acquisition by the Company in October 2014. | CN0601-01 - Number of recalls and total units recalled |
| | | **Mattel Inc. - Form 10-K for FY 2015** | **Hasbro Inc. - Form 10-K for FY 2015** | |
| Toys & Sporting Goods | Labor Conditions in the Supply Chain | Mattel's business depends in large part on the success of its vendors and outsourcers, and Mattel's brands and reputation may be harmed by actions taken by third-parties that are outside Mattel's control. In addition, any material failure, inadequacy, or interruption resulting from such vendors or outsourcings could harm Mattel's ability to effectively operate its business. | We require our third-party manufacturers to comply with our Global Business Ethics Principles, which are designed to prevent products manufactured for us from being produced under inhumane or exploitive conditions. Our Global Business Ethics Principles address a number of issues, including working hours and compensation, health and safety, and abuse and | CN0604-05 - Number of facilities audited to a social responsibility code of conduct.<br><br>CN0604-06 - Direct suppliers' social responsibility audit compliance: (1) priority non-conformance rate and associated corrective action rate and (2) other non-conformances rate and associated corrective action rate |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | As a part of its efforts to cut costs, achieve better efficiencies and increase productivity and service quality, Mattel relies significantly on vendor and outsourcing relationships with third parties for services and systems including manufacturing, transportation, logistics and information technology. Any shortcoming of a Mattel vendor or outsourcer, particularly an issue affecting the quality of these services or systems, may be attributed by customers to Mattel, thus damaging Mattel's reputation, and brand value, and potentially affecting its results of operations. | discrimination. In addition, we require that our products supplied by third-party manufacturers be produced in compliance with all applicable laws and regulations, including consumer and product safety laws in the markets where those products are sold. Hasbro has the right and exercises such right, both directly and through the use of outside monitors, to monitor compliance by our third-party manufacturers with our Global Business Ethics Principles and other manufacturing requirements. | |
| | | **Amazon.com Inc. - Form 10-K for FY 2015** | **Land's End Inc. - Form 10-K for FY 2015** | |
| E-Commerce | Logistics & Packaging Efficiency | We May Experience Significant Fluctuations in Our Operating Results and Growth Rate<br><br>… Our sales and operating results will also fluctuate for many other reasons, including due to risks described elsewhere in this section and the following:<br><br>… - increases in the prices of fuel and gasoline, as well as increases in the prices of other energy products and commodities like paper and packing supplies; | Sustainability Initiatives<br><br>… We select paper for use in our catalog materials based on ecological values, quality, availability and cost. Our catalog covers contain 10% post-consumer waste. The remainder of our catalog paper contains 100% chain-of-custody-certified fiber. This paper is third-party certified through programs such as the Forest Stewardship Council, the Sustainable Forestry Initiative and the Program for the Endorsement of Forest Certification. Between 2003 and 2015, use of corrugated cardboard packaging was reduced by 25%. In addition, the corrugated cardboard we use now contains a minimum of 60% recycled fiber. | CN0404-05 - Description of strategies to reduce the environmental impact of product delivery |
| | | **EBay Inc. - Form 10-K for FY 2015** | **JD.com Inc. - Form 20-F for FY 2015** | |
| E-Commerce | Employee Recruitment, Inclusion, and Performance | Our success largely depends on key personnel. Because competition for our key employees is intense, we may not be able to attract, retain, and develop the highly skilled employees we need to support our business. The loss of senior management or other key personnel could harm our business.<br><br>Our future performance depends substantially on the continued services of our senior management and other key personnel, including key engineering and product development personnel, and our ability to | We invest significant resources in the recruitment of employees in support of our fast-growing business operations. In 2015, we recruited additional employees in connection with the expansion of our fulfillment infrastructure and additional research and development personnel in connection with the expansion of our technology platform. We have established comprehensive training programs that cover such topics as our corporate culture, employee rights and responsibilities, team-building, professional behavior, job performance, management skills, | CN0404-10 - Employee engagement as a percentage<br><br>CN0404-11 - (1) Voluntary and (2) involuntary employee turnover rate |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | attract, retain, and motivate key personnel. Competition for key personnel is intense, especially in the Silicon Valley where our corporate headquarters are located, and we may be unable to successfully attract, integrate, or retain sufficiently qualified key personnel. In making employment decisions, particularly in the Internet and high-technology industries, job candidates often consider the value of the equity awards they would receive in connection with their employment and fluctuations in our stock price may make it more difficult to attract, retain, and motivate employees… | leadership and executive decision-making. We have a special dedicated training facility, JD Corporate University, to further strengthen our internal training programs. As of December 31, 2015, over 400 management trainees had undergone our dedicated management training program. We have also sponsored certain senior and mid-level management to attend part-time MBA education. In November 2013, we set up a "Go to College at Jingdong" program in collaboration with external educational and training institutions, offering tailored courses to our employees and allowing them to obtain a college degree through online education. To boost our strategy of exploring oversea markets, we also have been recruiting international management trainees from top universities in the United States. | |
| | | **Wal-Mart Stores- Form 10-K for FY 2014** | **Whole Foods - Form 10-K for FY 2014** | |
| Food Retailers & Distributors | Energy & Fleet Fuel Management | The Retail Industry<br><br>We operate in the highly competitive retail industry in all of the markets we serve. We face strong sales competition from other discount, department, drug, dollar, variety and specialty stores, warehouse clubs and supermarkets, as well as e-commerce and catalog businesses. Many of these competitors are national, regional or international chains or have a national or international online presence. We compete with a number of companies for prime retail site locations, as well as in attracting and retaining quality employees (whom we call "associates"). We, along with other retail companies, are influenced by a number of factors including, but not limited to: … fuel and energy costs. | We are committed to supporting wise environmental practices and being a leader in environmental stewardship. Since 2004, we have purchased over 4.3 billion kilowatt hours of wind-based renewable energy, earning seven Environmental Protection Agency ("EPA") Green Power awards. We have 17 stores and one distribution center using or hosting rooftop solar systems, four stores with fuel cells, two stores with rooftop farms, and one store with non-HFC refrigeration and a rooftop combined heat and power (CHP) system. We also have installed electric vehicle charging stations at more than 45 U.S. stores. We have made a commitment to reduce energy consumption at all of our stores by 25% per square foot by 2015, and we build our new stores with the environment in mind, using green building innovations whenever possible. Twenty-three of our stores have received Leadership in Energy and Environmental Design ("LEED") certification by the U.S. Green Building Council; 29 stores have earned Green Globes certification from the Green Building Initiative; and 45 stores have received GreenChill Certification awards from the EPA. | CN0401-04 - Operational energy consumed, percentage grid electricity, percentage renewable energy<br><br>CN0401-05 - Fleet fuel consumed, percentage renewable |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Kroger - Form 10-K for FY 2014** | **Whole Foods - Form 10-K for FY 2014** | |
| Food Retailers & Distributors | Product Labeling & Marketing | GOVERNMENT REGULATION<br><br>Our stores are subject to various laws, regulations, and administrative practices that affect our business. We must comply with numerous provisions regulating, among other things, health and sanitation standards, food labeling and safety, equal employment opportunity, minimum wages, and licensing for the sale of food, drugs, and alcoholic beverages | GMO Transparency<br>We believe that quality and transparency are inseparable, and providing detailed information about the products we sell is part of our mission. Accordingly, we announced in March 2013 that all food products in our stores in the U.S. and Canada must be labeled by 2018 to indicate whether they contain genetically modified organisms ("GMOs"). We are the first national grocery chain to set a deadline for full GMO transparency. Currently, we have thousands of products within our stores that are certified organic and/or Non-GMO Project™ verified. This includes over 8,000 products carrying the "Non-GMO Project Verified" seal. | CN0401-13 - Notices of violations received for non-conformance with regulatory labeling and/or marketing codes<br><br>CN0401-14 - Amount of legal and regulatory fines and settlements associated with food marketing and/or labeling<br><br>CN0401-15 - Revenue from products labeled as (1) containing genetically modified organisms (GMOs) and (2) non-GMO |
| | | **Costco Wholesale - Form 10-K for FY 2014** | **Home Depot Inc. - Form 10-K for FY 2014** | |
| Multiline and Specialty Retailers & Distributors | Energy Management in Retail & Distribution | Factors associated with climate change could adversely affect our business.<br><br>We use natural gas, diesel fuel, gasoline, and electricity in our distribution and warehouse operations. Increased U.S. and foreign government and agency regulations to limit carbon dioxide and other greenhouse gas emissions may result in increased compliance costs and legislation or regulation affecting energy inputs that could materially affect our profitability. In addition, climate change could affect our ability to procure needed commodities at costs and in quantities we currently experience. We also sell a substantial amount of gasoline, the demand for which could be impacted by concerns about climate change and which also could face increased regulation. | In fiscal 2014, our energy management team continued to implement strict operational standards that establish energy efficient practices in all of our U.S. facilities. These include HVAC unit temperature regulation and adherence to strict lighting schedules, which are the largest sources of energy consumption in our stores, as well as use of energy management systems in each store to monitor energy efficiency. We estimate that by implementing and utilizing these energy saving programs, we have saved over 8.6 billion kilowatt hours (kWh) since 2004. We set a goal to reduce our kWh per square foot in our U.S. stores by 20% by 2015. We met that goal in fiscal 2013, well in advance of our targeted date, and estimate a reduction of almost 32% as of the end of fiscal 2014.<br><br>Through our supply chain efficiencies described above under "Logistics," we targeted a 20% reduction in our domestic supply chain greenhouse gas emissions from 2008 to 2015. We also continued to monitor our "carbon footprint" from the operation of our stores as | CN0403-01 - Total energy consumed, percentage grid electricity, percentage renewable energy |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | | well as from our transportation and supply chain activities. Through our supply chain and energy reduction initiatives, we have exceeded our goal by reducing our absolute carbon emissions by over 1.9 million metric tons from 2008 to 2013, including the reduction of over 125,000 metric tons in 2013. | |

## Renewable Resources & Alternative Energy Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | **Enphase Energy - Form 10-K for FY 2014** | **First Solar Inc. - Form 10-K for FY 2014** | |
| Solar Energy | Product Lifecycle Environmental Impacts | Further, new geographic markets and the larger commercial and utility-scale installation markets have different characteristics from the markets in which we currently sell products, and our success will depend on our ability to properly address these differences. These differences may include:<br><br>... - differing regulatory requirements, including… recycling… | CdTe Solar Module Collection and Recycling Program<br><br>First Solar is committed to extended producer responsibility and takes into account the environmental impact of its products over their entire life cycle. We established the solar industry's first comprehensive module collection and recycling program. First Solar's module recycling process is designed to maximize the recovery of valuable materials, including the glass and encapsulated semiconductor material, for use in new modules or other new products and minimizes the environmental impacts associated with our modules at the end of their useful life. Approximately 90% of each collected First Solar module can be recycled into materials for use in new products, including new solar modules. | RR0102-11 - Percentage of products sold that are recyclable or reusable<br><br>RR0102-12 - Weight of end-of-life material recovered, percentage of recovered materials that are recycled |
| | | **Rex American Resources - Form 10-K for FY 2014** | **Aemitis Inc. - Form 10-K for FY 2014** | |
| Biofuels | Water Management in Manufacturing | Our plants depend on an uninterrupted supply of energy and water to operate. Unforeseen plant shutdowns could harm our business.<br><br>Our plants require a significant and uninterrupted supply of natural gas, electricity and water to operate. We generally rely on third parties to provide these resources. If there is an interruption in the supply of energy | General<br><br>We own and operate a 55 million gallon per year capacity ethanol production facility located in Keyes, California.  The facility produces its own combined heat and power (CHP) through the use of a natural gas-powered steam turbine, and is designed to reuse 100% of its process water with zero water discharge. | RR0101-03 - (1) Total water withdrawn and (2) total water consumed, percentage of each in regions with High or Extremely High Baseline Water Stress<br><br>RR0101-04 - Discussion of water management risks and description of strategies and practices to mitigate those risks |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
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| | | or water for any reason, such as supply, delivery or mechanical problems and we are unable to secure an adequate alternative supply to sustain plant operations, we may be required to stop production. A production halt for an extended period of time could result in material losses. | | |
| | | **Neenah Paper Inc. - Form 10-K for FY 2014** | **Resolute Forest - Form 10-K for FY 2014** | |
| Pulp & Paper Products | Greenhouse Gas Emissions | Greenhouse gas ("GHG") emissions have increasingly become the subject of political and regulatory focus. Concern over potential climate change, including global warming, has led to legislative and regulatory initiatives directed at limiting GHG emissions. In addition to certain federal proposals in the United States to regulate GHG emissions, Germany and all the states in which we operate are currently considering GHG legislation or regulations, either individually and/or as part of regional initiatives. While not all are likely to become law it is reasonably possible that additional climate change related mandates will be forthcoming, and it is expected that they may adversely impact our costs by increasing energy costs and raw material prices, requiring operational or equipment modifications to reduce emissions and creating costs to comply with regulations or to mitigate the financial consequences of such compliance. | Sustainable performance and development<br><br>… Our key sustainability commitments include:<br><br>• We surpassed, two years ahead of schedule, the goal we set as a member of the World Wildlife Fund Climate Savers program to reduce our scope 1 and 2 greenhouse gas emissions by 65% by 2015, compared to 2000 levels. We reduced our emissions by 67.5%. This improvement goes beyond capacity reductions: over 50% of the improvement came from reductions in energy consumption, fuel switching and fuel mix improvements. | RR0202-01 - Gross global Scope 1 emissions<br><br>RR0202-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emission reduction targets, and an analysis of performance against those targets |
| | | **Resolute Forest - Form 10-K for FY 2014** | **Glatfelter - Form 10-K for FY 2014** | |
| Pulp & Paper Products | Air Quality | Changes in laws and regulations could adversely affect our results of operations.<br><br>We are subject to a variety of foreign, federal, state, provincial and local laws and regulations dealing with trade, employees, transportation, taxes, timber and water rights, pension funding and the environment. Changes in these laws or regulations or their interpretations or enforcement have required in the past, and could require in the future, substantial expenditures by us and adversely affect our results of operations. For example, changes in environmental laws and regulations have in the past, and could in the future, require us to | We are subject to various federal, state and local laws and regulations intended to protect the environment as well as human health and safety. At various times, we have incurred significant costs to comply with these regulations and we could incur additional costs as new regulations are developed or regulatory priorities change.<br><br>We will incur material capital costs to comply with new air quality regulations including the U.S. EPA Best Available Retrofit Technology rule (BART; otherwise known as the Regional Haze Rule) and the Boiler Maximum Achievable Control Technology rule (Boiler | RR0202-03 - Air emissions for the following pollutants: NOx (excluding N2O), SOx, volatile organic compounds (VOCs), particulate matter (PM), and hazardous air pollutants (HAPs) |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | spend substantial amounts to comply with rules and regulations relating to air emissions, wastewater discharge, waste management, landfill sites, including investigation and remediation costs and greenhouse gas regulations. Environmental laws and their enforcement are becoming increasingly stringent. Consequently, our compliance and remediation costs could increase materially. | MACT). These rules will require process modifications and/or installation of air pollution controls on boilers at two of our facilities. We have begun converting or replacing four coal-fired boilers to natural gas and upgrading site infrastructure to accommodate the new boilers, including connecting to gas pipelines. The total cost of these projects is estimated at $85 million to $90 million | |
| | | **Rayonier Inc. - Form 10-K for FY 2014** | **Plum Creek Timber- Form 10-K for FY 2014** | |
| Forestry & Logging | Ecosystem Services & Impacts | The impact of existing regulatory restrictions on future harvesting activities may be significant.<br><br>U.S. federal, state and local laws and regulations, as well as those of other countries, which are intended to protect threatened and endangered species, as well as waterways and wetlands, limit and may prevent timber harvesting, road building and other activities on our timberlands. Restrictions relating to threatened and endangered species apply to activities that would adversely impact a protected species or significantly degrade its habitat. The size of the restricted area varies depending on the protected species, the time of year and other factors, but can range from less than one acre to several thousand acres. A number of species that naturally live on or near our timberlands, including, among others, the northern spotted owl, marbled murrelet, several species of salmon and trout in the Pacific Northwest, and the red cockaded woodpecker, Red Hills salamander and flatwoods salamander in the Southeast, are protected under the Federal Endangered Species Act (the "ESA") or similar U.S. federal and state laws. A significant number of other species, such as the gopher tortoise and long-eared bat are currently under review for possible protection under the ESA. As we gain additional information regarding the presence of threatened or endangered species on our timberlands, or if other regulations, such as those that require buffers to protect water | Environmentally Responsible Resource Management.<br><br>We believe that environmentally sound management practices contribute to our growth in value by providing greater predictability in the management of our assets. We follow the principles of the Sustainable Forestry Initiative® program ("SFI") which are aimed at the sound management of all natural resources, including soils, air, watersheds, fisheries and wildlife habitats. Forestry practices on all of our timberlands have been independently audited and certified under the SFI program. Our planning efforts for species listed as threatened or endangered under the Endangered Species Act have resulted in three major habitat conservation agreements under which we manage approximately 0.9 million acres of our timberlands. Our manufacturing business follows a set of internally developed environmental principles | RR0201-01 - Area of forestland certified to a third-party forest management standard, percentage certified to each standard.<br><br>RR0201-02 - Area of forestland with protected conservation status<br><br>RR0201-03 - Area of forestland in endangered species habitat |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | bodies, become more restrictive, the amount of our timberlands subject to harvest restrictions could increase. | | |

## Infrastructure Sector

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | **CBRE Group Inc. - Form 10-K for FY 2014** | **Jones Lang LaSalle - Form 10-K for FY 2014** | |
| Real Estate Services | Sustainability Services | We provide valuation services that include market value appraisals, litigation support, discounted cash flow analyses, feasibility and fairness opinions and property condition and environmental consulting | We provide Energy and Sustainability Services to occupiers and investors to help them develop their corporate sustainability strategies, green their real estate portfolios, reduce their energy consumption and carbon footprint, upgrade building performance by managing Leadership in Energy and Environmental Design ("LEED") construction or retrofits and provide sustainable building operations management. We have more than 1,500 energy and sustainability accredited professionals. Cumulatively, we have helped our U.S. clients reduce greenhouse gas emissions by an estimated 11.9 million metric tons and saved them an estimated $2.5 billion in energy costs from 2007-2013 (see jll.com/sustainability for details). In 2013 alone, we documented $39 million in estimated energy savings for our U.S. clients and reduced their greenhouse gas emissions by 220,000 tons. Our sustainability teams worked on a total of 1,852 buildings, a 33% increase compared to 2012. We generally negotiate compensation for Energy and Sustainability Services for each assignment based on the scale and complexity of the project or shared savings. | IF0403-01 - Revenue from energy and sustainability. |
| | | **Vornado Realty Trust - Form 10-K for FY 2014** | **Simon Property - Form 10-K for FY 2014** | |
| Real Estate Owners, Developers & Investment Trusts | Energy Management | We may incur significant costs to comply with environmental laws and environmental contamination may impair our ability to lease and/or sell real estate.<br><br>... We may become subject to costs or taxes, or increases therein, associated with natural resource or energy usage (such as a “carbon | Sustainability and Energy Efficiency<br><br>We incorporate sustainable thinking into all areas of our business, from property development and operations, to doing business with customers, to engaging with the communities we serve, as well as our employees. | IF0402-01 - Energy consumption data coverage as a percentage of floor area, by property subsector<br><br>IF0402-02 - Total energy consumed by portfolio area with data coverage, percentage grid electricity, and |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | tax"). These costs or taxes could increase our operating costs and decrease the cash available to pay our obligations or distribute to equity holders. | One main focus of our sustainability strategy is on energy conservation and energy efficiency. Through the continued use of energy conservation practices, energy efficiency projects, and continuous monitoring and reporting, we have reduced our energy consumption at comparable properties every year since 2003. As a result, excluding new developments and expansions, we reduced the electricity usage over which we have direct control by 280 million kWhs since 2003. This represents a 30% reduction in electricity usage across a portfolio of comparable properties and reflects an annual value of over $28 million in avoided operating costs. | percentage renewable, each by property subsector<br><br>F0402-03 - Like-for-like change in energy consumption of portfolio area with data coverage, by property subsector<br><br>IF0402-04 - Percentage of eligible portfolio that (1) has obtained an energy rating and (2) is certified to ENERGY STAR®, by property subsector. |
| | | **Fluor Corporation - Form 10-K for FY 2014** | **Chicago & Bridge Company - Form 10-K for FY 2014** | |
| Engineering & Construction Services | Workforce Health & Safety | Our project sites can place our employees and others near large equipment, dangerous processes or substances or highly regulated materials, and in challenging environments. Safety is a primary focus of our business and is critical to our reputation. Often, we are responsible for safety on the project sites where we work. Many of our clients require that we meet certain safety criteria to be eligible to bid on contracts, and some of our contract fees or profits are subject to satisfying safety criteria. Unsafe work conditions also have the potential of increasing employee turnover, increasing project costs and raising our operating costs. If we fail to implement appropriate safety procedures and/or if our procedures fail, our employees or others may suffer injuries or even loss of life. Although we maintain functional groups whose primary purpose is to implement effective health, safety and environmental procedures throughout our company, the failure to comply with such procedures, client contracts or applicable regulations could subject us to losses and liability. And, despite these activities, in these locations and at these sites, we cannot guarantee the safety of our | Our core competencies, which we believe are significant competitive strengths, include:<br><br>Strong Health, Safety and Environmental ("HSE") Performance. Because of our long and outstanding safety record, we are sometimes invited to bid on projects for which other competitors do not qualify. Our HSE performance also translates directly to lower costs and reduced risk to our employees, subcontractors and customers. According to the U.S. Bureau of Labor Statistics, the national Lost Workday Case Incidence Rate for construction companies similar to CB&I was 0.7 per 100 full-time employees for 2013 (the latest reported year), while our rates for 2013 and 2014 were only 0.05 per 100 employees and 0.03 per 100 employees, respectively. | IF0301-05 - (1) Total recordable injury rate (TRIR) and (2) fatality rate for (a) direct employees and (b) contract employees |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | personnel, nor damage to or loss of work, equipment or supplies. | | |
| | | **Waste Management - Form 10-K for FY 2014** | **Clean Harbors - Form 10-K for FY 2014** | |
| Waste Management | Workforce Health & Safety | Our business is subject to operational and safety risks, including the risk of personal injury to employees and others.<br><br>Providing environmental and waste management services, including constructing and operating landfills, involves risks such as truck accidents, equipment defects, malfunctions and failures, mass instability or waste slides, severe weather and natural disasters, which could potentially result in releases of hazardous materials and odors, injury or death of employees and others... While we seek to minimize our exposure to such risks through comprehensive training and compliance programs, as well as vehicle and equipment maintenance programs, if we were to incur substantial liabilities in excess of any applicable insurance, our business, results of operations and financial condition could be adversely affected. Any such incidents could also tarnish our reputation and reduce the value of our brand. | Health and Safety is our #1 priority—companywide. Employees at all levels of our Company share this philosophy and are committed to ensuring our safety goals are met. Our commitment to health and safety benefits everyone—our employees, our customers, the community, and the environment. In 2014 we continued with our very successful Safety Starts With Me: Live It 3-6-5 program which is a key component in our overall safety program and along with our many other programs has continued to lower our Total Recordable Incident Rate, or "TRIR;" Days Away, Restricted Activity and Transfer Rate, or "DART;" and Experience Modification Rate, or "EMR." For the year ended December 31, 2014, our Company wide TRIR, DART and EMR were 1.57, 1.01 and 0.54, respectively. For the year ended December 31, 2013, our Company wide TRIR, DART and EMR were 1.78, 1.11 and 0.60, respectively. | IF0201-12 - (1) Total recordable injury rate (TRIR), (2) fatality rate, and (3) near miss frequency rate (NMFR) for (a) direct employees and (b) contract employees<br><br>IF0201-13 - Safety Measurement System BASIC percentiles for: (1) Unsafe Driving, (2) Hours-of-Service Compliance, (3) Driver Fitness, (4) Controlled Substances/Alcohol, (5) Vehicle Maintenance, and (6) Hazardous Materials Compliance |
| | | **York Water Company - Form 10-K for FY 2014** | **Aqua America Inc. - Form 10-K for FY 2014** | |
| Water Utilities | End-Use Efficiency | Weather conditions and overuse may interfere with our sources of water, demand for water services, and our ability to supply water to our customers.<br><br>… Cool and wet weather, as well as drought restrictions and our customers' conservation efforts, may reduce consumption demands, also adversely affecting our revenue and earnings. | Business<br><br>... Water usage is also affected by changing consumption patterns by our customers, resulting from such causes as increased water conservation and the installation of water saving devices and appliances that can result in decreased water usage. It is estimated that in the event we experience a 0.50% decrease in residential water consumption it would result in a decrease in annual residential water revenue of approximately $2,000,000, and would likely be partially offset by a reduction in incremental water production expenses such as chemicals and power. | IF0103-11 - Customer water savings from efficiency measures by market |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | **Exelon Corp. - Form 10-K for FY 2014** | **Southern Co. - Form 10-K for FY 2014** | |
| Electric Utilities | Greenhouse Gas Emissions & Energy Resource Planning | Exelon, as a producer of electricity from predominantly low-carbon generating facilities (such as nuclear, hydroelectric, wind and solar photovoltaic), has a relatively small GHG emission profile, or carbon footprint, compared to other domestic generators of electricity. By virtue of its significant investment in low-carbon intensity assets, Generation's emission intensity, or rate of carbon dioxide equivalent (CO2e) emitted per unit of electricity generated, is among the lowest in the industry. Exelon does produce GHG emissions, primarily at its fossil fuel-fired generating plants; CO2, methane and nitrous oxide are all emitted in this process, with CO2 representing the largest portion of these GHG emissions. GHG emissions from combustion of fossil fuels represent the majority of Exelon's direct GHG emissions in 2014, although only a small portion of Exelon's electric supply is from fossil generating plants. Other GHG emission sources at Exelon include natural gas (methane) leakage on the natural gas systems, sulfur hexafluoride (SF6) leakage in its electric transmission and distribution operations and refrigerant leakage from its chilling and cooling equipment as well as fossil fuel combustion in its motor vehicles and usage of electricity at its facilities. | Global Climate Issues<br><br>… The EPA's greenhouse gas reporting rule requires annual reporting of CO2 equivalent emissions in metric tons for a company's operational control of facilities. Based on ownership or financial control of facilities, the Southern Company system's 2013 greenhouse gas emissions were approximately 102 million metric tons of CO2 equivalent. The preliminary estimate of the Southern Company system's 2014 greenhouse gas emissions on the same basis is approximately 112 million metric tons of CO2 equivalent. The level of greenhouse gas emissions from year to year will depend on the level of generation, the mix of fuel sources, and other factors. | IF0101-01 - (1) Gross global Scope 1 emissions, (2) percentage covered under emissions-limiting regulations, and (3) percentage covered under emissions-reporting regulations<br><br>IF0101-02 - Description of long-term and short-term strategy or plan to manage Scope 1 emissions, emission-reduction targets, and an analysis of performance against those targets |
| | | **AES Corporation - Form 10-K for FY 2014** | **Exelon Corp. - Form 10-K for FY 2014** | |
| Electric Utilities | End-Use Efficiency & Demand | Regulatory Framework<br><br>… Retail Regulation. DP&L is subject to regulation by the PUCO, for its distribution services and facilities, retail rates and charges, reliability of service, compliance with renewable energy portfolio, energy efficiency program requirements and certain other matters… In addition, DP&L's rates include various adjustment mechanisms including, but not limited to, those to reflect changes in fuel costs to generate electricity or purchased power prices, and the timely recovery of costs incurred to comply with alternative energy, | Energy Efficiency Programs.<br><br>PECO's PAPUC-approved Phase I EE&C plan had a four-year term that began on June 1, 2009 and concluded on May 31, 2013. The Phase I Plan set forth how PECO would meet the required reduction targets established by Act 129's EE&C provisions, which included a 3.0% reduction in electric consumption in PECO's service territory and a 4.5% reduction in PECO's annual system peak demand in the 100 hours of highest demand by May 31, 2013. On March 20, 2014, the PAPUC issued its final report stating | IF0101-13 - Percentage of electric load served by smart grid technology.<br><br>IF0101-14 - Customer electricity savings from efficiency measures by market |

| Industry | Topic | Boilerplate | Improved disclosure | Selected SASB Metrics |
|---|---|---|---|---|
| | | renewables, energy efficiency, and economic development costs. These components function independently of one another, but the overall structure of DP&L's retail rates and charges are subject to the rules and regulations established by the PUCO. | that PECO was in full compliance with all Phase I targets.<br><br>… On February 28, 2014, PECO filed a Petition for Approval to amend its EE&C Phase II Plan to continue its DLC demand reduction program for mass market customers from June 1, 2014 to May 31, 2016. PECO proposed to fund the estimated $10 million annual costs of the program by modifying incentive levels for other Phase II programs. The costs of the DLC program will be recovered through PECO's Energy Efficiency Program Charge along with other Phase II Plan costs. The PAPUC granted PECO's Petition in an Order that became final on May 5, 2014. | |

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July 1, 2016

Brent J. Fields
Secretary
United States Securities and Exchange Commission
100 F Street, N.E.
Washington, D.C. 20549

Re: Concept Release on Business and Financial Disclosure Required by Regulation S-K

Dear Mr. Fields:

I write on behalf of the Sustainability Accounting Standards Board (SASB), an independent 501(c)(3) nonprofit organization that issues sustainability accounting standards for the disclosure of material sustainability information in SEC filings. SASB's provisional standards—developed following a robust due process with significant market input—are designed to be cost-effective and work within the framework of the U.S. securities laws. They help registrants effectively disclose material sustainability-related information and comply with regulatory obligations. By issuing standards that help companies provide investors with decision-useful sustainability disclosure, SASB supports the SEC's mission to protect investors; maintain fair, orderly, and efficient markets; and, facilitate capital formation.

The Commission's Regulation S-K Concept Release[1] (Concept Release) raises important questions regarding the need to update long-standing disclosure requirements to meet the needs of today's investors. Our comments focus primarily on the need for improved disclosure of sustainability-related matters.

The principal points made in this letter[2] are:

- **Today's reasonable investors use sustainability disclosures.** There has been an enormous increase in investor interest in sustainability-related information since the SEC last evaluated the requirements on disclosure of sustainability-related information. In a 2015 CFA Institute survey, 73 percent of institutional investors indicated that they take environmental, social and governance (ESG) issues into account in their investment analysis and decisions, to help manage investment risks.[3]
- **While Regulation S-K already requires disclosure of material sustainability information, the resulting disclosure is insufficient.** More than 40 percent of all 10-K disclosure on sustainability topics consists of boilerplate language. This preponderance of vague language

[1] Business and Financial Disclosure Required by Regulation S-K; Concept Release ("Concept Release"), 81 Fed. Reg. 23916 (April 22, 2016)
[2] Appendix A provides answers to specific questions raised in the Concept Release.
[3] CFA Institute, Environmental, Social and Governance Survey, p. 5 (June 2015), https://www.cfainstitute.org/Survey/esg_survey_report.pdf . Survey studied 1,325 institutional investors. *Id*. at 3.

does not help investors to understand or price risk or to evaluate performance on the topics disclosed.

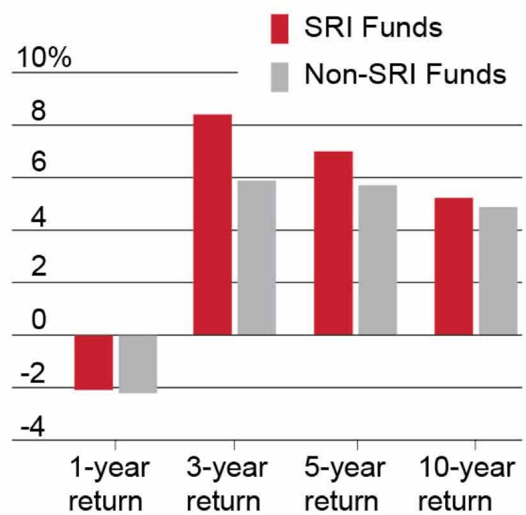
- **Line-item disclosure requirements are not appropriate for sustainability issues.** Sustainability issues are not material for all companies, and when they are material, they manifest in unique ways and require industry-specific metrics. Requiring generally applicable line-item disclosures would result in additional corporate reporting burden and a large volume of information that is immaterial to investors.
- **To evaluate sustainability performance, an industry lens is needed.** Sustainability issues impact financial performance in specific ways that vary by topic and industry. As such, investors need guidance on which sustainability issues are material to which industries, and they need industry-specific metrics by which to evaluate and compare performance in the context of industry characteristics and value drivers.
- **Effective sustainability disclosure requires a market standard.** A market standard for the industry-specific disclosure of sustainability-related information would provide a market-informed process that allows for future evolution of investor needs and issuers' business models more efficiently than governmentally-mandated, universal line-item disclosure.
- **The Commission should acknowledge SASB standards as an acceptable disclosure framework for use by companies preparing their SEC filings***.* SASB, through extensive research, analysis, and due process, issues standards for 79 industries, consistent with the definition of "materiality" under the federal securities laws. SASB standards enable companies to make better disclosures on material sustainability-related information to investors consistent with SEC requirements, without the need for rulemaking. SASB standards are designed to be cost-effective for issuers and decision-useful for analysts and investors, providing the ability to compare and benchmark performance, which is essential for informing investment decisions.

### Investor Demand for Sustainability Information Has Increased Dramatically in the Past 40 Years

As the Concept Release notes, disclosure of sustainability information has not been examined in detail by the SEC since the mid-1970s, when questions involving environmental disclosures received considerable attention from the Commission and the federal courts. At that time, the SEC rejected calls for increased requirements for such disclosures because of, among other things, a lack of sufficient investor interest. The percentage of holdings of "ethical investors" was estimated at "two thirds of one percent" of all U.S. stock and bond holdings. Hence, the Commission determined, these disclosures were of interest to only "an insignificant percentage" of investors. The Concept Release, after describing this history, notes that interest in this area "may be evolving." We strongly concur.

Overwhelming evidence confirms that, in the past four decades, investors have come to recognize that sustainability[4] information is material and to demand disclosure of the same. Shifts in the global business context underscore the need to revisit the disclosure of sustainability issues, including ESG[5] factors, and investor interest in them. For example, climate risk was not on the radar of investors or the Commission 40, or even 20, years ago. Internationalization of manufacturing and supply chains has generated concomitant concerns about how U.S. companies are managing environmental, human rights, and governance issues abroad. The rise of the Internet and social media has increased the velocity with which reputation and license to operate can be damaged because of the poor management of sustainability factors that were not considered relevant 40 years ago.

**Figure A**
**Competitive Returns**
Performance of 'sustainable' (or SRI) mutual funds versus ones that aren't




Source: © 2015 Morningstar, Inc.

While interest in sustainability issues was first voiced by so-called "ethical investors," today the decisions of mainstream investment analysts on whether to buy, sell, or hold a security are increasingly influenced by ESG performance. ESG issues can and do affect the financial condition or operating performance of companies,

[4] For the purpose of the SASB standards, sustainability refers to corporate activities that maintain or enhance the ability of a company to create value over the long term. Sustainability accounting refers to the measurement, management, and reporting of such corporate activities. Sustainability accounting reflects the management of a corporation's environmental and social impacts arising from production of goods and services, as well as the management of the environmental and social capitals necessary to create long-term value. It also includes the impacts that sustainability challenges have on innovation, business models, and corporate governance, and vice versa. Therefore, the SASB's sustainability topics are organized under five broad sustainability dimensions: environment, social capital, human capital, business model and innovation, and leadership and governance.
For more on SASB's definition of sustainability, please refer to SASB's Conceptual Framework, open for comment through July 6, 2016: http://www.sasb.org/wp-content/uploads/2016/04/SASB-Conceptual-Framework-04.04.2016.pdf.

[5] There is no one definition of ESG. The term has been described as "a generic term used in capital markets and used by investors to evaluate corporate behaviour and to determine the future financial performance of companies. ESG factors are a subset of non-financial performance indicators which include sustainable, ethical and corporate governance issues such as managing the company's carbon footprint and ensuring there are systems in place to ensure accountability." (FT.com/Lexicon http://lexicon.ft.com/Term?term=ESG). The CFA Institute defines it as the "environmental, social and governance issues that Investors are considering in the context of corporate behavior. Often these ESG issues have been considered nonfinancial or nonquantifiable in nature and have medium to long-term time frame in their effect on a Company." (The CFA Institute, Center for Market Integrity, Environmental, Social and Governance Factors at Listed Companies, a Manual for Investors, (2008) http://www.cfapubs.org/doi/pdf/10.2469/ccb.v2008.n2.1).

and thus are of interest to mainstream investors as economic actors,[6] as evidenced by the following proof points:

- A 2016 study shows that nearly *75 percent* of investors cite improved sustainability-related revenue performance and operational efficiency as strong reasons to invest in a company.[7]

- More than *60 percent* of investors believe that solid sustainability performance reduces a company's risks; nearly the same number also strongly believe that it lowers a company's cost of capital.[8]

- *60 percent* of institutional investors participating in a 2015 survey saw "non-financial" information relevant across all industries, and "two thirds (said) companies do not adequately disclose information about ESG risks."[9]

- Research from Harvard Business School found that companies that perform well on material sustainability factors, evaluated based on SASB criteria, enjoy enhanced market returns (six percent annualized alpha) over firms that perform poorly on material factors.[10]

- Of the investors surveyed by PwC in 2014 (representing 50 percent of U.S. institutional AUM), *80 percent* reported that an assessment of performance on environmental, social

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[6] It is also noteworthy that, according to US SIF's 2014 REPORT ON US SUSTAINABLE, RESPONSIBLE AND IMPACT INVESTING TRENDS, in the U.S., socially responsible investments (SRI)—often called "ethical investing" in the 1970s—have grown 929 percent since 1995. More than one out of every $6 under professional management in the United States is invested based on SRI strategies. (http://www.ussif.org/files/publications/sif_trends_14.f.es.pdf .) US SIF is a non-profit organization that undertakes educational, research, and programmatic activities to "rapidly shift investment practices towards sustainability, focusing on long-term investment and the generation of positive social and environmental impacts." *See* http://www.ussif.org/about.

[7] Gregory Unruh, David Kiron, Nina Kruschwitz, Martin Reeves, Holger Rubel, and Alexander Meyer zum Felde, *Investing for a Sustainable Future*, MIT SLOAN MGMT. REV., p. 4 (May 2016), http://sloanreview.mit.edu/projects/investing-for-a-sustainable-future/. 579 investors responded to this survey. The investment community was broadly represented and included respondents from pension funds, endowment organizations, insurers, banks, and asset management companies. Among these groups, a significant number of respondents came from asset management companies (36%). Investors self-identified as follows: strategic (39%); institutional (24%); and retail (11%) investors. Few identified themselves as mission-oriented or socially responsible investors.

[8] Id.

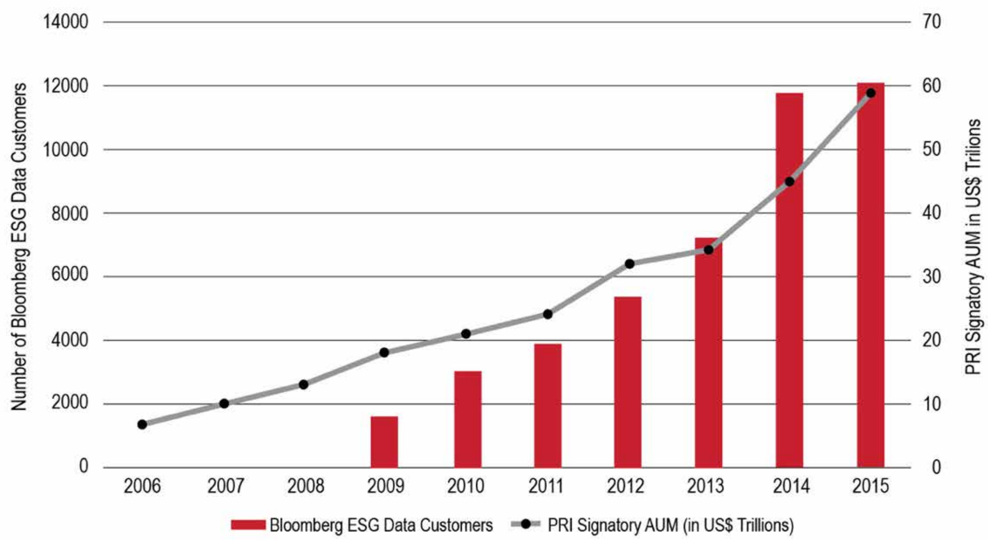
[9] EY, TOMORROW'S INVESTMENT RULES 2.0: EMERGING RISK AND STRANDED ASSETS HAVE INVESTORS LOOKING FOR MORE FROM NONFINANCIAL REPORTING p. 7, (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf.

[10] Mozaffar Khan, George Serafeim and Aaron Yoon, *Corporate Sustainability: First Evidence on Materiality*, THE ACCOUNTING REVIEW (Harvard Business School, March 9, 2015), http://hbswk.hbs.edu/item/corporate-sustainability-first-evidence-on-materiality. This is the first significant study to differentiate between those sustainability factors that are likely to have material impacts and those that are not, using SASB's provisional standards to make this determination. Using historical data, the study tracked the performance of 2,307 unique firms over 13,397 unique firm-years across six sectors and 45 industries, and found that firms enjoyed significantly higher market returns when they addressed material sustainability factors, and still higher returns when they efficiently concentrated on material sustainability factors to the exclusion of immaterial sustainability factors. *Id*. at p. 12, 23.

and governance (ESG) issues had factored into their investment decision-making process during the 12 months preceding the survey.[11]

- *Roughly half of the total global institutional assets*—$60 trillion—are now managed by signatories to the Principles of Responsible Investment (PRI).[12] PRI promotes an approach to investing that incorporates ESG factors into investment decisions. PRI signatories have grown in number from *100 to 1,500* since PRI's inception 10 years ago. (See Figure B.)

**Figure B**
**PRI Signatory Assets Under Management**
**Bloomberg ESG Customer Growth: 2006-2015**




[11] PwC, SUSTAINABILITY GOES MAINSTREAM: INSIGHTS INTO INVESTOR VIEWS, p. 2, (May 2014), https://www.pwc.com/us/en/pwc-investor-resource-institute/publications/assets/pwc-sustainability-goes-mainstream-investor-views.pdf. Survey respondents represented large financial institutions such as third-party investment managers, banks, pension funds, foundations, endowments, sovereign wealth funds, insurance companies, and family offices.
[12] Gunnar Friede, Timo Busch and Alexander Bassen, *ESG and Financial Performance: Aggregated Evidence from More Than 2000 Empirical Studies*, Journal of Sustainable Finance & Investment, Vol. 5, No. 4, pp. 210 (2015), http://www.tandfonline.com/doi/full/10.1080/20430795.2015.1118917.
PRI signatories make the following commitment: "As institutional investors, we have a duty to act in the best long-term interests of our beneficiaries. In this fiduciary role, we believe that environmental, social, and corporate governance (ESG) issues can affect the performance of investment portfolios (to varying degrees across companies, sectors, regions, asset classes and through time)." "Incorporating ESG issues into investment analysis and decision-making processes" is the first of six principles to which PRI signatories commit.
For more information on PRI see its website: https://www.unpri.org/about.

- The number of customers using ESG data on Bloomberg terminals has *quadrupled* from 2010 to 2015.[13] (See Figure B.)

- Setting aside prior guidance, the U.S. Department of Labor affirmed in 2015 that the Employment Retirement Income Security Act (ERISA) does not prohibit pension fund managers from considering ESG factors in making investment decisions. "Fiduciaries should appropriately consider factors that potentially influence risk and return. Environmental, social, and governance issues may have a direct relationship to the economic value of the plan's investment."[14] Under this guidance, managers of U.S. pension funds—representing more than $21.7 trillion in AUM[15]—are now able to consider ESG factors in keeping with their fiduciary duty.

- Collaborative research examining more than 2,000 empirical studies of ESG and financial performance over three decades found that 62.6 percent of studies showed a positive correlation between the inclusion of ESG factors in investment decision making and financial performance.[16]

- "Evidence shows that companies that have better ESG management tend to outperform in the long term, and they're more resilient during times of economic downturn," according to Christina Zimmermann at Wellington Management. "We do this to get better risk-adjusted returns."[17]

- "Our goal is to inextricably weave ESG factors into the fabric of industry standards, making them part of the investment decision making process," says Mamadou-Abou Sarr of Northern Trust.[18]

- Writing recently to the CEOs of S&P 500 and large European companies, the chairman and CEO of the world's largest investment management corporation, BlackRock's Laurence Fink, made clear to corporations that BlackRock recognizes the financial and operational impact of sustainability-related issues. "Over the long-term, environmental, social and governance (ESG) issues—ranging from climate change to diversity to board effectiveness—have real and quantifiable financial impacts."[19]

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[13] Bloomberg, SUSTAINABLE BUSINESS AND FINANCE: CUSTOMERS USING ESG DATA (2015), http://www.bloomberg.com/bcause/customers-using-esg-data.
[14] U.S. Department of Labor, IB 2105-1, p. 5, https://s3.amazonaws.com/public-inspection.federalregister.gov/2015-27146.pdf.
[15] *See, e.g.,* Willis Towers Watson, U.S. PENSION FUND ASSETS REMAIN STABLE (February 2, 2016), https://www.willistowerswatson.com/en-US/press/2016/02/global-pension-fund-assets-crab-sideways.
[16] Gunnar Friede, Timo Busch, and Alexander Bassen, *ESG and Financial Performance: Aggregated Evidence from More Than 2000 Empirical Studies*, JOURNAL OF SUSTAINABLE FINANCE & INVESTMENT, Vol. 5, No. 4, pp. 217-18 (Dec. 2015), http://www.tandfonline.com/doi/full/10.1080/20430795.2015.1118917.
[17] Institutional Investor, ESG BECOMING MAINSTREAM, p. 3 (November 2015), http://institutionalinvestor.com/images/416/2015-11-ESG_Report_AM.pdf.
[18] 15 Mamadou-Abou Sarr, TAKING STOCK OF THE PRI ON ITS TENTH ANNIVERSARY (Institutional Investor May 9, 2016), http://www.institutionalinvestor.com/gmtl/3552447/article/3551587/partner-content-are-target-date-funds-on-target.html#.V0OidmO8mlc.
[19] Letter from BlackRock's Larry Fink to CEOs of S&P 500 and large European companies, February 2, 2016. A copy of the letter can be found at http://www.businessinsider.com/blackrock-ceo-larry-fink-letter-to-sp-500-ceos-2016-2. Mr. Fink later wrote, in a letter to BlackRock shareholders, "Generating sustainable long-term returns for our clients also requires us to factor the ESG challenges companies

Thus, the Commission's finding of 40 years ago—that an "insignificant percentage" of U.S. shareholders is interested in sustainability disclosures—quite emphatically can no longer be supported.

**Frustration and Burden of Ineffective ESG Disclosures**

Today's investors are interested in having access to accurate and useful sustainability information, but that need is not matched by the availability and quality of such information. Sustainability information generally is not "investment-grade"; it is largely not material (as defined under U.S. securities laws); is not industry-specific, comparable, complete, auditable, nor reliable. A 2015 study found that 82 percent of investors said they are dissatisfied with how risks and opportunities are identified and quantified in financial terms; 79 percent of the investors polled said they are dissatisfied with the comparability of sustainability reporting between companies in the same industry.[20]

Underlying this problem is the fact that sustainability information disclosed outside Commission filings (which is where most sustainability information is disclosed today) is generally formulated without applying the standard for materiality used under federal securities laws: "a substantial likelihood that the disclosure of the omitted fact would have been viewed by the reasonable investor as having significantly altered the 'total mix' of information made available."[21] Sustainability reports prepared following frameworks with more expansive definitions of materiality (for example the definition used by the Global Reporting Initiative [GRI])[22] are useful in many contexts, including surfacing issues about which a broad range of stakeholders may care. But, in the context of investment decision-making, they produce information that can "bury the shareholders in an avalanche of trivial information," an outcome that the Supreme Court sought to avoid in establishing the materiality standard in the *TSC v. Northway* decision.[23]

How do investors obtain sustainability information today? There are four principal means—none of which presently works well.

**SEC filings:** As the Commission has noted,[24] certain sustainability information should be disclosed under existing SEC rules. In particular, Item 303 of Regulation S-K requires that companies describe known trends, events, and uncertainties that are reasonably likely to have material impacts on their financial condition or operating performance in the MD&A section of Form 10-K or 20-F. The MD&A requirement calls for companies "to provide investors and other users with material information that is necessary to [form] an understanding of the company's

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face today, such as climate or changing labor markets, into our investment analysis and decision-making processes." A full copy of his letter to shareholders can be found at https://www.blackrock.com/coorporate/en-us/investor-reations/larry-fink-chairmans-letter."

[20] PwC, SUSTAINABILITY DISCLOSURES: IS YOUR COMPANY MEETING INVESTOR EXPECTATIONS, (July 2015), http://www.pwc.com/us/en/cfodirect/publications/in-the-loop/sustainability-disclosure-guidance-sasb.html.

[21] TSC Industries v. Northway, Inc., 426 U.S. 438 (1976).

[22] See infra, p. 20-22, for a more detailed discussion of GRI.

[23] 426 U.S. at 448-49 (1976).

[24] Securities and Exchange Commission, FR-82, COMMISSION GUIDANCE REGARDING DISCLOSURE RELATED TO CLIMATE CHANGE, p. 3 (Feb. 2, 2010), https://www.sec.gov/rules/interp/2010/33-9106.pdf.

financial condition and operating performance, as well as its prospects for the future."[25] Also, under Item 503(c) of S-K companies are required to disclose risk factors—factors that may affect a company's business, operations, industry or financial position, or its future financial performance.[26]

Because of these requirements, companies often include sustainability-related information in SEC filings. In fact, SASB research shows that three-quarters of SASB disclosure topics are already addressed by issuers in their SEC filings. Importantly, however, more than 40 percent of all 10-K disclosure on sustainability topics consists of boilerplate language.[27] This preponderance of vague language does not help investors to evaluate performance on the topics disclosed.[28] Fifteen percent of 10-K sustainability disclosures are metrics-based, but the utility of such disclosures is limited because the calculation and reporting methodologies used are not standardized. (See Appendix B.)

Consider the varied usefulness of these instances of water management disclosure made by two companies in the alcoholic beverages industry, one using boilerplate and one using metrics:

- "Climate change and water availability may negatively affect our business and financial results. … Clean water is a limited resource in many parts of the world and climate change may increase water scarcity and cause a deterioration of water quality in areas where we maintain brewing operations. The competition for water among domestic, agricultural and manufacturing users is increasing in some of our brewing communities. … The above risk, if realized, could result in a material adverse effect on our business and financial results."*—Molson Coors, Form 10-K filed 12-Feb-15*

- "Overall this year, Diageo has delivered improved performance across all water and other environmental target areas versus the prior year, and progressed towards meeting 2015 goals. We reduced absolute water use by 9% or 2,268,000 cubic metres while water efficiency improved by 2.4% compared to the prior year. In water-stressed locations, we have reduced water wasted by 12%, an important contribution towards our target of a 50% reduction versus the company's 2007 baseline."*—Diageo, Form 20-F filed 12-Aug-14]*

As for risk factor disclosures, the SEC adopted this requirement for periodic reports in 2005 to provide "investors with a clear and concise summary of the material risks to an investment in the

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[25] Securities and Exchange Commission, FR-72, COMMISSION GUIDANCE REGARDING MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS (Dec. 19, 2003), https://www.sec.gov/rules/interp/33-8350.htm.
[26] 17 C.F.R. 229.503(c).
[27] See Appendix B for an overview of SASB research findings on the current state of sustainability disclosures in SEC filings. More detailed analysis has been published and is available in the form of SASB industry research briefs, available at http://www.sasb.org/approach/our-process/industry-briefs.
[28] Such disclosures are often interpreted by analysts as red flags indicating that management has identified a risk but understands it too poorly to provide more useful information; the resulting increase in valuation model risk premia leads to a higher cost of capital. *See* Ole-Kristian Hope, Danqi Hu, and Hai Lu, *The Benefits of Specific Risk-Factor Disclosures* (working paper, University of Toronto, Feb. 26, 2016), http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2457045. The researchers found that analysts are better able to assess fundamental risk when firms' risk-factor disclosures are more detailed and avoid vague, abstract, or "boilerplate" language.

issuer's securities."[29] However, for the most part, risk factor disclosures are unhelpful to investors. Risk factor disclosure is often approached largely as a "cheap form of liability insurance."[30] Many companies provide limited disclosure about risk mitigation efforts, in part because such descriptions are often thought by lawyers as detracting from the liability-protection aspect of the risk disclosure and because, as the Concept Release itself notes, the Commission staff "has discouraged registrants from including mitigating language in their Item 503 risk factor disclosure because of concern that mitigating language could dilute investors' perception of the magnitude of the risk."[31]

A recent comprehensive study reviewed the risk factor disclosures of 50 large companies and concluded that the disclosures "often are generic and do not provide clear, concise and insightful information." [32] Further, the disclosures typically are not tailored to the specific company. Instead, they tend to represent a listing of generic risks with little to help investors distinguish between the relative importance of each risk to the company. In addition, the language is often repetitive and written with legal language and a compliance-oriented approach (instead of using plain English to help investors better understand and evaluate company-specific risks). The information, in other words, is characterized by the prevalent use of vague boilerplate language.[33] It should be noted that the "insurance" provided by such boilerplate comes at a price, in the form of higher costs of capital for companies with poor transparency.[34] Analysts overcompensate for risks that are disclosed with boilerplate language.

Thus, current sustainability disclosures in SEC filings do not provide investors with comparable, industry-specific data with which to evaluate and compare performance.

**Stand-alone reports:** 81 percent of the S&P 500 companies now produce stand-alone sustainability reports.[35] These are typically glossy, attractive publications, often developed in consultation with a company's marketing department or a public relations firm, that describe a company's achievements with respect to environmental, social, governance, and related matters. Research has shown that these reports are not sufficient to meet investor needs,[36] for two principal reasons.

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[29] Final Rule: Securities Offering Reform, Release No. 33-8591 (July 19, 2005)
[30] *See generally*, Robert B. Robbins and Philip L. Rothenberg, *Securities Disclosure: Writing Effective Risk Factor Disclosure in Offering Documents and Exchange Act Reports*, INSIGHTS, Vol. 19, No. 5 (Pillsbury Winthrop Shaw Pittman LLP May 2005), http://www.pillsburylaw.com/siteFiles/Publications/77EA643CE089DDA568EFF79F0A35F681.pdf.
[31] Concept Release, 81 Fed. Reg. at 23960
[32] Investor Responsibility Research Center Institute, THE CORPORATE RISK FACTOR DISCLOSURE LANDSCAPE (January 2016), http://irrcinstitute.org/wp-content/uploads/2016/01/FINAL-EY-Risk-Disclosure-Study.pdf.
[33] Id.
[34] See, Ole-Kristian Hope, Danqi Hu, and Hai Lu, *The Benefits of Specific Risk-Factor Disclosures* (working paper, University of Toronto, Feb. 26, 2016), http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2457045.
[35] Governance and Accountability Institute, FLASH REPORT: EIGHTY-ONE PERCENT (81%) OF THE S&P 500 INDEX COMPANIES PUBLISHED CORPORATE SUSTAINABILITY REPORTS IN 2015 (March 15, 2016), http://www.ga-institute.com/nc/issue-master-system/news-details/article/flash-report-eighty-one-percent-81-of-the-sp-500-index-companies-published-corporate-sustainabi.html.
[36] PwC, SUSTAINABILITY GOES MAINSTREAM: INSIGHTS INTO INVESTOR VIEWS, pp. 6-7, (May 2014), https://www.pwc.com/us/en/pwc-investor-resource-institute/publications/assets/pwc-sustainability-goes-mainstream-investor-views.pdf.

- First, stand-alone sustainability reports are not designed for use by investors. While they can be important marketing and communications tools, providing an extensive overview of sustainability topics to a broad set of stakeholders—ranging from employees and customers to vendors and community organizations—they are of limited utility for purposes of investment decision-making. These reports often describe matters as "material" but use that term far more loosely than is the case under the U.S. securities laws. Thus, the reports are typically filled with large amounts of immaterial information which is not balanced, standardized, reliable, nor comparable for investors.[37]

- Second, a 2013 study of highly rated (GRI A and A+)[38] sustainability reports revealed that *90 percent of known negative events were not reported* by the company.[39] These reports were found to "camouflage real sustainable-development problems, presenting an idealized version of company situations."[40] This phenomenon is sometimes referred to as "greenwashing."[41]

Thus, stand-alone sustainability reports do not produce investor-grade information, and they do not present a true and fair representation of performance on *material* factors, which is what investors need in order to understand and price risk.[42]

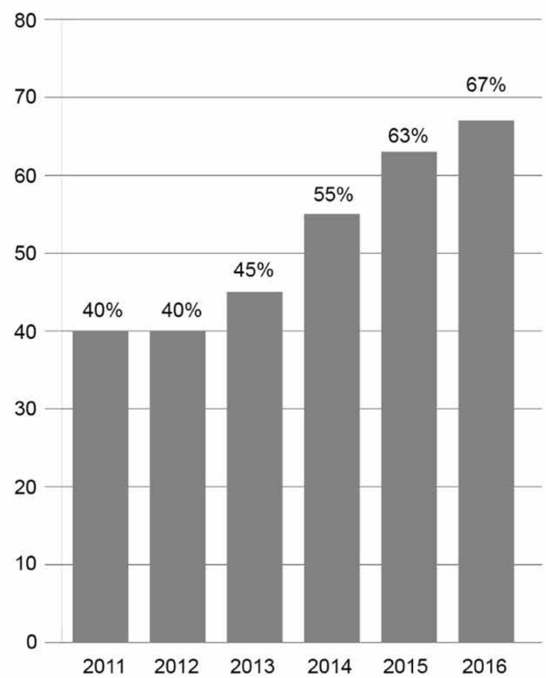
**Investor questionnaires:** Investor frustration with the availability and quality of sustainability disclosures in Commission filings and/or in stand-alone sustainability reports is evidenced by the extent to which investors seek ESG data directly from companies. In a 2014 PwC investor survey, 89 percent of respondents indicated they are very likely to request ESG information directly from the company (e.g., via questionnaires).[43] Companies are annually subject to ESG evaluations by 150 ratings systems on approximately 10,000 performance metrics, leading to "survey fatigue."[44] 7.5 percent of participants in a recent SASB webinar conducted on behalf of

[37] This presents significant risks for issuers, since under Section 10(b) and Rule 10b-5 of the Securities Exchange Act they can be held liable for material false statements made outside the 10-K.
[38] See discussion infra, p. 20.
[39] Olivier Boiral, *Sustainability Reports as Simulacra? A Counter-Account of A and A+ GRI Reports*, ACCOUNTING, AUDITING & ACCOUNTABILITY JOURNAL, Vol. 26, No. 7, p. 1036–71 (2013), http://www.emeraldinsight.com/doi/pdfplus/10.1108/AAAJ-04-2012-00998.
[40] *Id.*, at p. 1061.
[41] This process of "greenwashing" is not unlike the situation that led to the creation of the Financial Accounting Standards Board (FASB) in 1973. The Wheat Committee, which was established to study the accounting standards-setting process, observed that financial statements were often used as a "strategic weapon" and as a result were often biased and unreliable. Similarly, without any governing standards and professional norms, sustainability reports are frequently self-promotional and often do not provide a balanced view of material information needed by investors to inform their decision-making.
[42] EY, TOMORROW'S INVESTMENT RULES 2.0: EMERGING RISK AND STRANDED ASSETS HAVE INVESTORS LOOKING FOR MORE FROM NONFINANCIAL REPORTING (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf. "Investors say repeatedly that they do not receive enough accurate, standardized non-financial information relevant to companies' risk and performance assessment. Specifically, almost two-thirds of respondents say companies do not adequately disclose information about ESG risks, and nearly 40% call for companies to do so more fully in the future."
[43] PwC, SUSTAINABILITY GOES MAINSTREAM: INSIGHTS INTO INVESTOR VIEWS, p. 7 (May 2014), https://www.pwc.com/us/en/pwc-investor-resource-institute/publications/assets/pwc-sustainability-goes-mainstream-investor-views.pdf.
[44] Gregory Unruh, David Kiron, Nina Kruschwitz, Martin Reeves, Holger Rubel, and Alexander Meyer zum Felde, *Investing for a Sustainable Future*, MIT SLOAN MGMT. REV., p. 11 (May 2016),

the Institute of Management Accountants indicated that they receive **more than 250 such requests for ESG information per year.**[45] Information asymmetry is a by-product of investor ESG surveys. Because questionnaires follow different formats and seek information in non-standardized ways, information made available to one investor may differ from that provided to another. This practice of selective disclosure favors large investors who can conduct surveys and command responses, as well as ratings agencies and information brokers who sell this data to others. It might also run afoul of the SEC's Regulation FD (Fair Disclosure), which prohibits companies from selectively disclosing material nonpublic information to analysts, institutional investors, and others without concurrently making widespread public disclosure.[46]

**Shareholder resolutions:** Further evidence of investor dissatisfaction with the poor quality and availability of decision-useful sustainability disclosures is seen with the rise of sustainability-related resolutions, which accounted for 40 percent of all shareholder proposals in 2011, but today account for 67 percent of them.[47] These numbers are likely to continue to grow: 75 percent of investors who responded to the above-mentioned 2014 PwC survey indicated that they will likely sponsor or co-sponsor shareholder proposals to obtain information related to the management of sustainability issues.[48] Information is often provided to the shareholders who sponsor resolutions in exchange for dropping the proposals, but it is not disclosed publicly or to all investors, also contributing to information asymmetry and raising potential Regulation FD issues.

**Figure C**
**Shareholder Proposals**
Percent of total proposals filed that are related to social and environmental issues




Sources: EY, 2011-2014, As You Sow, 2015-2016

Not only are these various approaches to obtaining material ESG information ineffective, but questionnaires and resolutions are both burdensome and costly for registrants. For example, GE reported that in 2014 it received more than 650 questions from numerous investors, analysts, and sustainability ratings groups. Answering them required the time of more than 75 people and took several months, "with virtually no value to (GE's) customers or shareholders

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http://marketing.mitsmr.com/offers/SU2016/57480-MITSMR-BCG-Sustainability2016.pdf?utm_source=WhatCounts%2c+Publicaster+Edition&utm_medium=email&utm_campaign=surpt16&utm_content=Download+the+Report+(PDF)&cid=1.

[45] Institute of Management Accountants, INSIDE TALK WEBINAR SERIES, April 5, 2016 http://imamedia.imanet.org/webinars/2016/04-05/index.html. 1,296 people participated in the webinar, of whom, 1,069 were Certified Management Accountants.

[46] 17 C.F.R. 243.100 - 243.103.

[47] Heidi Welsh and Michael Passoff, *Helping Shareholders Vote Their Values*, PROXY PREVIEW, p. 5 (As You Sow Feb. 17, 2016), including proposals focused on: diversity; human rights & labor; environment, and; sustainability). http://www.proxypreview.org/.

[48] PwC, SUSTAINABILITY GOES MAINSTREAM: INSIGHTS INTO INVESTOR VIEWS, p. 5, (May 2014), https://www.pwc.com/us/en/pwc-investor-resource-institute/publications/assets/pwc-sustainability-goes-mainstream-investor-views.pdf.

and even less impact on the environment."[49] Similarly, making and responding to shareholder proposals can be time-consuming and costly for both investors and corporations.

**Effective Sustainability Disclosure Requires a Market Standard**

This much is evident: sustainability issues often constitute the types of "risks," "trends," and "uncertainties" that issuers should address in their SEC filings. And, as discussed above, many such issues are indeed addressed therein. SASB believes, and research supports, that the absence of a market standard for these types of disclosures has made it difficult for issuers to comply effectively with, and for the Commission to enforce effectively, the disclosure requirements of Regulation S-K. Detailed standards, including SEC rules and U.S. Generally Accepted Accounting Principles (GAAP), established by the FASB, govern the disclosure of financial information. However, there have not been generally accepted standards that govern disclosure of material sustainability information, which might be characterized as "pre-financial statement" data; i.e., information that is likely to affect financial performance in due course. The need for standardization of pre-financial statement data that relates to known trends and uncertainties has been recognized by disclosure experts for many years, including by the FASB in a thorough study of the matter issued in 2001.[50]

Consistent, true, and fair disclosure of performance on material sustainability topics—equal to the quality that markets have come to expect and rely on for financial information—can best be accomplished via the use of such a market standard. Standards provide a common reference point, create consistency with traditional financial data, extend the mosaic of information consistently, and make sustainability data an accepted part of the analytical and decision-making process.[51]

The SEC's Concept Release examines "whether our current requirements appropriately balance the costs of disclosure with the benefits" and "whether, and if so how, we could lower the cost to registrants of providing information to investors."[52] Augmenting the reporting requirements for financial statements with such a market standard for the disclosure of sustainability factors would improve the effectiveness of sustainability disclosure for all involved. Two significant

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[49] Ann R. Klee, *Ratings Good for the Environment?*, ENVIRONMENTAL FORUM (Environmental Law Institute May–June 2015), https://www.eli.org/the-environmental-forum/may-june-2016.
[50] FASB, IMPROVING BUSINESS REPORTING: INSIGHTS INTO ENHANCING VOLUNTARY DISCLOSURES, (January 2001),
http://www.fasb.org/cs/ContentServer?c=Document_C&pagename=FASB%2FDocument_C%2FDocumentPage&cid=1176156460184. This report was preceded by a comprehensive study by the Jenkins Committee to determine users' information needs to identify the types of data most useful in predicting earnings and cash flows for the purpose of valuing equity securities and assessing the prospect of repayment of debt securities or loans.
There is also much legal commentary that reaches this same conclusion. *See, e.g.*, Larry Backer, *Transparency and Business in International Environmental Law,* available at http://ssrn.com/abstract=1984346. (January 2012) ( "To those who advocate for greater transparency, regardless of the area or mechanism of disclosure, *communication of material information for monitoring and enforcement* is key. For companies, however, transparency frameworks continue to lack the precision of financial reporting rules and continue to run the risk that reporting might be reduced to communication commercial in purpose and rhetorical in form.") (emphasis in original).
[51] *See* Bruno Bertocci, BEHIND THE SCENES: HOW ASSET MANAGERS USE ESG DATA, p. 10 (UBS July 2015), http://fsa.sasb.org/wp-content/uploads/2015/03/How-Asset-Managers-user-ESG-Data-UBS-and-SASB-July-2015.pdf.
[52] Concept Release, 81 Fed. Reg. at 23917.

outcomes would include reducing the cost burden related to communicating material sustainability information to investors borne by registrants and improving the utility of this information to investors.[53] The U.S. capital markets are long overdue for sustainability accounting standards that are created by the market—with substantial investor and issuer input—specific to particular industries and consistent with the U.S. securities laws.

**SASB Standards Enable Effective Sustainability Disclosure**

SASB standards are designed specifically to address the aforementioned needs of issuers and investors. Unlike other frameworks, they are designed to help registrants effectively disclose material sustainability-related information and comply with regulatory obligations, working within the framework of existing U.S. securities laws.

1. Description of SASB:

SASB was founded in 2011 as an independent 501 (c)(3) standards-setting organization in order to advance research initially conducted at the Initiative for Responsible Investment (IRI) in the Kennedy School of Government at Harvard University.[54] The SASB board of directors, currently chaired by former New York City Mayor Michael Bloomberg, is distinguished by the level of regulatory and securities law expertise of its members. Former SEC Chair Mary Schapiro is vice chair of SASB's board. Former SEC Chair Elisse Walter, former SEC Commissioner Aulana Peters, and former FASB Chair Robert Herz have served on SASB's board for several years. Alan Beller, former Director of the SEC's Division of Corporation Finance and Senior Counselor to the SEC, joined SASB's board in June 2016.[55] SASB's staff, which now numbers 30, is made up of professionals with backgrounds in finance, accounting, sustainability, and law. The standards setting function is organized by industry and staffed by

[53] In a June 9, 2016 webinar on the Concept Release and sustainability hosted by Financial Executives International, with more than 300 attendees, 65.2% of participants indicated that disclosure reform most needs to address the establishment of a standard for the disclosure of sustainability-related information (rather than reducing liability risks, eliminating cost burdens, or eliminating duplicative disclosure). Also, 71.8% of participants indicated that such a market standard would: streamline their responses to investor inquiry regarding sustainability information and reduce the costs thereof; improve understanding and management of sustainability issues, and level the playing field. The full webinar is available at http://event.on24.com/wcc/r/1188808/2E6E10B609363E6EC24E85D3DDA66C70.

[54] In 2010, researchers at IRI began researching non-financial materiality and its application at an industry level. Steve Lydenberg and David Wood of the IRI, along with their colleague Dr. Jean Rogers, set out to develop and test a methodology for determining industry-specific material issues and their associated performance indicators. A method for identifying material factors at the industry level was honed and applied to six industries. Tailored performance indicators were developed for the material factors in each industry, derived from evaluating indicators already in use by companies and analysts to describe those particular issues. The results were published in August 2010, *as From Transparency to Performance*.

[55] Other SASB board members are: Audrey Choi, CEO Morgan Stanley's Institute for Sustainable Investing; Jack Ehnes, CEO CalSTRS; Steven Gunders, Partner, Deloitte & Touche LLP (retired); Dan Hanson, Partner and Head of US Equities, Jarislowsky Fraser Global Investment Management; Erika Karp, CEO, Cornerstone Capital Inc.; Shawn Lytle, President Delaware Holdings, Inc.; Ken Mehlman, Member and Global Head of Public Affairs, KKR; Clara Miller, President, F.B. Heron Foundation; Catherine Odelbo, Executive Vice President, Corporate Strategy and Partnerships, Morningstar, Inc.; Kevin Parker, CEO, Sustainable Insight Capital Management; Arnie Pinkston, Executive Vice President and General Counsel, Allergan (retired); Curtis Ravenel, Global Head, Sustainable Business and Finance Group, Bloomberg; Laura Tyson, Director, Institute for Business and Social Impact at the Haas Business School, University of California (Berkeley); and, Ted White, Managing Partner, Fahr, LLC.

analysts with sector experience and quantitative analysis skills. SASB is headed by CEO and founder Dr. Jean Rogers, a former Loeb Fellow at Harvard University who holds a Ph.D. in environmental engineering and has more than 20 years' experience in sustainability and management consulting across a wide range of industries, including utilities, extractives, financials, and real estate.

These are the most significant attributes of SASB standards:

- SASB provisional standards are the result of intensive research and dialogue over the past five years, in what has been the most comprehensive analysis of the relationship between sustainability information and the disclosure requirements of federal securities laws ever performed. Over 2,800 individuals participated in SASB's Industry Working Group process through which provisional standards were developed and issued.[56] One-third of the participants were issuers; one-third of the participants were investors and analysts; and one-third were intermediaries, academics, and NGOs. Working with asset owners, industry analysts, issuers, academics, and sustainability subject-matter experts, and building on decades of work by others, SASB conducted research that enables investors to discern—for the first time—patterns of material sustainability risk and exposure across equity portfolios. SASB standards (unlike other frameworks) are designed specifically for use by issuers in SEC filings. They present an opportunity to meet the market need for cost-effective, decision-useful sustainability disclosure, facilitating compliance with Regulation S-K.[57]

- A SASB standard for a given industry has several components: disclosure topics, performance metrics associated with each topic, and a technical protocol for each metric, as well as industry-specific activity metrics which can serve as normalizing factors for analysts to evaluate sustainability-related performance. (See Appendix C.) On average, SASB standards include five topics and 13 metrics per industry. 80 percent of the metrics are quantitative, and 20 percent are qualitative or descriptive. The technical protocol provides guidance on what information to collect and how to report it (e.g., boundaries and units of measurement). Each industry standard also contains disclosure guidance, e.g., disclosure of sustainability topics in SEC filings, accounting of sustainability topics, and reporting format.[58] SASB has developed provisional standards for 79 industries in 10 sectors and is now in a process of deep consultation with interested parties, who are encouraged to submit comments and other materials relating

[56] A full list of SASB Industry Working Group participants can be found here: http://www.sasb.org/wp-content/uploads/2016/06/SASB-Industry-Working-Group-Participants-Final.pdf.
SASB Industry Working Group Due Process Reports are available for each of 10 sectors. These reports can be found under the Sectors tab on SASB's website – www.sasb.org. An example of one such report can be found here: http://www.sasb.org/wp-content/uploads/2014/02/NRRDueProcessReview_forSC.pdf. Please also refer to the SASB Blog, INDUSTRY EXPERTISE INFORMS SASB TOPICS AND METRICS, December 9, 2015. http://www.sasb.org/industry-expertise-informs-sasb-topics-metrics/.

[57] See comments made by SEC Commissioner Kara M. Stein, "Disclosure in the Digital Age: Time for a New Revolution," speech at the Rocky Mountain Securities Conference (SEC May, 6, 2016), https://www.sec.gov/news/speech/speech-stein-05062016.html - _ftnref11.

[58] SASB standards can be downloaded free of charge at http://www.sasb.org/standards/download/; the Standards Navigator is a comprehensive resource for using and viewing SASB Standards, and for downloading industry-specific resources including Industry Briefs, Mock 10-Ks, and Technical Bulletins. This tool provides SASB's industry-specific disclosure topics, metrics, and technical protocols in an accessible and easy-to-use way. Access to the Standards Navigator is provided here: http://www.sasb.org/standards-navigator/.

to the standards. SASB plans to finalize the standards for all 79 industries within the next 18 months.

- SASB standards are the only sustainability standards developed in accordance with the definition of "materiality" defined by federal securities laws. SASB has identified disclosure topics that meet the materiality test set forth by the Supreme Court and used by the SEC in setting its standards – that is, information that would be important or would alter the "total mix" of information available to the reasonable investor. In addition, any topics identified as likely being material have undergone a rigorous analysis of the likelihood and magnitude of its effect on the financial condition or operating performance of a company, or on the entire industry. Direct evidence was sought to establish a link between performance on the sustainability-related factor and financial performance. Actual or potential financial impacts were characterized by their impact on revenue and growth, operating expenses, the cost of capital, and/or the value of assets or liabilities. Where possible, SASB analysts modelled the range of impact using a typical discounted cash flow analysis to understand possible impacts within a five-year time horizon. If financial materiality and the link to financial impact could not be demonstrated for a particular topic, the topic was not included in the standards. See Appendix G for a more detailed discussion of SASB's standards setting process.

- SASB standards are cost-effective, identifying the minimum set of disclosure topics likely to constitute material information for companies in an industry.[59] On average, there are just five topics per industry included in the standards. Whenever possible, if those metrics adequately characterize performance on material factors, SASB references metrics already in use by industry, from roughly 200 entities, such as CDP, EPA, OSHA, GRI, and industry organizations such as IPIECA, EPRI and GRESB. (See Appendix E.)

- SASB standards are decision-useful because they provide investors with material, comparable, industry-specific, and reliable data that support investment decisions, including understanding and pricing risk, and inform typical investment activities such as portfolio construction, security selection, fundamental analysis, and valuation. SASB has no views on investment strategies, but believes all investors should have access to material information in a format that is easily accessible, complete, comparable, and reliable, including information on material sustainability factors. Information disclosed via the standards is also auditable.[60]

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[59] SASB is currently in discussions with academic institutions to perform an independent cost-benefit study of compliance with Regulation S-K using the provisional SASB standards. Benefits may include focusing issuer resources on material factors, elimination of the need to respond to hundreds of investor questionnaires, mitigation of the risk of shareholder resolutions and selective disclosure, reduced risk of omission or incomplete disclosure of material information, and streamlining disclosure of material sustainability-related information. Costs may include additional controls and independent third-party assurance of disclosures made using the SASB standards. SASB would be pleased to inform the Commission and its staff of the results of the study once completed.

[60] There appears to be market recognition that third-party assurance would be valuable for investors. For instance, a CFA Institute survey of the Institute's members conducted in 2015 found that 69 percent of respondents thought that independent third-party verification of ESG information is important to obtain. CFA Institute, *Environmental, Social and Governance Survey* (June 2015), https://www.cfainstitute.org/Survey/esg_survey_report.pdf. In this regard, senior SASB staff persons have met on a regular basis with the PCAOB's Board and its staff to describe the development status of the SASB standards.

- SASB has used an inclusive and transparent standards-development process.[61] More than 2,800 individuals—affiliated with companies with $11T market capital and investors representing $23.4T assets under management—participated in industry working groups to provide input on SASB's provisional standards. In these working groups, 82 percent of issuers and investors agreed that SASB's proposed disclosure topics likely constitute material information. SASB will continue to involve market participants as it codifies the provisional standards into final standards and then maintains the standards.

Information disclosed via SASB standards would provide investors with investment-grade and reliable data while also, among other things:

- Enabling issuers to replace boilerplate language with complete disclosure supported by decision-useful metrics (and thus comply with SEC guidance cautioning against the use of generic language in the MD&A[62])

- Reducing information asymmetry and the cost burden related to questionnaires

- Enhancing competiveness via improving the management of material ESG factors over time[63]

We also believe that SASB standards would reduce liability risk for users of the standards. We recognize that this view may be contrary to that of some observers; in our meetings with company officials and others we have often heard of liability concerns with respect to use of these standards. But we do not think these concerns are well-founded. Existing boilerplate-type disclosures on sustainability topics are likely to expose a company to greater liability risk than would disclosures called for by the industry-specific market standard developed by SASB.[64]

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[61] Provisional SASB standards were set in accordance with the best practices of the American National Standards Institute (ANSI). SASB is an ANSI-accredited standards-setting organization.

[62] Securities and Exchange Commission, COMMISSION GUIDANCE REGARDING MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS, 17 CFR parts 211, 231, and 241 [Release Nos. 33-8350; 34-48960; FR-72], https://www.sec.gov/rules/interp/33-8350.htm . *See also,* Securities and Exchange Commission, INTERPRETIVE GUIDANCE REGARDING DISCLOSURE RELATED TO CLIMATE CHANGE, 17 CFR parts 211, 231, and 241 [Release Nos. 33-9106; 34-61469; FR-82], https://www.sec.gov/rules/interp/2010/33-9106.pdf.

[63] Mozaffar Khan, George Serafeim and Aaron Yoon, *Corporate Sustainability: First Evidence on Materiality*, THE ACCOUNTING REVIEW, p. 22-23 (Harvard Business School, March 9, 2015), http://hbswk.hbs.edu/item/corporate-sustainability-first-evidence-on-materiality. *See also,* GS SUSTAIN, CHANGE IS COMING: A FRAMEWORK FOR CLIMATE CHANGE—A DEFINING ISSUE OF THE 21ST CENTURY, (Goldman Sachs May 21, 2009), http://www.goldmansachs.com/our-thinking/archive/crossing-the-rubicon-immersive/change-is-coming-a-framework-for-climate-change.pdf. In an accompanying May 2010 interview, Anthony Ling, managing director and chief investment officer, Global Investment Research, Goldman Sachs, notes that by including analysis of performance on ESG factors in its equity analysis, Goldman Sachs is "equipping investors to be able to pick those stocks which we believe will form the basis of a core, long-term portfolio that will generate outperformance with relatively low volatility and turnover in the years to come" (emphasis added). This interview can be viewed at http://www.goldmansachs.com/our-thinking/archive/crossing-the-rubicon-immersive.

[64] There is case law support for this conclusion. For example, an issuer's risk factor disclosure that it could not be certain either that "it has been, or will at all times be, in complete compliance with all environmental requirements" or that it "will not incur additional material costs or liabilities in connection with these requirements in excess of amounts it has reserved" was deemed too "vague" and "general" and mere "boilerplate"; accordingly, the court refused to dismiss a lawsuit alleging fraud where the company knew of serious environmental exposures. *Loritz v. Exide Technologies et al.,* Fed. Sec. L. Rep.

Also, SASB standards are industry-specific.[65] The advantages of this approach have been noted by the SEC itself: "The benefits associated with disclosing certain items of information may be greater in some cases than in others, such as when an item of disclosure reflects an important part of one registrant's operations but an immaterial part of another's. In this context, it may be important to consider various approaches to trigger disclosure where it is more likely to be important, rather than in all cases. It may also be useful to have disclosure requirements, or guidance in fulfilling these requirements, that are *specific to certain industries or other subsets of registrants*."[66] And, even within a particular industry, an issue that is material for one company may be immaterial for another, given differences in, among other things, business models and financial condition. [67]

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(CCH) at 98,142 (C.D.Calif. 2014). There is also recent case law that a company can be held liable for securities fraud under Section 10(b) of the Securities Exchange Act for the omission from the MD&A of a known trend or uncertainty that is reasonably expected to have a material impact on the company's revenues, and "generic cautionary language" is inadequate. See *Stratte-McClure v. Morgan Stanley,* 776 F.3d 94, 100–01 (2d Cir.2015) (defendant failed to disclose potential subprime mortgage losses; mere "patchwork commentary on the relevant market trends" is insufficient). Moreover, in any fraud lawsuit under Section 10(b) a plaintiff must plead a strong inference that the defendant acted with "the required state of mind". An incomplete disclosure of material sustainability information in an SEC filing could provide a plaintiff with the grounds for satisfying that pleading requirement. Also, with respect to stand-alone sustainability reports, Section 10(b) applies to *any* public statements made by a public company, so a company can be sued for a fraudulent statement or material omission in such a report. See, e.g., *In re BP p.l.c. Securities Litigation,* 922 F. Supp. 2d 600 (S.D. Texas 2013) (purported misstatements in BP sustainability reports, among other documents and statements, were alleged as the basis for a securities fraud lawsuit in connection with the Deepwater Horizon oil spill; motion to dismiss granted in part and denied in part). It is likely that the rigorous controls, internal review process and possible third-party audit or review -- activities that typically accompany a company's SEC filings -- would lead to more reliable sustainability disclosures where made within SEC filings than where made outside, thereby reducing the potential for inaccuracies and resultant fraud claims. In addition, the Securities Exchange Act (as amended in 1995 by the Private Securities Litigation Reform Act) insulates forward-looking statements from liability when they are "accompanied by meaningful cautionary statements identifying important factors that could cause actual results to differ materially from those in the forward-looking statement." Courts have often held that mere "boilerplate" about risks is insufficient to satisfy these safe harbor requirements. See, e.g., In *re Harman Intern. Indus. Inc. Sec. Litig.,* 791 F. 3d (D.C. Cir. 2015). SASB-type disclosures would not be viewed as boilerplate and hence, when forward-looking in nature, would almost certainly be protected by the safe harbor. Finally, aside from private litigation, better sustainability disclosure would likely reduce exposure to investigations or lawsuits from law enforcement authorities. This includes others besides the SEC. In particular, state attorneys general have recently announced investigations into energy companies' SEC disclosures about climate change risks. This includes investigations by the New York Attorney General into filings made by Peabody Energy, which settled with New York in November 2015, and by ExxonMobil, where the investigation is ongoing. *See* John C. Richter, Brandt Leibe, and William S. McClintock, "Should Energy Companies Expect More Climate Change Probes?" (Law 360, April 18, 2016) available at http://www.kslaw.com/imageserver/KSPublic/library/publication/2016articles/4-18-16_Law360.pdf. Thus, although the case law in this area is not definitive, we think the concern about expanded liability exposure is likely unfounded; use of SASB standards would likely reduce, rather than increase, liability risk.

[65] Because SASB standards are industry-specific, they help issuers understand factors that are reasonably likely to be material to an investor and make disclosures that are specific to their own situation.

[66] Concept Release, 81 Fed. Reg. at 23919 (emphasis added).

[67] In fact, an industry lens is arguably more important for sustainability purposes than for traditional financial analysis because the key environmental, social, governance and other sustainability issues differ from one industry to the next based on, for example, how companies use resources to bring goods and

An industry-specific approach to sustainability disclosure is favored by investors. Financial analysts interpret the performance of companies and their securities through an industry lens. Nearly three-quarters of respondents to an EY investor survey considered industry-specific reporting criteria and key performance indicators (KPIs) to be very or somewhat beneficial to their investment decision making, and more than 70 percent saw metrics that link "non-financial" risks to expected performance as equally beneficial.[68] See Appendix C for a more detailed discussion of the industry-specific focus of SASB standards, a closer view of what is included in a SASB standard, as well as examples of industry-specific SASB disclosure topics, value drivers impacted by these issues, and selected metrics for their disclosure.

SASB research confirms that the materiality of sustainability issues varies greatly from industry to industry. (See Appendix C[69].) For example, climate risk permeates 72 of 79 industries, or 93 percent of the U.S. equity market. But how climate risk manifests itself—via the physical effects of climate change; the ability to transition to a low-carbon, resilient economy; and sensitivity to climate-related regulatory risk—varies from industry to industry.[70] (See Appendix D.)

Because investors want and need industry-specific standards through which to analyze sustainability performance over time,[71] we do not believe that requiring additional line-item sustainability-related disclosures would be a good idea. Investment analysts cover industries, not issues. Generally applicable line-item sustainability disclosure, often sought by groups with specific policy objectives,[72] would likely result in disclosure of immaterial information, because although sustainability-related issues may manifest themselves across industries, they do so differently from one industry to another. More boilerplate, box-check exercises in disclosure would serve neither investors or registrants. They would not make disclosure more effective. Moreover, establishing a market standard for the industry-specific disclosure of sustainability-related information would provide a market-informed process that allows for future evolution of investor needs and issuers' business models more efficiently than would governmentally-

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services to market, and in doing so, how they impact society and the environment. Sustainability issues impact financial performance in specific ways that vary by topic and industry. Investors need data through which performance on sustainability issues that are likely material can be tracked to evaluate and compare performance.

[68] EY, TOMORROW'S INVESTMENT RULES 2.0: EMERGING RISK AND STRANDED ASSETS HAVE INVESTORS LOOKING FOR MORE FROM NONFINANCIAL REPORTING, p. 24 (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf.

[69] Please refer to the interactive online version of the SASB Materiality Map™ for a comparison of likely material sustainability issues across different industries and sectors. www.sasb.org/materiality/sasb-materiality-map/.

[70] SASB, CLIMATE RISK: TECHNICAL BULLETIN 2016-01 (working draft Jan. 27, 2016), http://using.sasb.org/wp-content/uploads/2016/02/SASB-Technical-Bulletin-Climate-Risk-02022016c.pdf.

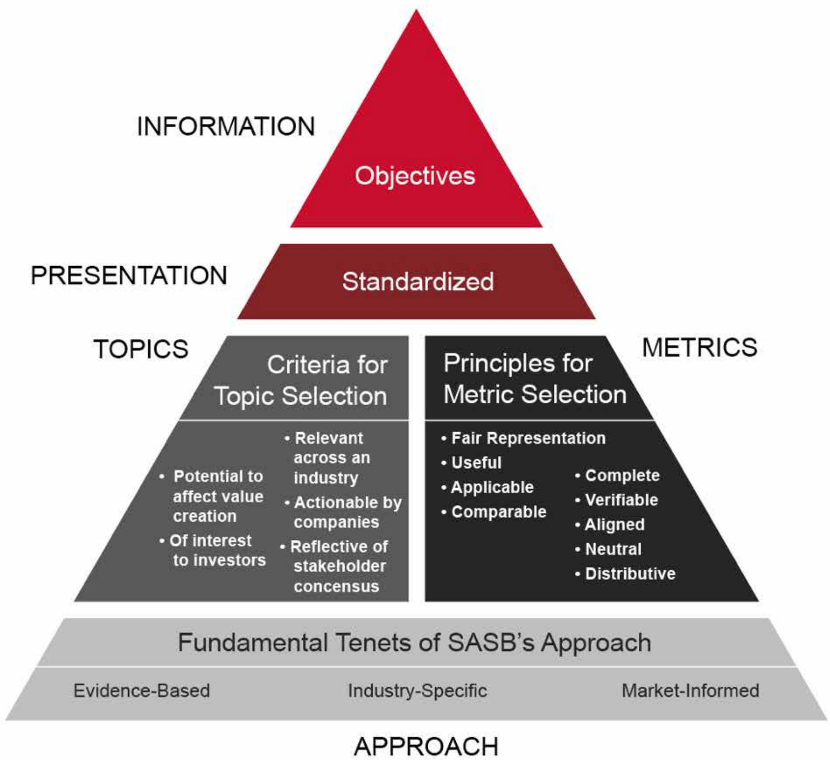
[71] EY, Tomorrow's Investment Rules 2.0: Emerging Risk and Stranded Assets Have Investors Looking for More from Nonfinancial Reporting, pp. 24-25, (2015), http://www.ey.com/Publication/vwLUAssets/EY-tomorrows-investment-rules-2/$FILE/EY-tomorrows-investment-rules-2.0.pdf.

[72] Concept Release, 81 Fed. Reg. at 23971, fn. 672 (citing the Business Roundtable's concern that "some groups are seeking to use the federal securities laws to address various societal concerns" and "suggesting that Commission guidance about when disclosure might be appropriate in this area would be more appropriate than expanding the disclosure requirements").

mandated, universally required line-item disclosure.[73] The same problems exist with respect to developing SEC industry guides, which would also be a time consuming and difficult task.[74]

SASB's overall approach is set forth in its Conceptual Framework,[75] a foundational document that guides SASB's provisional standards development process and explains the concepts and definitions relevant to SASB's work. See Figure D for a high-level overview of this process, including the fundamental tenets of SASB's standards setting approach, the criteria for disclosure topic selection, and the principles underlying metrics selection.

Figure D




[73] See infra p. 34, 36, 38, and 39 for a more detailed discussion of line-item disclosures.
[74] With respect to line item disclosure, we note that the Concept Release states that in response to its request for comment on the disclosure effectiveness initiative the SEC "received many letters recommending the Commission adopt a rule requiring disclosure of political spending," and cites, among 20 such letters, the letter submitted by SASB. Concept Release, 81 Fed. Reg. 23971 fn. 683. This is not accurate; SASB did not recommend the adoption of any such rule in its comment letter to the SEC. See SASB's November 12, 2014 comment letter on Disclosure Effectiveness Review: https://www.sec.gov/comments/disclosure-effectiveness/disclosureeffectiveness-22.pdf.
[75] SASB, Conceptual Framework (Oct. 2013), http://www.sasb.org/wp-content/uploads/2013/10/SASB-Conceptual-Framework-Final-Formatted-10-22-13.pdf. SASB's original Conceptual Framework was open for a 45-day period of public comment in 2013. As SASB's provisional standard-setting work is now complete, and SASB works toward the codification and ongoing maintenance of the standards, SASB has proposed an updated Conceptual Framework.

2. <u>Discussion of other sustainability organizations</u>:

In the Concept Release, the SEC seeks input on existing sustainability reporting organizations.[76] SASB is very familiar with the broad landscape of sustainability and industry organizations, and has worked closely with many in development of the SASB standards. In order to keep the SASB standards cost-effective for registrants, SASB references metrics already in use by industry, from roughly 200 entities, such as CDP, EPA, OSHA, GRI, and industry organizations such as IPIECA, EPRI and GRESB. (See Appendix E.) SASB benefits greatly from the work of these organizations and is able to cite the best available metrics that appropriately characterize performance on sustainability topics that are likely to be material and therefore should be disclosed in mandatory filings.

The most well-established such organization, devoted to corporate sustainability reporting, is the Global Reporting Initiative (GRI). GRI is an international NGO founded in 1999 that pioneered the concept of stand-alone sustainability reporting to multiple stakeholders. Its accomplishments have been great, but its audience and approach to sustainability reporting are very different from SASB's.

GRI advances an expansive sustainability agenda rather than focus on investor decision-making. Its guidance is designed for companies to voluntarily report to a broad range of stakeholders – employees, interest groups, policy makers, suppliers, customers, communities, and others, in addition to investors. On the other hand, SASB, as we have explained, is focused on investors' interests and reporting of material sustainability-related information in SEC filings.

Because of its international focus and underlying sustainable development agenda, GRI uses a broad definition of materiality which can be problematic for U.S. registrants seeking to make disclosures in SEC filings consistent with U.S. securities law.[77]

Another element of GRI's approach has traditionally been to reward companies for the quantity of disclosures rather than their quality. Under GRI frameworks G3 and G3.1, GRI reporters self-declared an "Application Level" for their reports (A+ through C) based largely on how many sustainability "indicators" were described in a company's sustainability report.[78] Companies

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[76] Concept Release, 81 Fed. Reg. at 23973

[77] GRI, G4 ONLINE – MATERIALITY. https://g4.globalreporting.org/how-you-should-report/reporting-principles/principles-for-defining-report-content/materiality/Pages/default.aspx.

GRI's current definition of materiality, set forth in the G4 reporting framework, which was introduced in 2013, states: "Materiality is the threshold at which Aspects become sufficiently important that they should be reported…*In financial reporting, materiality is commonly thought of as a threshold for influencing the economic decisions of those using an organization's financial statements, investors in particular. The concept of a threshold is also important in sustainability reporting, but it is concerned with a wider range of impacts and stakeholders. Materiality for sustainability reporting is not limited only to those Aspects that have a significant financial impact on the organization*." GRI goes on to advise companies, "(a) combination of internal and external factors should be used to determine whether an Aspect is material, *including factors such as the organization's overall mission and competitive strategy, concerns expressed directly by stakeholders, broader social expectations, and the organization's influence on upstream (such as supply chain) and downstream (such as customers) entities. Assessments of materiality should also take into account the basic expectations expressed in the international standards and agreements with which the organization is expected to comply"*.

[78] GRI, SUSTAINABILITY REPORTING GUIDELINES, (2000-2011) https://www.globalreporting.org/resourcelibrary/G3-Guidelines-Incl-Technical-Protocol.pdf. The G3 Framework was in place from 2006 to 2011. The G3.1 Framework was in place from 2011 through 2013

historically selected the topics on which they reported from a list of over 160 possible GRI topics in the G3 and G3.1 frameworks that, with the exception of some sector supplement topics, could apply to any company in any industry.[79] This is the main reason why, as discussed above, sustainability reports generally include information that is immaterial for purposes of investment decision-making. These reports tended to make the reporting company look as good as possible to stakeholders other than investors. As previously noted, a 2013 study of A and A+ GRI reports showed that 90 percent of known negative events were not included in them.[80] The G4 guidelines are designed in part to improve the quality of voluntary reporting; however, it remains to be seen whether they will be effective in that regard. BlackRock's recently published views on ESG issues notes that G4 guidelines list "over 400 indicators on corporate sustainability performance" and include "factors that go beyond investment-related issues."[81] As a result, comparing the performance of companies under the GRI approach will continue to be difficult, if not impossible. GRI reports are also cumbersome and costly for companies to produce compared to using SASB's standards which include, on average, just five topics for a given company within an industry. Moreover, GRI's "one size fits all approach" to addressing literally hundreds of environmental and social issues still misses many of the financially-material issues that are important to investors because these issues are industry-specific. As a leading U.S. investor advocate stated this month, GRI "has not distilled into a framework investors can use".[82]

Moreover, the contrast between GRI's and SASB's approach to standard setting could hardly be more stark. GRI, which is based in Amsterdam, developed the G4 framework with minimal input from U.S. investors.[83] SASB's focus is sustainability disclosure specific to SEC filings; it uses

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when GRI released the G4 guidelines. Under GRI's "Application Level" grading system for G3 and G3.1 reports, companies self-declared Application Levels for GRI reports were "based on (their) own assessment of (their) report content against the criteria in the GRI Application." Companies that "had considered" all possible indicators and that reported on at least 20 of them, and who had reported on Level B and Level C Profile Disclosures, could declare a B Level report. Companies declaring an A Level designation for their reports also had to report on Level B and C Profile Disclosures, in addition to responding to "each core and Sector Supplement indicator with due regard to the materiality Principle by either: a) reporting on the indicator or b) explaining the reason for its omission." "An organization (could) self-declare a "plus" (+) at each level (ex., C+, B+, A+)" if their report had been externally assured. Companies could request a "GRI Application Level Check" to confirm their self-declared Application Level. GRI gave companies two reporting cycles to transition to reporting under the G4 guidelines, and stopped supporting G3 and G3.1 reporting of January 1, 2016. G4 does not employ an Application Level system. Instead, reports are designated as "core" or "comprehensive". See G4 SUSTAINABILITY REPORTING GUIDELINES, https://www.globalreporting.org/standards/g4/Pages/default.aspx.

[79] GRI, G3.1 CONTENT INDEX, https://webcache.googleusercontent.com/search?q=cache:Q4SUny5QfisJ:https://www.globalreporting.org/resourcelibrary/G3-1-Index-and-Checklist.xls+&cd=1&hl=en&ct=clnk&gl=us&client=safari.

[80] Olivier Boiral, *Sustainability Reports as Simulacra? A Counter-Account of A and A+ GRI Reports*, ACCOUNTING, AUDITING & ACCOUNTABILITY JOURNAL, Vol. 26, No. 7, p. 1036–71 (2013), http://www.emeraldinsight.com/doi/pdfplus/10.1108/AAAJ-04-2012-00998.

[81] BlackRock, VIEWPOINT, EXPLORING EGS: A PRACTITIONER'S PERSPECTIVE, p. 4 (June 13, 2016) https://www.blackrock.com/corporate/en-us/literature/whitepaper/viewpoint-exploring-esg-a-practitioners-perspective-june-2016.pdf.

[82] Peter Cripps, *The Irresistible Force*, ENVIRONMENTAL FINANCE, (June 17, 2016), quoting CalPERS' Senior Portfolio Manager of Investments and Director of Global Governance, Anne Simpson. The article also states that Ms. Simpson "favors the methodology devised by the Sustainable Accounting Standards Board and hopes that investors and companies will rally around it."

[83] GRI G4 DEVELOPMENT, FIRST PUBLIC COMMENT PERIOD, 26 AUGUST – 24 NOVEMBER, 2011, FULL SURVEY REPORT, (February 10, 2012) https://www.globalreporting.org/resourcelibrary/G4-PCP1-Full-Report.pdf.

U.S. securities law as its starting point, with input from investors throughout the standard-setting process, guided throughout by an independent board comprising several high-ranking former SEC officials.

Another organization cited in the Concept Release is the International Reporting Council (IIRC). The IIRC is a global coalition of regulators, investors, companies, standard setters, the accounting profession and NGOs. The framework established by the IIRC is designed with investors in mind; it promotes integrated reporting (that is, the combined reporting of strategic, financial and sustainability-related information in an annual or sustainability report) but does not develop actual disclosure standards for use in such reports. The framework remains at the level of principles. Its work complements that of SASB; indeed, citing the alignment between the two organizations, SASB and the IIRC entered into a Memorandum of Understanding in 2014.[84]

**Our Recommendation**

Because of SASB's approach, with its emphasis on due process and use of the U.S. securities laws as its framework, we believe it would be appropriate for the SEC to acknowledge the SASB framework as a credible set of standards and metrics that can be used by companies to fulfill their regulatory reporting requirements. The Commission could make this acknowledgement in an interpretive release or in some similar format.

Such recognition by the SEC of standards set by outside organizations has precedent. For example, in its adoption of a final rule under Section 404 of the Sarbanes-Oxley Act, the Commission referred to the Committee of Sponsoring Organizations of the Treadway Commission (COSO) Framework as an acceptable approach for management's evaluation of internal control. The SEC Release stated:

> *After consideration of the comments, we have modified the final requirements to specify that management must base its evaluation of the effectiveness of the company's internal control over financial reporting on a suitable, recognized control framework that is established by a body or group that has followed due-process procedures, including the broad distribution of the framework for public comment. The COSO Framework satisfies*

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"1832 individuals and organizations provided feedback to the online survey.... *Mediating Institutions from Europe formed the largest overall number of participants with 22.5% representation, followed then by European business representatives at 12.65%."* (Emphasis added.) Just 15% of all participants were North American (no breakdown of U.S. vs. Canada and Mexico). North American investors accounted for less than 1% of stakeholders weighing in on the G4 guidelines. Also, there is very little U.S. representation on GRI's Stakeholder Council. See GRI Stakeholder Council Members https://www.globalreporting.org/information/about-gri/governance-bodies/stakeholder-council/Pages/Stakeholder-Council-Members.aspx. GRI announced that it will transition the G4 Guidelines to a set of modular Sustainability Reporting Standards via its independent standards-setting body, the Global Sustainability Standards Board, GSSB, before the end of 2016. Details on the transition from the G4 Guidelines to GSSB standards for sustainability reporting can be found at: https://www.globalreporting.org/standards/transition-to-standards/Pages/default.aspx.

[84] SASB. *SASB and IIRC Announce Memorandum of Understanding,* http://www.prnewswire.com/news-releases/sasb-and-iirc-announce-memorandum-of-understanding-240298181.html.
With respect to integrated reporting, SASB considers itself an advocate of integrated reporting within the context of the U.S. securities laws. The mandatory SEC filings for which SASB standards are designed are integrated to the extent they include material strategic, financial, and sustainability-related information.

> *our criteria and may be used as an evaluation framework for purposes of management's annual internal control evaluation and disclosure requirements.*[85]

The SEC took a similar approach in its conflict-minerals rule adopted pursuant to Section 1502 of the Dodd-Frank Act. The rule requires that an issuer's due diligence with respect to conflict mineral determinations "follow a nationally or internationally recognized due diligence framework" so as to "enhance the quality" and "promote comparability" of conflict mineral reports. The Commission stated that guidance issued by the Organization for Economic Cooperation and Development (OECD) can be used as a framework for purposes of satisfying the rule, noting that the OECD had adopted the framework by following due process procedures, including the opportunity for input from a broad range of interested parties.[86] Similarly, as discussed above, SASB has followed, and continues to follow, due process in the setting of its standards.

And, just last month, the SEC proposed rules aimed at overhauling and modernizing disclosure requirements for companies with material mining operations. The proposed rules would align the SEC's disclosure requirements with industry standards developed by a non-governmental organization, the Committee for Mineral Reserves International Reporting Standards (CRIRSCO).[87]

**Summary and Conclusion**

In the words of former SEC Chair and SASB board member Elisse Walter, "Disclosure is the foundation of securities laws, in the United States and many other nations, and transparency is the engine that propels our capital markets forward. But as the world continues to evolve—and its economies along with it—our disclosure requirements and reporting standards have not always kept pace."[88]

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[85] Securities and Exchange Commission, Final Rule: Management's Report on Internal Control Over Financial Reporting and Certification of Disclosure in Exchange Act Periodic Reports [SEC Release Nos. 33-8238; 34-47986; IC-26068; File Nos. S7-40-02; S7-06-03] (June 5, 2003); https://www.sec.gov/rules/final/33-8238.htm.

[86] Securities and Exchange Commission, Final Rule: Conflict Minerals, [SEC Release No. 34-67716], August 22, 2012, at 205-207; https://www.sec.gov/rules/final/2012/34-67716.pdf.
There are other precedents for the SEC's reliance on private-sector initiatives in promulgating its rules. Most prominent is the Financial Accounting Standards Board; although the history of and statutory framework for development of accounting standards is different from the one here, the important point of comparison is that the FASB is a private sector body that the SEC has long relied on to promulgate accounting standards. See generally, Policy Statement: Reaffirming the Status of the FASB as a Designated Private-Sector Standard Setter [SEC Release Nos. 33-8221; 34-47743; IC-26028; FR-70] (April 25, 2003). Another example is the SEC's adoption in 1999 of revised disclosure requirements for foreign private issuers to conform to the disclosure requirements endorsed by a non-governmental body, the International Organization of Securities Commissions (of which the SEC is a member). Securities and Exchange Commission, Final Rule: International Disclosure Standards [SEC Release Nos. 33-7745; 34-41936; International Series Release No. 1205] (September 28, 1999). Here, unlike these other examples where non-governmental rulemaking has been incorporated into the SEC's rules themselves, we are merely urging that the SEC acknowledge the appropriateness of the SASB standards for use by companies seeking to make more fulsome and complete MD&A and risk factor disclosures.

[87] Securities and Exchange Commission, Proposed Rule: Modernization of Property Disclosures for Mining Registrants, [SEC Release Nos. 33-10098; 34-78086], June 16, 2016. The SEC's proposing release describes CRIRSCO as "an international initiative to standardize definitions for mineral resources, mineral reserves, and related terms for public disclosure." Id. at 17.

[88] Elisse Walter, former SEC Chair and SASB board member, addressing delegates of the Sustainable Stock Exchanges Global Dialogue, Geneva, Switzerland (Oct. 14, 2014).

Sustainability disclosures in particular have not kept pace with investor needs. The SEC's rules governing MD&A and risk factors would seem to require much sustainability disclosure; what has been missing is a comprehensive, industry-specific, and materiality-based set of standards and metrics that would facilitate such disclosure. The development of both is the sine qua non behind SASB's establishment and work over the past five years.

As discussed above, other sustainability frameworks and guidance are designed for stakeholder engagement and voluntary reporting outside of SEC filings to a broad range of interested parties and stakeholders. The U.S. capital markets have their own unique needs, different from those of suppliers, customers, communities, interest groups, and other stakeholders. Investors demand reliable and comparable sustainability information with clear links to financial performance. We respectfully submit that SASB's framework is the only sustainability reporting solution specifically designed to meet the needs of the U.S. capital markets.

SASB's approach is principles-based. Our standards are voluntary, and companies themselves must decide whether to make disclosures consistent with SASB standards. SASB merely provides the tools for companies to make better disclosures consistent with SEC requirements. The standards provide suitable criteria for assurance by independent third parties and allow investors to obtain reliable, benchmarkable data on material sustainability factors. Because of SASB's approach, with its emphasis on due process and adherence to U.S. securities law, we believe it would be appropriate for the SEC to acknowledge SASB standards, once they become final, as an acceptable framework for companies to use in their mandatory filings to comply with Regulation S-K in a cost-effective and decision-useful manner.

Thus, from the SEC's standpoint, we believe that the reasons for adopting our recommendation are many. The SEC would be responding to a clear investor demand; it would respond to this demand without having to engage in time-consuming and potentially controversial rulemakings, as would likely be the case under a line-item approach; it would demonstrate leadership in this important area of public interest; it would decrease the level of investor confusion that results from reliance on rose-colored sustainability reports; it would reduce the disparity of information that exists between large investors (who frequently obtain access to particular sustainability-related information) and small investors (who generally lack such access); it would lessen the occurrence of possible violations of Regulation FD; and it would, most fundamentally, improve the quality of material "pre-financial statement" disclosures made to investors.

We should note, however, that we would also support additional actions by the SEC to improve the quality of sustainability disclosures. For instance, the Commission could adopt a fairly straightforward, principles-based rule such as a requirement that registrants provide a description of sustainability-related risks that exist over the next five years, along with performance data and mitigation approaches. SASB standards are a perfect complement to support issuers in making cost-effective, comparable disclosures to investors. Such a requirement would lead to better risk disclosures than exist today.

* * *

The objective of the SEC's disclosure effectiveness review is to "improve the disclosure regime for both investors and registrants." We are grateful for the Commission's work to help disclosure evolve to meet the challenges and opportunities companies and their investors face in the 21st century. We are fully supportive of your efforts to modernize disclosure while protecting investors and facilitating efficient functioning of the markets and formation of capital. We appreciate your consideration of our comments.

Sincerely,

Jean Rogers, Ph.D., P.E.
CEO and Founder
Sustainability Accounting Standards Board

cc: Chair Mary Jo White
Commissioner Kara M. Stein
Commissioner Michael S. Piwowar

Keith Higgins, Director, Division of Corporation Finance

**Appendix A: Responses to Formal Concept Release by Section and Question**

**III.B.1. Principles-Based and Prescriptive Disclosure Requirements**

**6. Should we revise our principles-based rules to use a consistent disclosure threshold? If so, should a materiality standard be used or should a different standard, such as an "objectives-oriented" approach or any other approach, be used? If materiality should be used, should the current definition be retained? Should we consider a different definition of materiality for disclosure purposes? If so, how should it be defined?**

> **SASB Comment:** SASB believes that the current definition of "materiality" serves investors and issuers well; for purposes of disclosing sustainability information, it is an appropriate standard. Based on that standard, a great deal of sustainability-related information is immaterial, as it is not likely to affect a company's financial condition or results of operations. Recent research from the Harvard Business School indicates that approximately 80 percent of what companies currently report related to sustainability (outside of their 10-K) is immaterial to investors.[89]
>
> A lowering of the materiality standard either by broadening the consideration for disclosure to include interested persons beyond reasonable investors, or requiring a lower threshold in which there is not likely to be a financial impact from a known trend, demand, commitment, event, or uncertainty could cause issuers to "simply bury the shareholders in an avalanche of trivial information," a result the Supreme Court warned against in the *TSC v. Northway* decision.[90] SASB's approach—consistent with the Supreme Court's definition—is to focus on those topics that are reasonably likely to affect an investment decision.
>
> Some other frameworks for sustainability disclosure have taken a broader approach to materiality. SASB believes the use of the well-accepted definition of materiality requires that issuers distinguish material information from anecdotal or "nice to know" information that is not likely to influence an investor's decision to buy or sell a security.
>
> All of the topics in SASB standards are considered known trends, risk, or uncertainties within the particular industry. As part of SASB's standards setting process, we maintained a threshold of 75 percent consensus on the likely materiality of the topic between issuers and investors. If 75 percent consensus was not obtained, the topic was not taken forward for standard setting. The materiality of the topics was further substantiated by research that indicates a tangible link from performance on the sustainability-related factor to financial performance. (See Figure E. See also Appendix G.)

[89] Mozaffar Khan, George Serafeim and Aaron Yoon, *Corporate Sustainability: First Evidence on Materiality*, THE ACCOUNTING REVIEW (Harvard Business School, March 9, 2015), http://hbswk.hbs.edu/item/corporate-sustainability-first-evidence-on-materiality.

[90] 426 U.S. 438, 448-49 (1976).

**Figure E**
**Materiality in Practice as a Basis for Standards Setting**
SASB standards include issues with demonstrated evidence of impacts on the financial condition and operating performance of a company

| | Disclosure Topics Examples | Types of Financial Drivers | Financial Impact |
|---|---|---|---|
| 1 | *Drug safety and side effects* | Demand for Core Products and Services | REVENUE |
| 2 | *License to Operate* | Market Share and Long-Term Growth | |
| 3 | *Energy-efficient chemicals production* | Operational Efficiency/ Cost Structure | COST |
| 4 | *Operational safety of gas pipelines* | Governance, Volatility and Risk Factors | COST OF CAPITAL |
| 5 | *Stranded coal assets* | Tangible and Intangible Assets and Liabilities | ASSETS & LIABILITIES |

**9. Do registrants find it difficult to apply principles-based requirements? Why? If they are uncertain about whether information is to be disclosed, do registrants err on the side of including or omitting the disclosure? If registrants include disclosure beyond what is required, does the additional information obfuscate the information that is important to investors? Does it instead provide useful information to investors?**

**SASB Comment:** The rules governing the disclosure of known trends and uncertainties in the MD&A,[91] as well as risk factors,[92] are principles-based. The extensive use of boilerplate language to disclose sustainability-related information[93] indicates that registrants find it challenging to effectively disclose such information. We believe this result stems from the absence of accepted standards for such disclosure rather than from the principles-based disclosure requirements.

[91] 17 C.F.R. 229.303 (Item 303(a)(3)(ii)) (2011).
[92] 17 C.F.R. 229.503 (2011).
[93] See Appendix B for an overview of SASB research findings. Detailed analyses available in the form of SASB industry research briefs at http://www.sasb.org/approach/our-process/industry-briefs. SASB is developing a Disclosure Navigator tool for public use, also described at greater length in Appendix B.

**III.B.3. Compliance with Environmental Laws (Item 101(c)(1)(xii))**
**50. Is disclosure about the material effects that compliance with provisions regulating the discharge of materials into the environment, or otherwise relating to the protection of the environment, may have upon a registrant's capital expenditures, earnings and competitive position important to investors? If so, should we require registrants to present this disclosure in a specific format? Would this disclosure be more appropriate in MD&A or the business section?**

> **SASB Comment:** SASB research shows that compliance with environmental laws can be material in some but not all industries. Capital expenditure (CAPEX) required for controls to ensure compliance with new regulation and/or policy related to reducing greenhouse gas emissions is one example of investor interest in this type of information. Investors are also increasingly interested in seeing shifts in planned CAPEX of companies with potentially stranded assets in industries such as coal, and oil and gas production.[94]

**IV.B.3. Content and Focus of MD&A (Item 303—Generally)**
**90. There are various sources of Commission and Division guidance on MD&A. These include Commission releases, sections of the Division's Financial Reporting Manual and staff Compliance and Disclosure Interpretations. Given the amount of Commission and staff guidance on MD&A, should we consolidate guidance in a single source? If so, which guidance remains helpful, and is there guidance that we should not include in a consolidation? Would consolidation of this guidance facilitate registrants' compliance with the item's requirements, or is the existing form of this guidance sufficient?**

> **SASB Comment:** Consolidation of guidance into a single source would likely make such guidance easier to follow. MD&A guidance from 1989, 2002, 2003, and SAB 99 could be consolidated into one document. Issuers would also benefit from additional summaries of relevant case law.

**96. Should we require auditor involvement (e.g., audit, review or specified procedures) regarding the reliability of MD&A disclosure, and if so, what should the nature of the involvement be? What would be the benefits and costs to registrants and to investors?**

> **SASB Comment:** There clearly would be benefits from a third-party assurance of information contained in the MD&A, and the SASB standards are designed to be auditable. However, a requirement for such assurance would add to the costs imposed on issuers, including additional audit fees and the cost of improved internal control over MD&A data. On the other hand, it should be noted that greater accuracy and reliability of MD&A disclosures could well reduce issuers' cost of capital and liability exposure. We think it likely that registrants' investment of upgrading internal controls over this data would be offset by the reduction in costs associated with investor surveys, as well as the benefits of controlled performance-related data on material factors. SASB research conducted during the provisional standards-setting phase indicates that a high degree of

[94] *See, e.g.*, Andrew Grant, James Leaton, Paul Spedding and Mark Fulton, *Sense and Sensitivity: Maximizing Value with a 2D Portfolio*, Carbon Tracker, (Carbon Tracker Initiative May 2016), http://www.carbontracker.org/wp-content/uploads/2016/05/Sense-Sensitivity_Full-report2_28042016.pdf. Investors would like to see CAPEX disclosures showing how companies are transitioning toward a less-carbon-intensive economy, rather than "pursu[ing] volume at all costs."

this data is collected and reported.[95] Quantifying more specifically the extent to which registrants already have and are managing this data is the focus of ongoing SASB research. Existing PCAOB standards – AT 101 and AT 701 – would govern the procedures used for audits or other procedures (for instance, a review or examination) of ESG information.

**99. Does the two-step test for disclosure of a known trend, demand, commitment, event or uncertainty result in the most meaningful forward-looking disclosure? Why or why not? How do registrants determine when something is "reasonably likely" to occur?**

**SASB Comment:** The two-step test first considers the likelihood of occurrence of the known trend or uncertainty. If management cannot determine that the known trend or uncertainty is not reasonably likely to occur, then management must evaluate the consequences on the assumption that it will come to fruition. Disclosure is then required unless management decides that a material effect on the company's financial condition or results of operation is not reasonably likely to occur.

We believe that this test has worked well. It has been used by SASB in its standard-setting. Now that SASB's provisional standards have been issued, they are an excellent starting point for issuers to evaluate known trends and uncertainties within an industry, as identified by peers and substantiated by evidence of financial impact either on one company or on the industry as a whole. In this regard, SASB has developed a "Mock 10-K" for six industries to demonstrate effective disclosure on sustainability-related matters in an MD&A context.[96]

**100. Should we revise the two-step test to apply a different standard in the first prong and if so, how? For example, should we require disclosure when a trend, event or uncertainty is more likely than not, probable, or reasonably possible to occur, rather than "reasonably likely" to occur?**

**SASB Comment:** The 2,800 participants in SASB's working groups weighed in (with 75 percent consensus) that the topics in SASB standards were reasonably likely to be material. "Reasonably likely" (more than a remote possibility) is an appropriate standard for sustainability-related information.[97]

**101. Should we eliminate the two-step test in favor of a different standard for identifying required and optional forward-looking disclosure and, if so, what test would be**

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[95] Preliminary SASB research shows that SASB metrics are presently recorded and tracked internally as follows: 5% associated with required public disclosure, such as SEC filings and/or regulatory disclosure such as GHG emissions; 20% are included in voluntary sustainability and/or industry trade association reports; 27% are required to be tracked but not publicly reported, (e.g., OSHA Equal Employment Opportunity Commission data); 48 are optionally, but commonly tracked internally, (e.g., energy and water use).

[96] SASB MOCK 10-K LIBRARY, http://using.sasb.org/mock-10-k-library/.

[97] A detailed summary of SASB Industry Working Group outcomes is available in the Industry Working Group Due Process Reports published for each of 10 sectors. These reports can be found under the Sectors tab on SASB's website – www.sasb.org. An example of one such report can be found here: http://www.sasb.org/wp-content/uploads/2014/02/NRRDueProcessReview_forSC.pdf . Please also refer to the SASB Blog, INDUSTRY EXPERTISE INFORMS SASB TOPICS AND METRICS, December 9, 2015. http://www.sasb.org/industry-expertise-informs-sasb-topics-metrics/.

**appropriate? For example, should we revise Item 303 to incorporate the probability/magnitude standard from *Basic v. Levinson*? Which standard – the two-part test, *Basic's* probability/magnitude standard, or some other standard – should we require, and why? Would any particular formulation be more or less burdensome for registrants?**

**SASB Comment:** The two-step test is most appropriate for forward-looking sustainability-related information. The probability/magnitude standard is more difficult to apply in this context because of uncertainty as to the magnitude of the financial impact of most sustainability issues. SASB standards provide a way to fortify management's discussion with analysis that enables investors and management alike to evaluate the company's prospects and outlook with respect to material risks that the industry is facing due to sustainability-related matters.

SASB utilizes the two-step test in consideration of what is reasonably likely to be material for companies in a given industry, and agrees with SEC guidance regarding the need for "early warning" disclosures of material risks and uncertainties that, if realized, could have a material adverse effect on a particular company's liquidity, capital resources or operating results."[98] SASB favors keeping the two-step test in place and believes the current application of the standard in the first prong of the test – requiring disclosure when it is "reasonably likely" the known trend, demand, commitment, event or uncertainty will come to fruition – serves issuers and investors well. Introducing a new test at this time likely would lead to uncertainty.

**102. We have stated previously that quantification of the material effects of known material trends and uncertainties can promote understanding and may be required to the extent material. Should we revise Item 303 to specifically require registrants, to the extent practicable, to quantify the material effects of known trends and uncertainties as well as the factors that contributed to those known trends and uncertainties? Why?**

**SASB Comment:** With respect to sustainability related information, for topics that are known trends or uncertainties, issuers may be able only to characterize the nature of their performance with respect to the underlying drivers of value; for example, safety record, emissions trends, critical resource use and availability, labor relations and obligations, or vulnerability of assets to weather related events. These are pre-financial statement measures, best characterized and are best understood in the context of an industry benchmark.

**IV.C.1 Risk Factors (Item 503(c))**

**145. How could we improve risk factor disclosure? For example, should we revise our rules to require that each risk factor be accompanied by a specific discussion of how the registrant is addressing the risk?**

**SASB Comment:** Yes. The SEC should require registrants to accompany risk factors with a specific discussion that includes performance and how the registrant is addressing the risk. Issuers pay a risk premium when it comes to cost of capital for

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[98] Catherine T. Dixon, *SEC Disclosure and Corporate Governance: Financial Reporting Challenges for 2011 (*Harvard Law School Forum on Corporate Governance and Financial Regulation March 15, 2011) https://corpgov.law.harvard.edu/2011/03/15/sec-disclosure-and-corporate-governance-financial-reporting-challenges-for-2011/.

including boiler plate risks but not addressing risk management or mitigation. In many cases, companies are saying much more about how these material risks are being managed outside of their mandatory filings, albeit in a non-comparable, and uncontrolled manner (for example, websites, questionnaires, and sustainability reports). It is therefore obvious from disclosures outside the 10-K that issuers can and should be saying more to provide a complete disclosure to investors that characterizes the nature of the risk.

**146. Should we require registrants to discuss the probability of occurrence and the effect on performance for each risk factor? If so, how could we modify our disclosure requirements to best provide this information to investors? For example, should we require registrants to describe their assessment of risks?**

**SASB Comment:** SASB standards provide a way for registrants to disclose their performance on risks in a cost-effective and comparable way that levels the playing field for all companies within an industry, reducing the risk of disclosure of "competitive" information. Registrants should describe their performance in the context of the industry, and any factors or measures that management is taking to ensure a positive trend or outcome, ultimately to reduce the risk of volatile sustainability-related events or a long-term erosion of value.

**147. How could we modify our rules to require or encourage registrants to describe risks with greater specificity and context? For example, should we require registrants to disclose the specific facts and circumstances that make a given risk material to the registrant? How should we balance investors' need for detailed disclosure with the requirement to provide risk factor disclosure that is "clear and concise"? Should we revise our rules to require registrants to present their risk factors in order of management's perception of the magnitude of the risk or by order of importance to management? Are there other ways we could improve the organization of registrants' risk factors disclosure? How would this help investors navigate the disclosure?**

**SASB Comment:** SASB Mock 10-Ks[99] are designed specifically for this condition: to allow management to provide a view of how they are managing risk, along with underlying performance data that can provide context for the investor to understand and price the relative risk of a particular security vis à vis industry peers.

**148. What, if anything, detracts from an investor's ability to gain important information from a registrant's risk factor disclosure? Do lengthy risk factor disclosures hinder an investor's ability to understand the most significant risks?**

**SASB Comment:** Risk factors that do not have accompanying comparable performance data are challenging for investors to use. Investors need to be able to discern performance on a risk factor in an industry context.

**149. How could we revise our rules to discourage registrants from providing risk factor disclosure that is not specific to the registrant but instead describes risks that are common to an industry or to registrants in general? Alternatively, are generic risk factors important to investors?**

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[99] SASB MOCK 10-K LIBRARY, http://using.sasb.org/mock-10-k-library/.

**SASB Comment:** Risks facing an industry, particularly sustainability-related risks, are essential for investors to understand. These risks alter the risk/return profile of an industry. However, not all companies perform the same when it comes to risks the industry is facing, whether it is resource scarcity, the threat of regulation, or supply chain issues. Investors manage industry risks by tilting or weighting their portfolio towards companies that are managing those risks well and avoiding ones that are poor performers—or by ensuring that the security pricing adequately reflects the risk the investor is taking. SASB standards enable companies to provide quantitative performance data, along with management's narrative, on sustainability-related risks in an industry context. This enables investors to discern corporate performance and adjust accordingly. It also enables issuers to provide their "story" substantiated by comparable data. In some cases, leading companies that manage sustainability-related risks well are not given credit because the information is not comparable and dismissed as "greenwashing". SASB standards could be used to address industry-related risks while companies also provide a narrative to provide investors with decision-useful information.

**153. Are there ways, in addition to those we have used in Item 503, our Plain English Rules and guidance on MD&A, to ensure that registrants include meaningful, rather than boilerplate, risk factor disclosure?**

**SASB Comment:** We believe that the SASB standards can provide management's view on known trends and uncertainties underpinned by analysis using metrics that are comparable between industry peers. As demonstrated in SASB Mock 10-Ks, a registrant that uses SASB standards to describe its material risks provides meaningful and comparable disclosure to investors.

**154. Risk profiles of registrants are constantly changing and evolving. For example, registrants today face risks, such as those associated with cybersecurity, climate change, and arctic drilling, that may not have existed when the 1964 Guides and 1968 Guides were published. Is Item 503(c) effective for capturing emerging risks? If not, how should we revise Item 503(c) to make it more effective in this regard?**

**SASB Comment:** Sustainability topics are dynamic because they can arise from social and environmental externalities. The materiality of a particular topic can vary based on investor views, social norms, changing technology, new regulation, and resource availability, for example. While the broad landscape of sustainability issues is highly dynamic (e.g., fracking chemicals, counterfeit drugs, water shortages, automobile safety recalls) within an industry, the trends are observable and the rate of change is manageable. Emerging topics are either due to, or precipitate, changes in the way companies in the industry do business. For this reason, an industry approach is the best lens for evaluating emerging sustainability-related topics. In SASB's standards setting process, emerging topics were identified that were not yet substantiated by tangible evidence of financial impact or significant investor interest. These issues will be evaluated again in the codification phase for evidence of materiality.

**IV.E.3 Industry Guides**

**209. Should some or all of the Industry Guides be updated? If so, which ones? Should additional Industry Guides or industry-specific rules for other industries be developed? If so, which industries would benefit from such guidance? Should industry-specific disclosure in Regulation S-K or staff guidance be limited to certain industries? If so, what criteria should be used to identify those industries?**

**SASB Comment:** Industries have unique characteristics that give rise to material financial and non-financial information, making industry guides essential tools that enable registrants to focus on providing material information, and investors to interpret a registrant's performance in the context of their industry. Many industries have unique valuation methods and all have distinct value drivers. With respect to sustainability-related information, SASB develops standards for 79 industries. Each industry has a unique profile with respect to environmental, social, or governance factors that are reasonably likely to be material to an investor.

Examples of sustainability-related disclosure topics that are likely material and how they vary from industry to industry include:

- Exposure to counterfeit drugs (Pharmaceuticals)
- Product safety and volume of recalls (Automobiles)
- Access to water resources (Beverages)
- The carbon-intensity of the energy supply and the ability to meet renewable portfolio standards (Utilities)
- Worker safety (Mining)
- Value of reserves and impacts of fracking practices (Oil and Gas Exploration and Production)

It is important that the Commission recognize the industry-specific nature of material ESG risks, either in industry guides as they are updated, in new industry guides that may be developed, and/or by referring to the SASB industry standards as an acceptable framework for compliance with Regulation S-K.

An industry lens is essential to keep ESG disclosures cost-effective for registrants (SASB standards contain, on average, just five topics per industry) as well as decision-useful for investors. Industry benchmarking is a critical function of financial analysts, for selection and valuation of securities. Disclosure standards by industry allow for peer-to-peer comparison and benchmarking. Without industry data, disclosures on material factors by a registrant, even if detailed, are challenging for financial analysts to interpret and use.

Industry conditions change over time, but they do not change so frequently that industry standards cannot be developed and maintained. For example, 10 years ago, fracking was not on the radar. Today, we face a broad array of climate risks that are only beginning to be understood by industry. SASB's evidence-based process of developing and maintaining standards with extensive market feedback and industry input, is a suitable and rigorous process that can be responsive to changing industry conditions. SASB's dedicated sector analysts monitor industry conditions daily, and update evidence of materiality for industry issues on an ongoing basis. This evidence can be accessed in SASB's Standards Navigator tool, which is a digital, searchable form of SASB standards.

In addition to developing industry standards that allow for disclosure of material ESG risks, SASB sources activity metrics for each industry from relevant industry associations and other organizations. Where suitable activity metrics are not available, SASB develops new metrics, such that the data can be easily interpreted by industry analysts. These activity metrics are industry value drivers that can be used to normalize and compare both financial and non-financial data. Examples include:

- Number of company owned and franchise restaurants, and number of employees at each (Restaurants)
- Passenger load factor, number of departures, and age of fleet (Airlines)
- Wellhead production, by type (Oil and Gas)
- Number of assets and leasable floor area, and occupancy rates, by property subsector (Real estate)

Activity data is useful for investors of all types, and can be applied to financial as well as ESG data.

SASB recommends that the SEC incorporate SASB standards by reference into the industry guides that it is updating, so that registrants understand which sustainability-related risks they should be disclosing, and how to disclose them in a decision-useful, comparable format.

Additionally, SASB recommends that the SEC more broadly recognize SASB as a suitable framework for use by registrants to comply with Regulation S-K, in the event that the Commission does not produce industry guides for all industries.

Using the Bloomberg Industrial Classification System (BICS) as an underlying taxonomy, SASB has mapped registrants' primary, secondary, and tertiary revenue streams to SASB industry standards, so that registrants with significant activities in multiple industries can understand which industry standards may apply to them. Registrants are able to go to SASB's website and and determine which industry standards apply to their company by simply typing in their ticker symbol.[100]

**215. What types of investors or audiences are most likely to value the information that registrants would not disclose but for the Industry Guides?**

**SASB Comment:** Investors need access to material information in order to understand and price risk. The type of ESG information that is financially material is best determined by industry, because of the types of resources that industries use to bring goods and services to market, and how they impact, or are impacted by, society and the environment. This, in turn, can affect the risk profile and/or the financial condition or operating performance of some or all companies in an industry. Investors use industry information to assess the risk/return profile of their portfolio depending upon their industry allocation. They also use it in comparing and valuing securities with respect to an industry benchmark.

[100] SASB, SICS Look-up Tool, http://www.sasb.org/lookup-tool/.

**IV.F.3 Disclosure of Information Relating to Public Policy and Sustainability Matters**

**216. Are there specific sustainability or public policy issues that are important to informed voting and investment decisions? If so, what are they? If we were to adopt specific disclosure requirements involving sustainability or public policy issues, how could our rules elicit meaningful disclosure on such issues? How could we create a disclosure framework that would be flexible enough to address such issues as they evolve over time? Alternatively, what additional Commission or staff guidance, if any, would be necessary to elicit meaningful disclosure on such issues?**

**SASB Comment:** As changes occur in the broader economy, the information that markets need to efficiently allocate capital may also change in ways that require public companies to adjust their disclosures. In today's world, sustainability issues can impact financial performance in very specific ways that vary by topic and industry. To elicit meaningful disclosure on these issues, and to enable investors to make informed decisions about them, understanding what sustainability issues are likely to constitute material information for companies in a given industry is necessary, as are standardized metrics by which performance on these issues can be evaluated. To provide investors with this disclosure, the capital markets need sustainability accounting standards that are created by the market, specific to industry, and compatible with U.S. securities laws.

SASB was created to fill this need. SASB standards are designed to be integrated into the MD&A and other relevant sections of mandatory SEC filings, such as the Form 10-K and 20-F, so that information is reliable and that all investors have access to material, comparable information without the need to source it from questionnaires or purchase it from commercial vendors. SASB's standards development process is evidence-based and market-informed in order to ensure that the standards are cost-effective for companies and are decision-useful for investors. Please refer to Figure E (adjacent to our response to Question 6.)

Provisional SASB standards are now available (free of charge) for 79 industries on SASB's website. Each standard consists of industry-specific disclosure topics, accounting metrics for each disclosure topic, and technical protocol for compiling data. The SASB Standards Navigator is a comprehensive resource for using and viewing SASB Standards and for downloading industry-specific resources, including industry briefs, mock 10-Ks, and technical bulletins. This tool provides SASB's industry-specific disclosure topics, metrics, and technical protocols in an accessible and easy-to-use way.

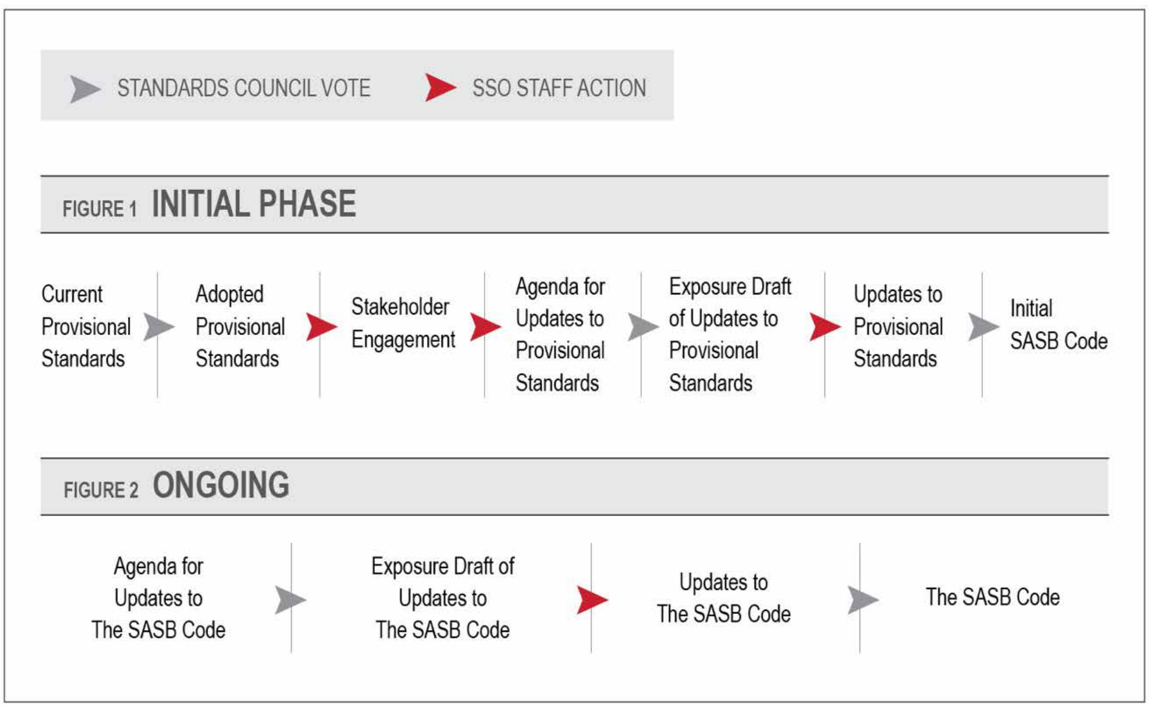
SASB standards and other products are designed to support investors in their efforts to integrate sustainability information into core activities, such as the following:

- **Fundamental analysis:** The availability of sustainability fundamentals alongside financial fundamentals provides the data needed to adjust equity and debt valuation models, as well as evaluate management quality for individual securities selection.
- **Comparison and benchmarking:** The data that results from thousands of publicly traded companies disclosing standardized, industry-specific sustainability accounting metrics will enable investors to perform peer-to-peer comparisons on critical dimensions of sustainability performance and establish industry benchmarks against which issuers can be compared.

- **Portfolio management:** The SASB's Sustainable Industry Classification System™ (SICS™) groups industries with similar business models and sustainability impacts. The SASB standards identify sustainability topics that are reasonably likely to constitute material information for companies within a specific industry. Together, SICS™ and the industry-specific disclosure topics will help investors identify and manage under- or overexposure to certain types of sustainability risks and opportunities.
- **Active engagement:** Investors and companies can use the SASB standards—and the information they yield—to guide conversations, resulting in more focused, more productive engagements on material sustainability factors.

SASB's proposed Rules of Procedure[101] cover the processes for reviewing, modifying, and adopting SASB's Provisional Standards as the initial Sustainability Accounting Code (hereafter "the SASB Code" or "the Code"), and the processes for ongoing review and maintenance of SASB standards through updates to the Code outline the means by which SASB will revise SASB standards to ensure that they address issues as they evolve over time. An overview of this process is shown in Figure F.

**Figure F**
**SASB Standards-setting Process for Codification and Updates**




[101] SASB, Proposed Rules of Procedure: Exposure Draft, http://www.sasb.org/wp-content/uploads/2016/01/SASB-Rules-of-Procedure-04.04.2016.pdf. The rules of procedure are open for public comment through July 6, 2016, at http://www.sasb.org/comment.

**217. Would line-item requirements for disclosure about sustainability or public policy issues cause registrants to disclose information that is not material to investors? Would these disclosures obscure information that is important to an understanding of a registrant's business and financial condition? Why or why not?**

> **SASB Comment:** Line-item requirements are generally not appropriate for sustainability issues because sustainability issues are likely not material for all companies; when they are material, they manifest in unique ways and thus require industry-specific metrics. Requiring these line items to be disclosed would result in a corporate disclosure burden and a large volume of information that is immaterial to investors. Additionally, how is the SEC to select issues for which it would seek to promulgate line-item disclosure requirements? Is child labor more important than climate risk? Is product safety more important than human trafficking? There are hundreds of potential social and environmental issues and judgment regarding their importance to investors is treacherous without a reliable basis for conclusion. Securities law already provides us with the answer: if it is likely to affect the financial condition or operating performance of a company then disclosure to investors is compelled. The patterns of materiality for sustainability topics are industry-specific. Therefore, SASB recommends that instead of identifying specific mandatory line items for disclosure, the SEC point to existing disclosure requirements (such as MD&A) and standards (such as SASB standards) that map the likely materiality of sustainability topics by industry and identify industry-specific accounting metrics. This approach ensures that companies disclose topics only when they are material and that investors receive information that is material and comparable.
>
> Through its industry focus, SASB systematically assesses the relevance of each sustainability topic and the potential for material impacts on companies in 79 industries. This ensures that topics recommended for disclosure are included in the standards on the basis of evidence amassed in an industry context as well as input from a balanced group of industry experts. From one industry to the next, SASB may recommend different approaches to the disclosure of information related to these topics. This is because general sustainability topics often have unique impacts on different business models, and analysts may need industry-specific performance metrics to assess risk and/or future outlook.
>
> A private sector standard affords more responsiveness to changing conditions over time than line item mandates that are promulgated by rulemaking.

**218. Some registrants already provide information about ESG matters in sustainability or corporate social responsibility reports or on their websites. Corporate sustainability reports may also be available in databases aggregating such reports. Why do some registrants choose to provide sustainability information outside of their Commission filings? Is the information provided on company websites sufficient to address investor needs? What are the advantages and disadvantages of registrants providing such disclosure on their websites? How important to investors is integrated reporting, as opposed to separate financial and sustainability reporting? If we permitted registrants to use information on their websites to satisfy any ESG disclosure requirement, how would this affect the comparability and consistency of the disclosure?**

> **SASB Comment:** Corporations have many important stakeholders and a variety of channels through which they may communicate sustainability information, including websites, sustainability reports, and corporate social responsibility reports. While these

reports serve a broad range of stakeholder needs, they employ different processes and controls from those used in mandated SEC filings. Stand-alone sustainability reports are problematic to investors, as the sole source for sustainability-related information, for the following reasons:

- **Large amounts of immaterial information:** These reports lack focus on the sustainability issues that are of most interest to investors, namely those most likely to have material impacts on a company's financial condition or operating performance. As a result, companies also field requests for sustainability information in the form of surveys and questionnaires from investors and ratings agencies, creating a significant burden on the issuer with limited benefit to its shareholders. This selective disclosure is also problematic in view of Regulation FD.
- **Inconsistent definition of "materiality":** Many companies are using different definitions of "materiality" in their sustainability reports and SEC filings. This is common practice for companies that follow Global Reporting Initiative (GRI) guidance, which recommends prioritizing material issues on the basis of stakeholder interest (as opposed to following the Supreme Court definition of "materiality"). A company's use of a definition of "materiality" that deviates from the securities law definition creates confusion and potential liability risks.
- **Unreliable data:** Information included in SEC filings is likely to be prepared with greater care and more internal control than non-SEC information. Information in corporate sustainability reports reports is often not investment grade.
- **Biased account:** Standalone sustainability reports are often prepared by corporate communications departments or public relations firms. They tend to be positively biased and do not provide investors with a true and fair representation of performance on material risks. A recent study published in Accounting, Auditing and Accountability Journal [102] indicated that 90 percent of known negative corporate events were not reported in A and A+ rated sustainability reports. This practice of producing a glowing sustainability report is known as "greenwashing".

  An historical analogy is relevant here. The Wheat Committee report that precipitated the creation of the FASB in 1972 noted that financial statements were often used as a "strategic weapon" and therefore were positively biased and unreliable. Similarly, without standards and professional norms and codes of conduct, sustainability reports are frequently strategic communications for issuers. The public relations firms that are contracted to produce them are hired explicitly to provide a positive view of performance because companies want to present a positive image to various stakeholders, such as employees and prospective employees. This is a very different objective than providing investors with a balanced view of material information with which to inform investment decisions.

  **Lack of standardization:** Because sustainability reports vary widely between companies in terms of the topics and metrics used, investors are not able to compare and benchmark the performance of companies within

[102] Olivier Boiral, *Sustainability Reports as Simulacra? A Counter-Account of A and A+ GRI Reports*, ACCOUNTING, AUDITING & ACCOUNTABILITY JOURNAL, Vol. 26, No. 7, p. 1036–71 (2013), http://www.emeraldinsight.com/doi/pdfplus/10.1108/AAAJ-04-2012-00998.

an industry. A 2013 report by GRI and RobecoSAM highlights the extent of the lack of comparability. 94 reports from Banks & Diverse Financials industry, 38 percent of which were graded A or A+ by GRI, were analyzed for disclosure topics. 896 distinct topics were identified as "material." 634 of the topics were identified as GRI topics, while 236 were identified as "other" material topics.[103] A similar situation was found in the Technology and Hardware industry.

For these reasons, sustainability reports and websites do not meet the needs of investors.

**219. In an effort to coordinate ESG disclosures, several organizations have published or are working on sustainability reporting frameworks. Currently, some registrants use these frameworks and provide voluntary ESG disclosures. If we propose line-item disclosure requirements on sustainability or public policy issues, which, if any, of these frameworks should we consider in developing any additional disclosure requirements?**

**SASB Comment:** SASB is very familiar with the broad landscape of sustainability and industry organizations, and has worked closely with many in development of the SASB standards.

Establishing materiality, however, is a fact-specific determination and therefore should be left to the issuer, which knows the facts best. Most existing sustainability reporting frameworks are designed to meet the needs of diverse stakeholders, including suppliers, customers, current and prospective employees, communities, policy makers, and special interest groups. This fact, coupled with their use of proprietary and expansive definitions of "materiality," results in the disclosure of a great deal of immaterial information.

The capital markets have their own needs, unique from those of suppliers, customers, communities, employees, policy makers, interest groups, and other stakeholders whose interests are the focus of sustainability reports. Investors demand reliable and comparable sustainability information with clear links to financial performance. Complementing the work of the SEC, the Financial Accounting Standards Board, and other organizations and initiatives, SASB aims to improve disclosure effectiveness, with a premium placed on material, decision-useful information for investors. Therefore, the standards address sustainability topics that are reasonably likely to affect the financial condition or operating performance of a company or an entire industry and provide companies with a way to better satisfy the requirements of Regulation S-K. SASB standards are the only ones designed to meet the need of the capital markets for the following reasons:

- **Consistent with U.S. securities laws:** SASB standards are developed using the definition of "materiality" applied under U.S. federal securities laws. That definition, set forth by the U.S. Supreme Court in *TSC Industries v. Northway*, 426 U.S. 438 (1976), is that a fact is material if "there is a substantial likelihood" that a "reasonable investor" would view

[103] RobecoSAM and the Global Reporting Initiative, Defining Materiality: What Matters to Reporters and Investors – Do investors and reporters agree on what's material in the Technology Hardware & Equipment and Banks & Diverse Financials sectors?, 2015 p. 10.

its omission or misstatement as “having significantly altered the total mix of information.” SASB identifies sustainability topics that are reasonably likely to be material for a specific industry and then develops corresponding metrics.

- **Decision-useful for investors:** SASB standards are designed to be integrated into the MD&A and other relevant sections of mandatory SEC filings, such as the Form 10-K and 20-F, so that information is reliable and all investors have access to material, comparable information without the need to source it from questionnaires or purchase it from commercial vendors.
- **Cost-effective for companies:** SASB standards identify the minimum set of sustainability factors that are likely to be material for companies in an industry. On average, each standard has five disclosure topics and 13 accounting metrics.
- **Industry-specific:** Only SASB produces standards that identify sustainability topics and metrics at the industry level. Provisional standards are available for 79 industries.
- **Created by the markets:** More than 2,800 individuals—affiliated with companies with $11T market capital and investors representing $23.4T assets under management—participated in industry working groups to provide input on SASB’s provisional standards. In these working groups, 82 percent of issuers and investors agreed that SASB’s proposed disclosure topics are likely to constitute material information. SASB will continue to involve market participants as it codifies and maintains the standards.

SASB recognizes that sustainability reporting is a valuable tool for communicating on sustainability achievements to a broad group of stakeholders. These reports also help flag emerging issues that may become of interest to investors over time. SASB references metrics already in use by industry, from roughly 200 entities, such as GRI, CDP, EPA, OSHA and industry organizations such as IPIECA, EPRI and GRESB. (See Appendix E.) SASB greatly appreciates the efforts of these and other organizations to determine appropriate sustainability-related metrics for topics that are likely to be material. The technical protocol for each metric in each SASB standard cites the source reference from other organizations. Incorporating other metrics by reference, where appropriate, allows SASB to rely on the expertise of industry associations and other organizations in determining the best metric to use to capture performance on a given issue and helps keep the use of SASB standards cost-effective for registrants.

SASB is developing a more extensive document showing links between SASB standards and information collected under the guidance of other reporting frameworks and industry associations.

**220. Are there sustainability or public policy issues for which line-item disclosure requirements would be consistent with the Commission’s rulemaking authority and our mission to protect investors, maintain fair, orderly and efficient markets and facilitate capital formation, as described in Section III.A.1 of this release? If so, how could we address the evolving nature of such issues and keep our disclosure requirements current?**

**SASB Comment:** A market standard for the industry-specific disclosure of sustainability-related information would provide a market-informed process that allows for future evolution of investor needs and issuers' business models more efficiently than governmentally-mandated, universal line-item disclosure.

SASB suggests that the Commission **acknowledge SASB's standards as an acceptable and appropriate disclosure framework for use** by companies in their SEC filings **to comply with Regulation S-K** in a cost-effective and decision-useful manner*.*

As noted in the response to question 216, SASB's [Rules of Procedure] include a process to codify and maintain the standards over time, with industry feedback, to ensure the standards address the changing nature of sustainability issues.

**221. What, if any, challenges would registrants face in preparing and providing this information? What would be the additional costs of complying with sustainability or public policy line-item disclosure requirements, including the administrative and compliance costs of preparing and disseminating disclosures, beyond the costs associated with current levels of disclosure? Please quantify costs and expected changes in costs where possible.**

**SASB Comment:** SASB's research shows that information regarding 75 percent of SASB disclosure topics is already being disclosed in the Form 10-K, but rarely in a decision-useful way. More than 40 percent of all disclosures on sustainability topics contain boilerplate language: broad, nonspecific wording that does not describe the realities of the registrant's particular operating context. Meanwhile, only about 15 percent of issuers disclose sustainability information using metrics.

To move from boilerplate disclosure to metrics, companies will need to strengthen their internal controls and procedures, as well as consider the need for independent assurance. However, improved disclosure on material sustainability factors will have benefits for companies. First, they will avoid the cost and burden of shareholder resolutions and questionnaires. Second, research shows that by focusing on the limited set of sustainability-related risks and opportunities identified by the SASB standards—those reasonably likely to have material impacts—companies can achieve superior results, including return on sales, sales growth, return on assets, and return on equity, in addition to improved risk-adjusted shareholder returns.[104]

SASB standards are designed to provide a cost-effective way for companies to disclose material, decision-useful sustainability information to investors. SASB achieves this objective in two key ways:

- Because they focus on only those sustainability issues that are reasonably likely to have material impacts, SASB standards identify the minimum set of topics for consideration in each industry, the majority of which are already addressed in SEC filings by many public companies in some fashion.

[104] Mozaffar Khan, George Serafeim and Aaron Yoon, *Corporate Sustainability: First Evidence on Materiality*, THE ACCOUNTING REVIEW, P. 26 (Harvard Business School, March 9, 2015), http://hbswk.hbs.edu/item/corporate-sustainability-first-evidence-on-materiality.

- A significant percentage of the metrics in SASB standards are aligned with initiatives already in use.[105] As part of its standards-development process, SASB identifies and documents existing metrics and practices used to account for performance on each disclosure topic. When possible, SASB harmonizes its standards with existing metrics, definitions, frameworks, and management disclosure formats, thereby minimizing the corporate reporting burden. SASB is in the process of identifying an academic institution to conduct an analysis of the costs and benefits associated with the use of SASB standards.

**222. If we propose line-item disclosure requirements that require disclosure about sustainability or public policy issues, should we scale the disclosure requirements for SRCs or some other category of registrant? Similarly, should we exempt SRCs or some other category of issuer from any such requirements?**

**SASB Comment:** It is not necessary to scale disclosure requirements for SRCs. Every public company, regardless of size, is required to file a Form 10-K or 20-F and should thus include a discussion of material sustainability-related information.

SASB standards provide a minimum set of issues likely to constitute material information on an industry-by-industry basis, making it easier for SRCs to comply with existing requirements to disclose material information.

**223. In 2010, the Commission published an interpretive release to assist registrants in applying existing disclosure requirements to climate change matters. As part of the Disclosure Effectiveness Initiative, we received a number of comment letters suggesting that current climate change–related disclosures are insufficient. Are existing disclosure requirements adequate to elicit the information that would permit investors to evaluate material climate change risk? Why or why not? If not, what additional disclosure requirements or guidance would be appropriate to elicit that information?**

**SASB Comment:** More work is needed to evaluate the systemic nature of climate risk and data needed to understand its financial impact on global capital markets. The Financial Stability Board's (FSB)[106] Task Force on Climate Related Disclosure (TCFD)[107] is undertaking this work.

In support of this work, SASB has meticulously mapped the industry exposure to climate-related financial risk and presented appropriate metrics for its disclosure in SASB's Technical Bulletin on Climate Risk.[108] Based on this research, climate change is

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[105] SASB, Op Cit, p. 20.

[106] The Financial Stability Board (FSB) is an international body that monitors and makes recommendations about the global financial system, FSB members include the SEC, the Board of Governors of the Federal Reserve System, and the U.S. Department of Treasury, in addition to 23 international institutions and the EU.

[107] Task Force on Climate Related Disclosure (TCFD) was launched in December 2015 by the FSB at the request of the G20. The TCFD is aimed at helping companies better understand what financial markets need from disclosure in order to measure and manage climate risk, and is mandated to make recommendations for improving voluntary financial disclosure of those risks. More on the TCFD can be found at: https://www.fsb-tcfd.org.

[108] SASB, CLIMATE RISK: TECHNICAL BULLETIN 2016-01 (working draft Jan. 27, 2016), http://using.sasb.org/wp-content/uploads/2016/02/SASB-Technical-Bulletin-Climate-Risk-02022016c.pdf.

likely to have material financial impacts on companies in 72 out of 79 industries. However, climate risk manifests differently in each industry, and thus each industry requires unique performance metrics. For example, investors in real estate are interested in the vulnerability of assets and the quality of building stock. In health care, event preparedness and business continuity risk is important, as are changing disease migration patterns. In oil and gas, the carbon intensity of reserves and current emissions are important to assess fundamental and relative risk.

SASB's Technical Bulletin on Climate Risk maps the patterns of climate risk exposure that are embedded within a typical diversified investment portfolio. The Bulletin enables investors to understand and account for climate risk by outlining the financial impacts, as well as the appropriate industry-specific disclosures, for the following types of climate-impact: (See Appendix D.)

- **Physical effects:** Encompass the range of current and projected acute (punctuated) and progressive impacts that climate change will have on the physical environment, leading to risks and opportunities for business entities.
- **Transition to a low-carbon, resilient economy:** Includes the market-based responses to the transition to a low-carbon, resilient economy. These comprise the mitigation and adaptation responses of business entities, customers, and suppliers, which may create a range of risks and opportunities.
- **Climate regulation:** Encompasses the spectrum of policies, rules, non-binding agreements, and other regulatory mechanisms that exist or are likely to come to bear in response to climate change.

While it may be tempting to consider disclosure of greenhouse gas (GHG) emissions data as a line-item requirement to address climate risk, GHG emissions are a great example of something that can be *measured* across the board but may not be *material* across the board. GHG emissions are only material for those carbon-intensive industries that may be regulated and/or need to transition to lower carbon business models. A recent review of 2014 CDP emissions data available in the Bloomberg Professional Services terminal shows that just 7 out of 79 industries are responsible for over 85 percent of the annual GHG emissions from public equities.[109] The other 72 industries do contribute nominally to such emissions, but are affected by climate risk in other ways that are more complex, from a disclosure point of view. For example, financed emissions in a bank's loan portfolio (i.e., emissions induced by loans to, and investments in, companies that emit greenhouse gases) are more likely to be material than would be the bank's own (Scope 1) GHG emissions. Such nuanced distinctions would be lost were a line-item requirement on GHG emissions be promulgated.

SASB recommends that the SEC point companies to SASB standards for industry-specific metrics through which to disclose climate risk in a meaningful and cost-effective manner.

[109] SASB, Analysis of 2014 CDP data for Global Scope 1 Greenhouse Gas (GHG) Activity Emissions accessed via the Bloomberg Professional Service on June 30th, 2016.

**V.E. Presentation and Delivery of Important Information**

**327. What disclosure requirements, if any, would generate more meaningful disclosure if we modified or eliminated the specific formatting or presentation requirements and permitted greater flexibility in the manner of presentation?**

Investors need comparable data, year-on-year trends where possible (last three years of data), and management's view on the issue. See SASB's Mock 10-K (prepared for six industries) for a format for disclosing material sustainability-related risks and opportunities using the SASB standards in the MD&A section of the Form 10-K.[110]

**V.G. Structured Disclosures**
**330. How can the quality of structured disclosures be enhanced?**

> **SASB Comment:** SASB standards are designed to be SEC-compliant and are ideal for disclosure in the MD&A section of the 10-K because of the broad range and long-term nature of sustainability issues, as well as the varying levels of risk and uncertainty inherent in them. XBRL is currently the only broad-based format for tagging disclosures internationally. SASB thus favors leveraging this existing infrastructure and allowing for voluntary XBRL tagging of sustainability-related disclosure information in the MD&A section of SEC filings.
>
> SASB fully supports the SEC's pilot to allow iXBRL filings and hopes that there will widespread adoption and a mandate for iXBRL in the future. iXBRL has the potential to reduce errors in data submission, simplify disclosure, and reduce the costs of disclosures for preparers while improving data quality. As the XBRL reporting tool infrastructure is well established, and XBRL tagging is used on an international basis. We believe that the cost of switching to iXBRL would be relatively low, and outweighed by the benefits of enhanced data quality.[111]
>
> SASB has prepared a complete XML taxonomy and a pilot XBRL taxonomy, and will develop the infrastructure to support an XBRL taxonomy when XBRL tagging is allowed in the MD&A.
>
> SASB would be interested in participating in any task force that addresses the disclosure of sustainability information and the technological means to enhance consumption of this information.

**331. Are there changes to the EDGAR system that the Commission should make to render the structured disclosure filed by registrants more useful?**

> **SASB Comment:** As noted in the response to question 330, SASB believes that switching to iXBRL and consolidating the reporting process into a single submission would reduce errors, save time, and improve data quality. In addition, SASB recommends that EDGAR accept XBRL tags in the MD&A section, as investors increasingly want to query and analyze non-financial data elements that may be disclosed (and ideally tagged) in the MD&A.

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[110] SASB MOCK 10-K LIBRARY, http://using.sasb.org/mock-10-k-library/.
[111] AICPA, "RESEARCH SHOWS XBRL FILING COSTS LOWER THAN EXPECTED," (2015) https://www.aicpa.org/InterestAreas/FRC/AccountingFinancialReporting/XBRL/DownloadableDocuments/XBRL%20Costs%20for%20Small%20Companies.pdf.

**332. Are company-specific custom extensions, such as element or axis extensions, useful to investors or other users of structured disclosures? If so, how might these custom extensions be made more useful for enhancing automated analysis? If not, are there better ways to express disclosures that are unique to a company (e.g., business segment, product line)?**

**SASB Comment:** Greater standardization and stronger rules on company-specific extensions will improve data comparability.

SASB standards have been developed to meet the market need for comparable sustainability information. SASB sees the need for stronger rules on company-specific extensions for XBRL tagging in order to achieve such comparability. Clear, strong protocols for company-specific extensions are the basis for other similar XBRL taxonomies such as EDINET, the Japanese equivalent of the EDGAR system. While the decision to use SASB standards is a determination that must be made by an individual company, we see the importance of reducing confusion in the marketplace and promoting greater comparability through the reduction in company-specific extensions. The use of a broadly-accepted market standard will provide data aggregators, their investment clients and standards setters with improved comparability, consistency, and traceability of data, reducing the time and cost of analyzing disclosures. It would also reduce preparer costs through the reuse of tags, and improve peer-to-peer performance benchmarking.

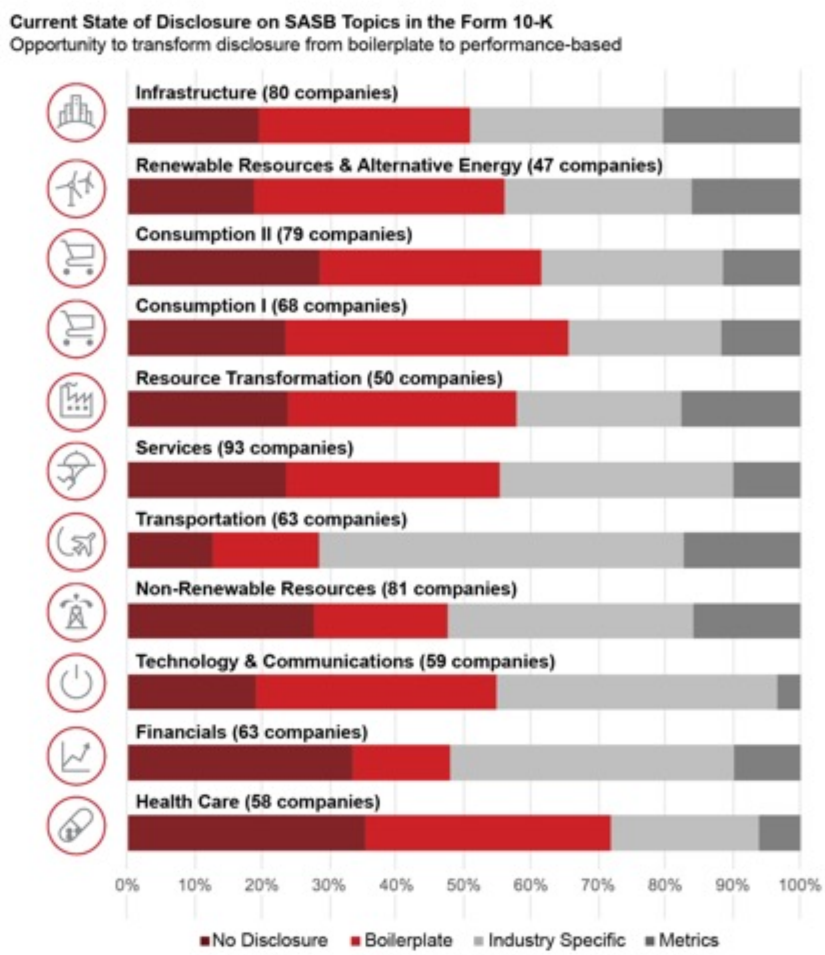
**333. Should we require registrants to provide additional disclosures in a structured format? If so, which disclosures? For example, are there categories of information in Parts I and II of Form 10-K or in Form 10-Q that investors would want to receive as structured data?**

**SASB Comment:** See the response to question 330. SASB standards are designed for issuers to achieve consistent measurement and structured presentation of material sustainability factors, which in turns allows peer-to-peer comparisons. XBRL tagging of SASB standards in an issuer’s digital filing aids the process both of using the standard and ensuring a structured and comparable output for investors.

**Appendix B – The Current State of Sustainability Disclosure in SEC Filings**

During its standards development process, SASB analyzed the state of disclosure in annual SEC filings of the likely material sustainability disclosure topics included in each provisional SASB standard. Disclosure analyses were carried out at different points in time between April 2013 and February 2016 in conjunction with research and related Industry Working Group convenings for the 79 industries in SASB's Sustainable Industry Classification System (SICS).[112] The analyses focused on identifying and categorizing disclosure practices by the top ten companies by revenue in each industry on their most recent Forms 10-Ks and 20-Fs. The analyses focused on identifying relevant disclosures mainly in Items 1, 1A, 3, 7 and 7A of the Form 10-K, or the equivalent sections of the Form 20-F, and classifying such disclosures based on the categories presented below. Figure G summarizes the results of these disclosure

**Figure G**




112 SASB research analysts used the latest available annual SEC filings (i.e., Form 10-Ks and 20-Fs) for the top companies, by revenue, per SICS industry (A maximum of 10 companies per industry were analyzed. Due to industry composition, the number of companies analyzed for some industries was less than ten). Dates of analyses per sector were as follows: Health Care, April 2013; Financials, April 2013; Technology & Communications, February 2014; Non-Renewable Resources, May 2014; Transportation, August 2014; Services, October 2014; Resource Transformation, February 2015; Consumption I, May 2015; Consumption II, July 2015; Renewable Resources & Alternative Energy, October 2015; Infrastructure, February 2016.

analyses aggregated by SICS sector.

- **No Disclosure**: The company does not provide any disclosure that is relevant to the topic under analysis.
- **Boilerplate**: The company provides disclosure using uniform language that has a definite, unvarying meaning in the same context that denotes that the words have not been sufficiently and individually fashioned to address the topic presented.
- **Industry-specific**: The company provides disclosure that is fashioned in a way that can only be understood in the context of the industry under analysis or that provides sufficient and individual additional insights into how a particular topic is managed.
- **Metrics**: The company provides disclosure using quantitative information, which may or may not include SASB metrics, to measure performance on the topic under analysis.

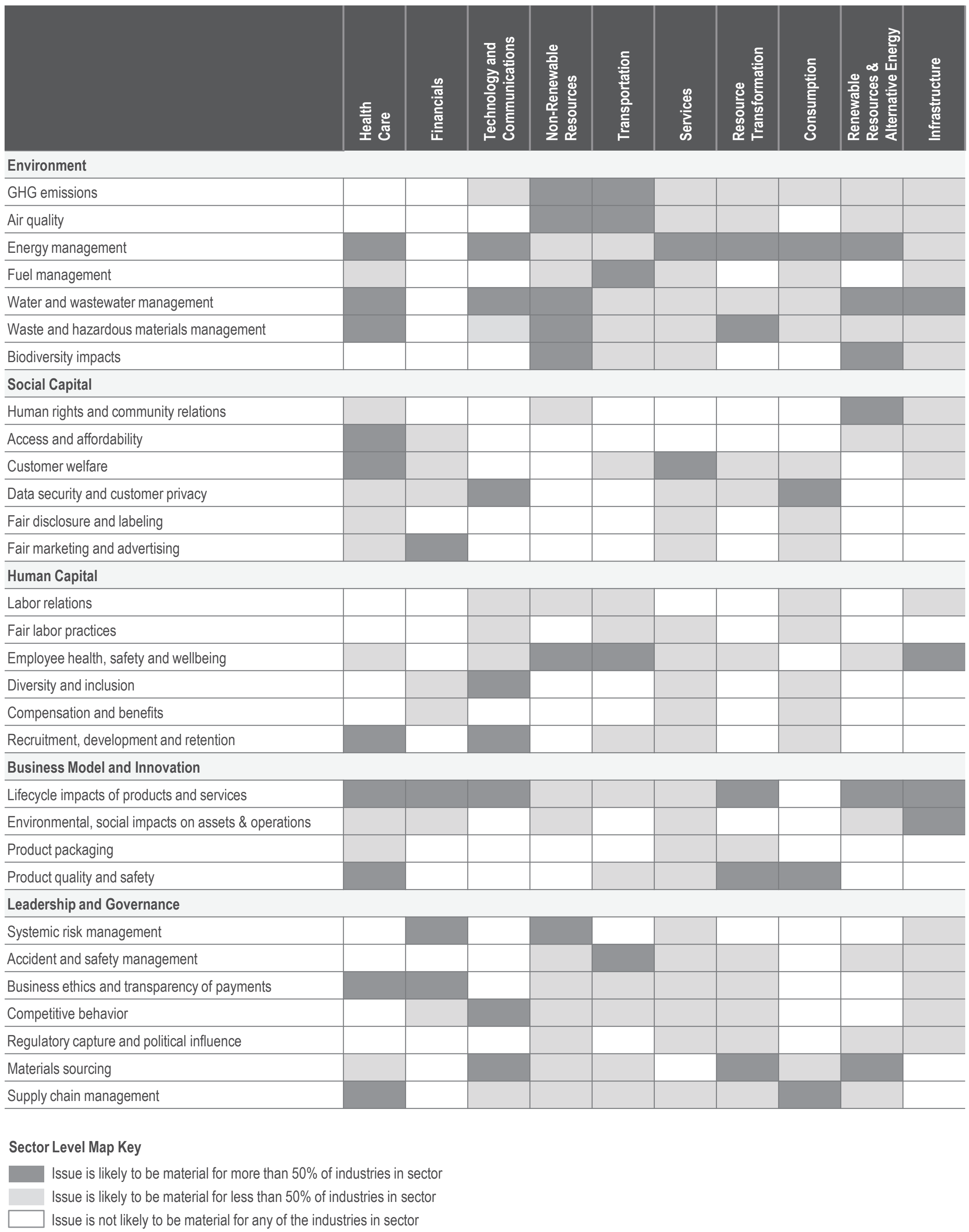
SASB is developing an interactive Disclosure Navigator tool that will be available to the public in late 2016. The Disclosure Navigator is a machine learning-based application that is capable of reading individual company 10-K & 20-F filings and extracting excerpts from them that are relevant to SASB industry-specific disclosure topics. The Disclosure Navigator's "engine" is an algorithm based on the above-mentioned disclosure analyses previously completed by SASB's research team. It will recursively train itself on identifying relevant excerpts and will continue to improve as more data becomes available with each filing year.

Upon its initial release, the Disclosure Navigator will allow for sector-, industry-, topic- and company-level disclosure analysis of SASB disclosure topics. Over time, we expect that it will be able to rate the quality of disclosure using rubrics under development by the SASB research team.

## Appendix C – Examples of the Industry-specificity of Sustainability Factors, Related SASB Disclosure Topics, Value Drivers and Metrics

The SASB Materiality Map™ is an interactive tool that identifies and compares likely material sustainability issues across different industries and sectors and illustrates the potential for

**Figure H – Excerpt – SASB Materiality Map™**



material impacts of 30 sustainability issues across 79 industries.

Sustainability issues are divided into five dimensions:

- Environment
- Social Capital
- Human Capital
- Business Model & Innovation
- Leadership & Governance

The SASB Materiality Map™ helps issuers focus their sustainability strategies on the most important issues and provides investors with a “heat map” of portfolio exposure to sustainability risks and opportunities.

See Figure H for a static excerpt of the Map. A full, interactive version of the SASB Materiality Map™ is available here.

Material topics affect the financial condition or operating performance of a company. Figure I, with excerpts from select SASB standards, provides a small number of examples of the industry-specific sustainability topics in SASB's standards. The table illustrates the specificity of sustainability topics in SASB standards by industry, the value drivers that affect the financial condition of a company due to performance on the sustainability-related topic, and the detailed nature of the metric that characterizes performance on the topic.

**Figure I**

**Materiality is a central concern to investors**

Material topics affect the financial condition or operating performance of a company

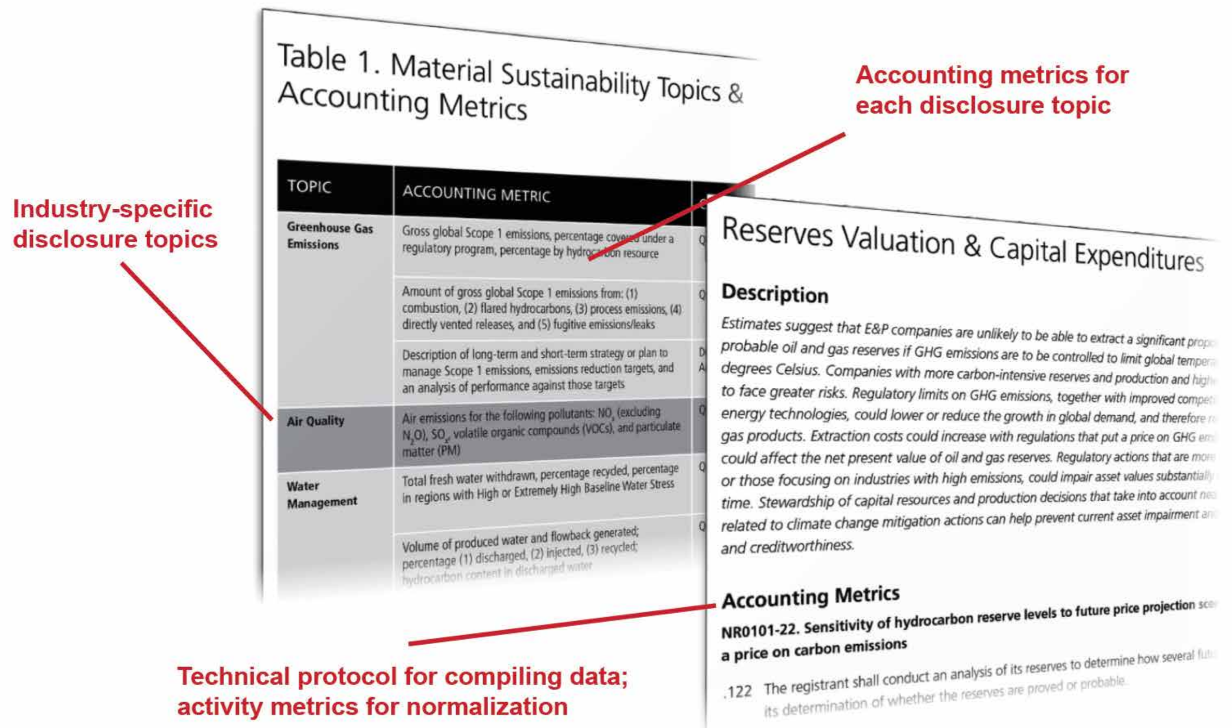
| Industry | Disclosure Topic | Value Driver Impacted | Selected Metrics |
|---|---|---|---|
| Automobiles | Fuel Economy & Use-phase Emissions | • Revenue | • Sales-weighted average passenger fleet fuel economy, consumption, or emissions, by region |
| Auto Parts | Product Safety | • Reputation<br>• Liabilities | • Number of recalls and total units recalled |
| Oil & Gas – Exploration & Production | Reserves Valuation & Capital Expenditures | • Assets<br>• CAPEX<br>• Cost of Capital | • Sensitivity of hydrocarbon reserve levels to future price projection scenarios that account for a price on carbon emissions.<br>• Estimated carbon dioxide emissions embedded in proved hydrocarbon reserves |
| Restaurants | Food Safety | • Revenue<br>• Reputation | • Number of recalls, total amount of food product recalls<br>• Number of confirmed foodborne illness outbreaks, percentage resulting in CDC investigation. |
| Agricultural Products | Climate Change Impacts on Crop Yields | • Revenue<br>• Cost of Capital | • Average crop yield and five-year standard deviation per major crop type by major operating region<br>• Identification of principal crops and discussion of risks and opportunities presented by climate change |
| Pharmaceuticals | Counterfeit Drugs | • Revenue<br>• OPEX<br>• Reputation | • Description of methods and technologies used to maintain traceability of products throughout the supply chain and prevent counterfeiting.<br>• Description of process for alerting end customers and business partners of potential or known risks associated with counterfeit products. |
| Biotechnology | Affordability & Fair Pricing | • Revenue<br>• Reputation | • Ratio of weighted average rate of net price increases (for all products) to the annual increase in the U.S. Consumer Price Index. |
| Real Estate | Energy Management | • OPEX<br>• Assets | • Like-for-like change in energy consumption of portfolio area with data coverage, by property subsector.<br>• Percentage of eligible portfolio that (1) has obtained an energy rating and (2) is certified to ENERGY STAR®, by property subsector. |

Every SASB standard comprises industry-specific disclosure topics, technical protocol for compiling data, and accounting metrics for the disclosure of the issue. Each disclosure topic is associated with at least one value driver. (See Figure J.)

**Figure J**

**Robust Standards Designed to Provide Decision-Useful Information**

SASB standards contain industry-specific disclosure topics, metrics, and guidance



**Appendix D – The Industry-specifity of Climate-related Risk**

SASB published its Technical Bulletin on Climate Risk[113] in January, 2016. The Bulletin was issued in to provide a complete view of climate change impacts across all industries and to inform the efforts of The Financial Stability Board's (FSB)[114] Task Force on Climate Related Disclosure (TCFD).[115]

The Bulletin illustrates the pervasive nature of climate risk which was determined to affect 72 of 79 industries, or 93 percent of the U.S. equity market in terms of market capitalization.

SASB's Climate Change Framework, used to analyze climate risk, is characterized by three unique aspects:

- Identification of where and how climate risk may have **material** impacts on corporate financial value
- Recognition that climate-related impacts manifest themselves in **industry-specific** ways
- Development of metrics that help corporate issuers disclose **decision-useful** information to investors in a **cost-effective** way.

SASB identified three distinct types of climate risk via this Framework – physical risk, regulatory risk, and transitional risk (associated with transitioning to a low carbon economy). It also identified four channels of financial impact through which these risks can ultimately impact investment returns – cash flow, operating impacts, asset value impacts and financing impacts.

The Bulletin's key findings were:

- Climate risk is systemic in nature
- Climate risk is diverse
- Climate risk is not currently disclosed adequately and understanding it requires specialized disclosures
- The financial implications of climate risk are tangible and identifiable

While overall climate risk was found to be ubiquitous, SASB research found that the impact of climate risk manifests itself differently from industry to industry. SASB's Climate Risk Materiality Map (see Figure K) provides an industry-by-industry look at how different industries are impacted by different types of climate-related risk. It draws on relevant disclosure topics from the SASB standards to present a climate-specific view of the SASB Materiality Map.

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[113] SASB, CLIMATE RISK: TECHNICAL BULLETIN 2016-01 (working draft Jan. 27, 2016), http://using.sasb.org/wp-content/uploads/2016/02/SASB-Technical-Bulletin-Climate-Risk-02022016c.pdf.

[114] The Financial Stability Board (FSB) is an international body that monitors and makes recommendations about the global financial system, FSB members include the SEC, the Board of Governors of the Federal Reserve System, and the U.S. Department of Treasury, in addition to 23 international institutions and the EU.

[115] Task Force on Climate Related Disclosure (TCFD) was launched in December 2015 by the FSB at the request of the G20. The TCFD is aimed at helping companies better understand what financial markets need from disclosure in order to measure and manage climate risk, and is mandated to make recommendations for improving voluntary financial disclosure of those risks. More on the TCFD can be found at: https://www.fsb-tcfd.org.

**Figure K – Climate Risk Materiality Map**

## Appendix E
## Cost-Effective Alignment with Industry Standards
SASB references metrics already in use by industry, from 200+ organization

**Health Care**
WHO Prequalification of Medicines Programme (PQP)
FDA FAERS and MedWatch
FDA Clinical Investigator Inspections
Rx-360 International Pharmaceutical Supply Chain Consortium
Centers for Medicare & Medicaid Services requirements
Provisions of the Patient Protection and Affordable Care Act (PPACA)
Hospital Values Based Purchasing Performance score
HIPAA and HITECH

**Transportation**
New Car Assessment Program
EU End of Life of Vehicle Directive
NHTSA
Corporate Average Fuel Economy
AIAG
Federal Aviation Administration (FAA)
International Civil Aviation Organization (ICAO)
Federal Motor Carrier Safety Administration (FMCSA) - Behavior Analysis and Safety Improvement Categories (BASICs)
International Maritime Organization (IMO) metrics and conventions
International Convention for the Prevention of Pollution from Ships (MARPOL)
Federal Rail Administration (FRA) Recommended Violation Defects

**Services**
Student Right-to-Know-Act
Gainful Employment Rule
National Council on Problem Gambling's Internet Responsible Gambling Standards
CDC Foodborne illness standards
USDA Dietary Guidelines for Americans
Advertising Self-Regulatory Council

**Financials**
FINRA
Basel III
Federal Financial Institutions Examination Council's (FFIEC
Equator Principles (EP III)
Dodd-Frank Act Stress Test (DFAST)
COSO ERM Framework
Dodd-Frank Wall Street Reform and Consumer Protection Act
FEMA special flood hazard areas

**Consumption**
Marine Stewardship Council
Roundtable for Responsible Soy
Roundtable for Sustainable Palm Oil
Rainforest Alliance
Sustainable Agriculture Initiative
World Health Organization (WHO) Acute Toxicity Hazard Categories
Global Food Safety Initiative (GFSI)
Natural Resources Conservation Service (NRCS) Comprehensive Nutrient Management Plan (CNMP)
Food Safety and Inspection Service (FSIS) of the U.S. Department of Agriculture (USDA)
USDA Smart Snacks in School criteria
Children's Food and Beverage Initiative (CFBAI) Uniform Nutrition Criteria
FDA's Recalls, Market Withdrawals, & Safety Alerts
USDA's Current Recalls and Alerts
Children's Food and Beverage Initiative (CFBAI) Uniform Nutrition Criteria
Sustainable Apparel Coalition Higg Index
ICTI CARE Process (ICP)
California DTSC Candidate Chemicals List
U.S. Green Building Council's (USGBC) LEED
ISO 14040 and ISO14044
ENERGY STAR®
WaterSense
ANSI/BIFMA e3 level®: Business Furniture

**Technology & Communication**
EICC Validated Audit Process
EPEAT® • Basel Action Network's e-Steward® standard
U.S. EPA's Responsible Recycling Practices (R2) standard
(SEC) CF Disclosure Guidance: Topic No. 2, Cybersecurity
International Electrotechnical Commission - IEC 62474
ENERGY STAR®
Digital Advertising Alliance (DAA) Self-Regulatory Program
Children's Online Privacy Protection Act (COPPA)
Directive 2002/58/EC (ePrivacy Directive)
National Institute of Standards and Technology (NIST)

**Resource Transformation**
REACH substances of very high concern (SVHC)
American Chemistry Council's Responsible Care Management System
World Health Organization (WHO) Acute Toxicity Hazard Categories
Center for Chemical Process Safety's "Process Safety Leading and Lagging Metrics
U.S. Consumer Product Safety Commission
Airworthiness Directives - FAA, ESSA
OECD Anti-corruption guidelines
EPEAT®
Basel Action Network's e-Steward® standard
U.S. EPA's Responsible Recycling Practices (R2) standard
(SEC) CF Disclosure Guidance: Topic No. 2, Cybersecurity
International Electrotechnical Commission - IEC 62474
ENERGY STAR®
Heavy Duty (HD) National Program
Forest Stewardship Council
Sustainable Forest Initiative
Programme for the Endorsement of Forest Certification
American Tree Farm System

**Non-Renewable Resources**
Transparency International's Corruption Perception Index
IFC Performance Standards on Environmental and Social Sustainability
IPIECA Oil and Gas Industry Guidance on Voluntary Sustainability Reporting
Renewable Volume Obligation (RVO)
International Union for Conservation of Nature (IUCN) Protected Areas
Pipeline and Hazardous Materials Safety Administration (PHMSA)
ANSI/API Recommended Practice 754 – Process Safety Performance Indicators for the Refining and Petrochemical Industries
Mine Safety and Health Administration (MSHA)

**Renewable Resources & Alternative Energy**
Renewable Fuel Standard (EPA RFS2 )
International Food Policy Research Institute Global Hunger Index
California Air Resources Board Low Carbon Fuel Standard Program
European Union Renewable Energy Directive
Roundtable on Sustainable Biomaterials (RSB) certification
Basel Action Network's e-Steward® standard
U.S. EPA's Responsible Recycling Practices (R2) standard
IEC 61400-1, Edition 3.0— Design requirements
Forest Stewardship Council
Sustainable Forest Initiative
Programme for the Endorsement of Forest Certification
American Tree Farm System
International Finance Corporation's (IFC) Performance Standards on Environmental and Social Sustainability
International Union for Conservation of Nature (IUCN) Protected Areas
United Nations Environment Program
International Labour Organization (ILO) conventions

**Infrastructure**
EPA Hazard Potential Classification
U.S. EPA National Environmental Policy Act (NEPA)
National Institute of Standards and Technology (NIST) Smart Grid Interoperability Standards
Department of Energy's (DOE) Federal Energy Management Program (FEMP) M&V Guidelines
State renewable portfolio standards (RPS)
System Average Interruption Duration Index (SAIDI)
U.S. National Primary Drinking Water Regulations
The U.S. Safe Drinking Water Act
The European Drinking Water Directive
World Health Organization (WHO) Guidelines for Drinking-water Quality
FEMA Special Flood Hazard Areas (SFHA)
Global Real Estate Sustainability Benchmark (GRESB) Real Estate Survey Guidance
US Green Building Council LEED
Green Globes
ENERGY STAR
HERS® Index Score
WaterSense

## Appendix F

**SASB's Sustainable Industry Classification System (SICS™)**

Where traditional industry classification systems group companies by sources of revenue, SASB's approach considers the resource intensity of firms and whether or not they face common sustainability risks and opportunities.

Consumption

- Agricultural Products
- Meat, Poultry & Dairy
- Processed Foods
- Non-Alcoholic Beverages
- Alcoholic Beverages
- Tobacco
- Household & Personal Products
- Multiline and Specialty Retailers & Distributors
- Food Retailers & Distributors
- Drug Retailers & Convenience Stores
- E-Commerce
- Apparel, Accessories & Footwear
- Building Products & Furnishings
- Appliance Manufacturing
- Toys & Sporting Goods

Financials

- Commercial Banks
- Investment Banking & Brokerage
- Asset Management & Custody Activities
- Consumer Finance
- Mortgage Finance
- Security & Commodity Exchanges
- Insurance

Health Care

- Biotechnology
- Pharmaceuticals
- Medical Equipment & Supplies
- Health Care Delivery
- Health Care Distributors
- Managed Care

Infrastructure

- Electric Utilities
- Gas Utilities
- Water Utilities
- Waste Management
- Engineering & Construction Services
- Home Builders
- Real Estate Owners, Developers & Investment Trusts
- Real Estate Services

Non-Renewable Resources

- Oil & Gas – Exploration & Production
- Oil & Gas – Midstream
- Oil & Gas – Refining & Marketing
- Oil & Gas – Services
- Coal Operations
- Iron & Steel Producers
- Metals & Mining
- Construction Materials

Renewable Resources & Alternative Energy

- Biofuels
- Solar Energy
- Wind Energy
- Fuel Cells & Industrial Batteries
- Forestry & Logging
- Pulp & Paper Products

Resource Transformation

- Chemicals
- Aerospace & Defense
- Electrical & Electronic Equipment
- Industrial Machinery & Goods
- Containers & Packaging

Services

- Education
- Professional Services
- Hotels & Lodging
- Casinos & Gaming
- Restaurants
- Leisure Facilities
- Cruise Lines
- Advertising & Marketing
- Media Production & Distribution
- Cable & Satellite

Technology & Communications

- Electronic Manufacturing Services & Original Design Manufacturing
- Software & IT Services
- Hardware
- Semiconductors
- Telecommunications
- Internet Media & Services

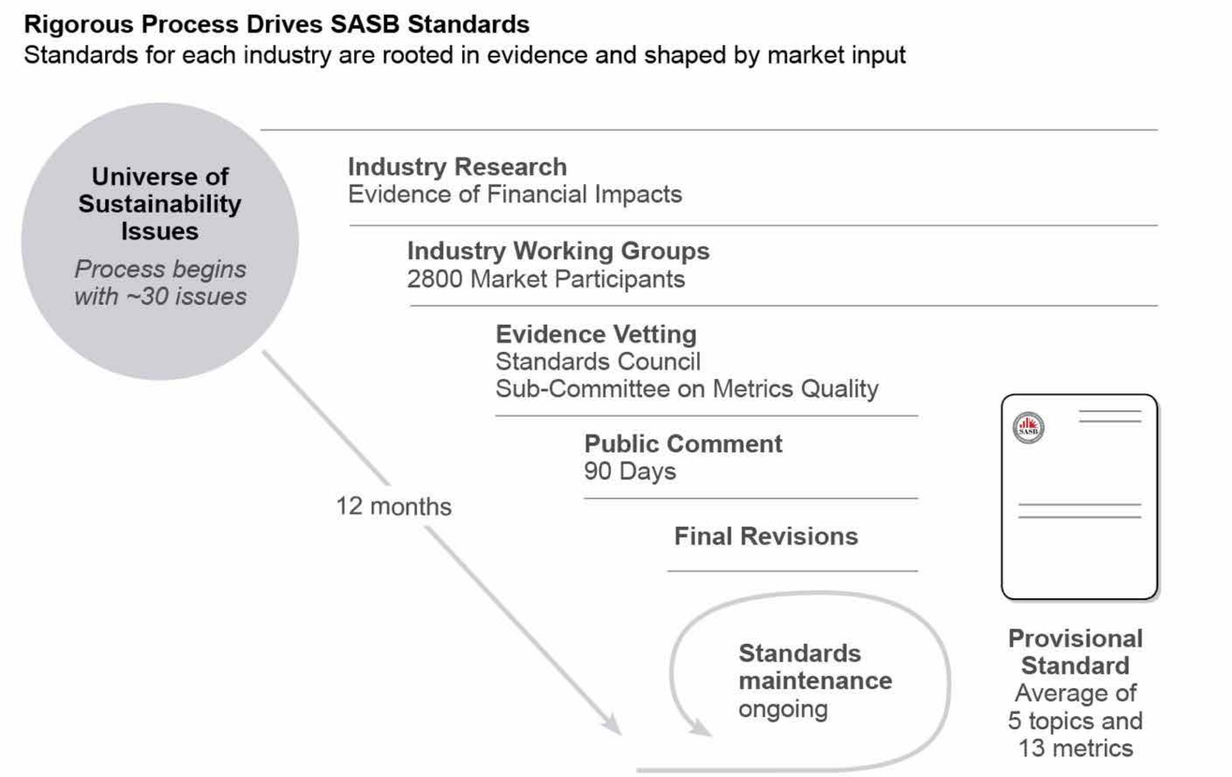
Transportation

- Automobiles
- Auto Parts
- Car Rental & Leasing
- Airlines
- Air Freight & Logistics
- Marine Transportation
- Rail Transportation
- Road Transportation

**Appendix G – SASB's Standards Setting Process**

SASB's provisional standards development process (summarized in Figure L) began with a three-month, in-house research phase to identify disclosure topics and related accounting metrics. SASB's research team examined two types of evidence, evidence of interest and evidence of financial impact, in order to determine a minimum set of disclosure topics for each industry. Evidence of interest was gathered by searching tens of thousands of industry-related documents (i.e., Form 10-Ks, shareholder resolutions, CSR reports, media, and SEC comment letters) for keywords related to 30 general sustainability issues. This provided a "heat map" that indicated interest in certain issues by investors and other stakeholders. Evidence of financial impact was gathered by examining sell-side research, investor call transcripts, third-party research, datasets on sustainability issues and related costs and regulatory actions, and news articles, among other sources of sustainability and financial information.

**Figure L**




After identifying the minimum set of disclosure topics for an industry, for which there was solid evidence of both investor interest and financial impact, SASB identified and documented existing metrics and practices used to account for performance on each disclosure topic. When possible, SASB harvested existing metrics and management disclosure formats. When high-quality metrics and management disclosures were not available, SASB constructed new ones. The result of Phase 1 was an Industry Brief that outlined the proposed set of disclosure topics and accounting metrics for each industry.[116]

[116] SASB industry research briefs are available free of charge at http://www.sasb.org/approach/our-process/industry-briefs.

SASB then released each Exposure Draft Standard for a 90-day public comment period. During this time, any member of the public could download the Exposure Draft Standard from SASB's website and provide feedback. At the conclusion of the public comment period, SASB incorporated feedback received into the standard. The provisional Sustainability Accounting Standard was then published and made available to the public.

The provisional standards can be used by investors and companies; provisionality does not impair their use. During the provisional phase, SASB welcomes feedback from the public. At the end of the provisional period, based on the codification process outlined in the Rules of Procedure, SASB will codify the standards and remove the provisional label.

Several factors make SASB's process unique:

- Providing research to industry working groups presents a point of departure for the evaluation of issues and metrics, which facilitates reaching consensus on disclosure topics that are reasonably likely to constitute material information for companies in an industry.
- Collecting feedback via online surveys reduced the likelihood of groupthink and allowed SASB to host large working groups, at no expense or charge to participants.
- The public had multiple opportunities to provide feedback on SASB standards, including industry working groups (open to anyone with five-plus years of industry experience), public comment periods (open to all), and the Delta Series event (open to all). SASB actively seeks balanced feedback from its three stakeholder groups: corporations, market beneficiaries, and public interest/intermediaries.

SASB's process is transparent. A summary of feedback received during industry working groups and public comment periods (as well as SASB's responses) is available in SASB's reports to the Standards Council. These reports are posted to the sector pages on SASB's website after the Standards Council's review of the sector.[117]

[117] View Standards Council reports sector by sector, by selecting a sector from the drop-down "sector" menu at http://www.sasb.org.