

**Exhibit A**

**eVALUEater Screen Descriptions**

## Screens

definitions of the research criteria

## Abortion

**Abortifacient**

There are several methods of birth control (drugs, chemical agents, devices, etc.), which are routinely described as "contraceptives", however, some birth control methods act as "abortifacients", by preventing the fertilized egg from being implanted, or by causing a premature delivery.

**Cloning**

In cloning, an egg (ovum) from a woman is surgically removed from her body and taken to the laboratory where the nucleus is removed. A body cell (somatic cell) is removed from the body, commonly skin cells, and its nucleus is inserted in the "empty" egg. The cell then develops into a cloned embryo.

**Fetal Tissue**

Scientific experimentation performed upon or using tissue taken from human fetuses. In order for stem cells to be harvested from an embryo the embryo is destroyed. A human embryo is the earliest stage of human life. Ironically, adult stem cells have been successful in treating and curing 65 human diseases, while embryonic stem cells have not cured a single one. Adult stem cells are obtained from body tissues such as bone marrow, umbilical cord blood, fat cells, etc., and do not destroy life.

**Hospital**

As part of their list of services, this hospital has chosen to perform abortions for profit.

**Insurance**

Markets health insurance policies and/or medical service plans (HMO's) that pay for abortions ("pregnancy termination") when they are not required by state regulations. Live birth coverage costs approximately \$8,000 - \$11,000, as compared to abortion coverage at approximately \$300 - 1,000, making it less profitable when a policy holder has a live birth.

**Miscellaneous**

Examples Include: Medical waste (fetal tissue from abortion clinics) recycled or used for fuel in waste-to-energy plants. Advertising campaigns promoting abortion.

**Philanthropy**

Providing charitable aid or donations to non-profit organizations which include foundations that pay for abortions, provide emergency contraception pills, birth control pills and/or pursue "reproductive freedom", like Planned Parenthood, to everyone, regardless of age.

**Promote**

Uses one or more methods to promote the Pro-Choice agenda. This may include advertisements or marketing campaigns.

## Entertainment

**Advertiser**

Sponsors contribute to the culture of television, either positively or negatively by choosing which programs they support with their advertising dollars. In choosing to spend money on some of the most egregious content on broadcast television, they are supporting shows containing sexually graphic, violent or profane material and ultimately undermine the positive values parents are trying to instill in their young ones.

**Audio**

Produces or distributes music or talk radio shows that are excessively violent, glorify the use of drugs and alcohol or profane.

**Film**

Produces motion pictures, miniseries, sitcoms, other types of programming, or commercials containing sexually graphic, violent or profane material.

**Games**

Publishes computer and/or video games that are sometimes considered controversial, due to the depiction of graphic violence, sexual themes, adver-gaming (a form of advertising in games), simulated gambling, consumption of drugs, consumption of alcohol or tobacco, profanity, or propaganda (including same sex encounters).

**Internet**

Provides easy access to websites containing content unsuitable for all ages. This includes alcohol-related websites, social networking sites (can open the door to pedophiles), the broadcasting of new and/or old movies, miniseries, or other types of programming containing sexually graphic, violent or profane material.

**Phone**

Provides telephone or mobile phone software that contains graphic violence, sexual themes, adver-gaming (a form of advertising in games), simulated gambling, consumption of drugs, consumption of alcohol or tobacco, profanity, or propaganda (including same sex encounters).

**Print**

Publishes books or magazines, or designed advertisements or marketing campaigns containing sexual themes, graphic violence, consumption of drugs or alcohol, profanity, or propaganda.

**Retail**

Owns or operates one or more stores, either from a physical location or from the internet. These stores sell or rent products that are violent, profane, or sexually graphic, such as tee shirts, games, books, novelty items, music and videos.

**Television**

Distributes anti-family programming through cable, pay-per-view (PPV) or video-on-demand channels.

**Theater**

Distributes anti-family programming through a motion picture exhibition facility.

## Lifestyle

**Advertiser**

Communicates to potential customers about their products and/or services by placing advertisements in magazines, cable networks and/or internet sites that are designed for the gay, lesbian, bisexual, transgender or transsexual community.

**Audio**

Produces or distributes music or talk radio shows that are targeted to the gay, lesbian, bisexual, transgender or transsexual community.

**Augmentation**

Manufactures products/pharmaceuticals used for sexual reassignment procedures and/or hormone replacement therapies that alter genital and other physical characteristics. Some transsexual people opt for reassignment surgery to align their physical sexual characteristics with their emotional and

psychological identity.

### Establishment

*Owns or operates one or more nightclubs, bars or businesses that encourage, promote, or cater to gay and/or lesbian clientele.*

### Film

*Produces theatrically-released movies, made-for-TV movies, miniseries, sitcoms, other types of programming, or commercials that promote the homosexual lifestyle as an acceptable alternative lifestyle. These feature gay, lesbian, bisexual or transgender characters or issues and may have same-sex romance or relationships as an acceptable and important plot device.*

### Games

*Publishes computer and/or video games that are sometimes considered controversial, due to the depiction of homosexual themes and adver-gaming (a form of advertising in games).*

### Group

*Officially recognizes GLBT (gay, lesbian, bisexual, transgender/transsexual) employee groups and/or special networks designed especially for GLBT employees.*

### Internet

*Provides easy access to websites containing content unsuitable for all ages. This includes, but is not limited to, encouraging alternative sexual behavior, the broadcasting of videos, or other types of media containing sexually provocative and/or profane material.*

### Legislation

*Supports federal legislation that affects the lives of lesbian, gay, bisexual and transgender Americans.*

### Philanthropy

*Providing charitable aid or donations to non-profit organizations that include foundations actively pursuing and advancing the alternative lifestyle movement.*

### Phone

*Provides telephone or mobile phone software that contain GLBT themes.*

### Print

*Publishes books or magazines, or designed advertisements or marketing campaigns containing homosexual themes.*

### Promote

*Uses one or more methods to promote gay, lesbian, bisexual, transgender/transsexual, or questioning lifestyles (GLBTQ). This may include advertisements or marketing campaigns targeted to those who choose alternative lifestyles, proudly display or boast being "gay-friendly", and/or provide resources for the advancement of GLBTQ groups (meeting places, materials, etc).*

### Retail

*Owns or operates one or more stores, either from a physical location or from the internet. These stores sell or rent products that are targeted to the gay and lesbian community, such as tee shirts, games, books, novelty items, music and videos.*

### Sponsor

*Has formed a business relationship with GLBTQ (gay, lesbian, bisexual, transgender/transsexual, and/or questioning) organization(s) or events. In an attempt to gain marketing and community relations opportunities, money, products or services are exchanged for corporate recognition for their involvement.*

### Television

*Distributes homosexual programming through cable, pay-per-view (PPV) or video-on-demand channels.*

**BECAUSE OF THE EVER GROWING MOVEMENT OF EQUALITY BENEFITS TO EMPLOYEES (TYPICALLY REQUIRED BY STATE LAW) AND/OR BECAUSE IT IS UNETHICAL TO DISCRIMINATE AGAINST ANOTHER HUMAN BEING (ROMANS 12:9-10), THE FOLLOWING SCREENS ARE NOT CALCULATED AS VIOLATIONS, BUT ARE LISTED HERE FOR INFORMATIONAL PURPOSES.**

### Benefits

*Advocates of domestic partner benefits seek to give the same employee benefits to cohabiting heterosexual couples and homosexual partners that employers have traditionally been providing to married employees, primarily health and dental insurance coverage for the spouse of an employee, but also including bereavement time, relocation assistance, and similar "soft" benefits. Originally, a benefits policy was designed to encourage and promote marriage. Marriage tends to maximize prosperity, achievement, and personal responsibility in society and minimize negative behaviors and outcomes. Studies consistently prove that marriage improves the circumstances of men, women, and especially the children of married couples. ("The Scholarly Consensus on Marriage", Feb. 2006)*

### Medical

*Sexual augmentation (made possible through transgender-related prescription drugs, insurance policies, hospitals, or employee benefits through companies' HMO and PPO plans) which changes one's voice, body hair, muscular development, or genitals to match their "preferred" gender.*

### Policy

*Implements non-discrimination policies that prohibit discrimination based on sexual orientation and/or gender identity in their company's employment policy statement.*

### Training

*Implements mandatory faculty and/or employee training on diversity, discrimination, sensitivity or harassment, focusing primarily on issues pertaining to actual or perceived sexual orientation and gender identity in an attempt to normalize homosexuality.*

## Pornography

### Advertiser

*Communicates to potential customers about their products and/or services by placing advertisements in adult content magazines, cable networks and/or internet sites.*

### Audio

*Produces or distributes music or talk radio shows that are sexually explicit.*

### Establishment

*Owns or operates one or more nightclubs or bars that offer striptease (the erotic removal of a performer's clothing) and/or other related services such as lap dances.*

### Film

*Produces soft-core or hardcore pornographic movies, miniseries, other types of programming, or commercials with the purpose of promoting sexual arousal in the viewer, often featuring depictions of nudity and sexual activity.*

### Games

*Publishes computer and/or video games that contain graphic sex or nudity.*

### Internet

*Distributes pornography by means of the internet through free or subscription-based websites.*

### Miscellaneous

*Examples Include: Adult Entertainment expo exhibitor. Investment technology developer of platforms specifically designed to fund adult entertainment industry businesses.*

**Phone**

*Provides telephone or mobile phone software that contains graphic sex or nudity.*

**Print**

*Publishes books or magazines, or designed advertisements or marketing campaigns containing content of a sexual nature.*

**Retail**

*Sells pornographic material, or owns or operates one or more sex shops (erotic shops), either from a physical store front location or from the internet. These retail stores sell or rent products such as sex toys, pornographic/erotic videos, books, or magazines, or items used in the practice of sadomasochism, or exploitative sexual deviancy, or display images of erotic lingerie.*

**Television**

*Distributes pornographic films through cable, pay-per-view (PPV) or video-on-demand channels.*

**Rights****Armaments**

*Supplies military equipment, weapons and/or technology of war to terrorist sponsoring nations.*

**Labor**

*Un-mandated labor rights or workers' rights; where there are no labor relations between workers and their employers. This includes cheap labor, no independent unions and impoverished migrant laborers.*

**Regime**

*Conducts business with countries having oppressive, often tyrannical, systems of government.*

**Persecution**

*Conducts business in countries where there are known human rights violations because of persecution or severe discrimination against Christians.*

**Terrorist**

*Conducts business with terrorist sponsoring nations.*

**Tobacco****Product**

*Produces, processes, and/or markets cigarettes, cigars, and smokeless tobacco products such as snuff and dip.*

**Distributor**

*Markets and/or distributes leaf tobacco.*

**Retail**

*Owns a tobacco store selling primarily cigars and related tobacco products.*

**Gambling****Equipment**

*Gaming machine manufacturer or supplier, which may include but is not limited to casino gaming machines, progressive payout machines, lottery systems, instant win lottery tickets, gaming software for mobile phones, gaming software systems, as well as multi-player game software or terminal systems.*

**Facility**

*Operations may include casino hotels, dockside and riverboat casinos, cruise lines, horse racing tracks, dog racing tracks, or Native American gaming establishments.*

**Internet**

*Operator of a gaming web site featuring poker, casino games, bingo, sports betting, etc.*

**Phone**

*Provides telephone or mobile phone gaming opportunities.*

**Services**

*Provides services for the gaming industry including gaming development, licenses, software, installation, maintenance, cash solutions, management services, consulting services including technical, training, and project management for casinos in development.*

**Television**

*Distributes interactive gaming television channel on satellite or cable TV.*

**Alcohol****Brewer**

*Produces and/or markets beer and beer-related beverages.*

**Distiller**

*Produces, markets, and/or imports distilled liquors.*

**Distributor**

*Distributes beer, wine and/or distilled liquor.*

**Equipment**

*Manufactures products used in packaging alcohol products.*

**Microbrewer**

*Owns or operates a microbrewery (a small brewery) or brewpub.*

**Retail**

*Owns a wine or liquor store and counts for large portion of a company's revenue.*

**Winemaker**

*Produces, markets, and/or distributes wine and wine-related beverages.*

**Exhibit B**

**Insight360 Category Descriptions**

## **Business Model**

*Focuses on firms' development of strategies to create and deliver value in the short as well as the long term, minimize or mitigate systemic risks and negative externalities as relevant, and avoid controversial business practices.*

Economic sustainability (and sustainable business practices in general) inherently involves a long-term perspective, in particular accounting for positive and negative externalities. While there is no general agreement about what constitutes 'long-term', in finance it is generally taken to be five years; however in terms of sustainability parameters it is generally perceived as substantially longer, ten to twenty years at a minimum. Long-term return or value creation is not the same as maximizing shareholder return. Maximizing sustainable shareholder value means creating and maintaining a sustainable firm (high quality products and services; loyal customers; robust financial and operational planning and the like). A sustainable business model needs to take these factors into account. It implies that sustainable long term value needs to optimize value rather than maximize it. Optimization involves the balancing of value-adding factors.

Long-term value creation and maintenance requires (at least) three forms of capital: financial, human, and natural. Attempts to maximize financial value can minimize (or at worst destroy) the other two forms of capital. Optimizing for all three is a different task entirely, and is a prerequisite for the long-term sustainability of the firm's ability to create long-term value and returns.

## **Corporate Governance**

*Focuses on a firm's relationship of top management and the board to its stockowners and key stakeholders. Considerations include ownership structure, voting and proxy processes, board structure and tenure, ethical business practices, and executive compensation arrangements. Governance excludes dividend reporting.*

Corporate governance concerns the formal and informal relations among stockowners (individuals and institutional owners) and top corporate managers and boards of directors. It is also defined by some to additionally include relations between those three groups (or some of them) and key stakeholders, e.g. customers, communities directly impacted by firm actions, employees, creditors and suppliers. Broader definitions would add: regulators/governments, media, auditors and others with significant interests in firm behavior. Governance itself refers to the mechanisms, processes and informal networks that define how the firm is controlled and directed, and how decisions are made. Increasingly governance is used by many significant actors to include management of environment and social issues (as in ESG). In many cases when investors and/or a firm views E and S issues as material (that is, may reasonably affect the value of the firm) they enter the governance arena, and may be a topic of engagement between owners and managers/boards or in proxy initiatives. As such, is focused on process and organization/decision making, and a broader meaning, focused on sustainability issues that are or may reasonably become material. Governance is used to exclude dividend reporting.

A core part of governance in the U.S. focuses on conflicts of interests that may be inherent in the publicly traded firm, especially between top managers (and perhaps boards of directors) and

external stockowners. Top managers are often considered to have significant rent seeking opportunities (managerial opportunism) inherent within their positions. Such opportunities can include compensation not linked to long(er) term performance; performance metrics that do not necessarily measure firm specific performance (e.g. 'free ride' on a rising stock market); perks such as corporate jets, golden pension plans, golden handshakes and parachutes; legal or illegal use of insider information; and hedging of non-cash compensation. Governance vis-a-vis shareowners attempts to align the long term interests of top managers (and sometimes boards) with those of long term shareowners, through law, negotiated firm-specific formal agreements, and informal means. Increasingly governance standards are mandated in law, codes of best practice, and sometimes settled in legal suits by courts.

## **Environment - Atmosphere**

*Focuses on all environmental impacts on the atmosphere at both the local and global levels (e.g. greenhouse gases/climate change, mercury and other emissions).*

Airborne byproducts from firm activities can include greenhouse gases (GHG's) and air pollutants (e.g. particulate matter, carbon monoxide, nitrogen oxides, etc.). GHG's such as carbon dioxide and methane contribute to climate change, a major threat to ecosystems, natural resources, human health, and infrastructure. While the changes in average temperature and sea level seem modest, some regions are already more likely to experience extreme temperatures, extreme humidity, storms, or droughts. Air pollutants such as sulfur oxides, radon, heavy metals, and particulates can cause direct harm on public health and ecosystems on a more local scale.

Responsible firms manage the emissions of their direct operations, the use phase of their products, and have high standards for their suppliers. The majority of GHG emissions are related to the production and use of fossil fuels, but many other industrial or agricultural processes also cause emissions. Air quality contamination comes from a variety of sources including factories, power plants, and smelters. In addition to using more efficient processes, firms can install devices that filter out pollutants.

## **Environment - Land**

*Focuses on all environmental impacts on land (e.g., biodiversity, deforestation, solid waste disposal, soil pollution, land degradation and rehabilitation).*

Firms are responsible for the impact of its activities on the land and terrestrial habitats, with potential impacts from generating waste and siting facilities including soil pollution, deforestation, and habitat destruction that threatens biodiversity and undermines public health. Hazardous and non-hazardous wastes pose serious risks to people and the environment if not adequately controlled. Hazardous wastes can include poisonous byproducts of manufacturing, farming, construction, health care, medical research, and other industries. Non-hazardous wastes can still be very harmful to wildlife as well as communities as they pile up in landfills, polluting the soil and releasing methane as well as other chemicals over time. Besides generating waste as byproducts, other activities also put pressure on terrestrial resources such as logging, mining, and farming.

Companies bear direct responsibility for their waste from production as well as the end-of-life of products, and can establish waste management systems in order to minimize or prevent the production of solid waste. Responsible firms consider the resource efficiency of their products along with packaging materials. Many solid wastes such as paper or plastic can be recycled. Responsible siting can reduce the danger of habitat splitting, pollution, and wildlife exposure to hazardous waste.

## **Environment - Water**

*Focuses on all environmental impacts on water resources (e.g. waste water, water pollution, aqua bio-diversity, water efficiency).*

A variety of firm activities put water quality, water availability, or aquatic ecosystems at risk. Some examples include agricultural water usage, deep-water drilling, fishing, and production - especially in developing countries. Responsible water usage involves using water-efficient technologies such as irrigation systems and respecting the right to water of local communities. Where relevant, firms should have policies in place to minimize the risk of harming aquatic ecosystems and aquatic biodiversity (for example, through oil spills).

Wastewater management is another set of practices that affect the water supply and aquatic ecosystems. In particular, hazardous industrial waste that contains chemicals, heavy metals, radiation, or dangerous pathogens must be carefully contained or treated in order to avoid contaminating drinking water or natural habitats. Hydrofracturing or “fracking” is a particularly water-intensive process that also generates large amounts of toxic wastewater. In addition to minimizing and containing the wastewater it generates, firms are responsible for reducing the risk of water contamination and remediating groundwater or other bodies of water that it has contaminated.

## **Human Capital**

*Focuses on the treatment of both unionized and non-union employees according to generally accepted international fair labor standards. Relevant issues include employee retention, education and training, health and safety, compensation and benefits, as well as diversity and mentoring programs.*

The Human Capital category indicates a firm’s treatment of its employees according to generally accepted international fair labor standards. This includes a firm’s relationship to unionized and non-union employees, employee health and safety, and employee wellbeing. Baseline good practices may be derived from the International Labor Organization standards, and should involve compliance with all relevant laws in which workers are employed. This category includes worker rights such as: the right to association and collective bargaining (and the lack of interference with those rights, whether in the form of bribery, termination, or other punishment), seen as a fundamental element of sustainable behavior since it can foster peaceful, inclusive, and democratic participation of represented workers and reduce larger social problems such as poverty; protection from any kind of compulsory labor (including child labor); employee wellbeing (including occupational health and safety standards, training and education, fair compensation and benefits, employee retention and development, mental health and wellness



programs); and diversity. When properly cultivated and developed human capital can lead to greater productivity and firm performance.

A number of programs can enhance human capital, such as occupational health and safety routines and training, diversity initiatives, mentorships and wellness programs. Additionally, attention to work-life balance issues and non-excessive working hours foster human capital growth.

### **Product Integrity & Innovation**

*Focuses on the quality and innovativeness of products and service, as well as the research and development of products in the pipeline. Also includes the management of packaging and disposal over the product's lifecycle.*

The Product Integrity & Innovation category indicates the level of quality and innovation a firm displays through its products and service and the firm's management of a product's outputs over the course of a product's lifecycle. Responsible practice in the realm of product quality involves the implementation of product management systems and adherence to safety regulations. Effective management systems can limit product recalls, reputational risks and product related legal actions. Lifecycle management includes disposal programs and end-of-life management to help companies recover valuable materials and reduce end-of-life waste as regulated by law. Innovations that improve the energy-efficiency or recyclability of products and packaging are relevant activities.

This category also indicates the strength and quality of a firm's product pipeline. Product pipeline determines the growth potential and competitiveness of a firm, and ensures that a company has enough products on the market to sustain the business. A firm's innovation capabilities and research and development spending relate positively to the strength of the product pipeline. This term is also particularly common in the pharmaceutical industry, where it is known as the drug pipeline. Pharmaceutical products can spend significant time in the pipeline though only few make it to the market. Nonetheless, the drug pipeline is an important indicator of the value and future prospects of a pharmaceutical company.

### **Social Impact**

*Focuses on recognized international human rights standards, impact on and relationships with relevant communities and key stakeholders as well as philanthropy and charity.*

Due to the power of business to affect virtually all levels of human rights, effective corporate human rights policies contain both broad and specific language and specific, detailed guidance as well as impact assessments. Firms are subject to legal liability that results in direct financial penalties for complicity in abuses committed to actors within their supply chain. Effective responsible behavior on human rights involves relationships and outreach with communities in which corporations operate and the development of complex, robust, and thorough mechanisms to monitor firm behavior and human rights violations in their operations. Corporations may base these due diligence mechanisms on the rights enumerated in the International Bill of Human Rights. When firms are active in areas of weak state governance, they should have measures in place to in order to avoid infringing on human rights.

For certain industries, positive social impacts come from ensuring that people in a variety of locations and variety of economic backgrounds have affordable access to products and services. This is particularly important to firms in the healthcare industry, for example, that need to develop complex strategies to improve access to medicines and vaccines in order to compensate for infrastructural issues. Mechanisms to solve these issues can include responsible pricing or product donation through patient assistance programs. Natural resources and infrastructure companies need to undertake social assessment for new projects, as well as to establish mechanisms to ensure free, prior and informed consent with regard to local communities at each stage of the project.

This category also indicates the degree to which a corporation contributes to the general welfare of society through charitably donated time or funds. Corporate philanthropy and charity may take the form of matching gifts, volunteer grants, or non-monetary product or service donations.

## **Supply Chain**

*Focuses on firms' logistical organization and coordination with its suppliers, including social and environmental conditions and impacts. Also includes adherence to supply chain labor standards, sourcing controversial raw materials, and adherence to or development of industry best practices.*

Supply chain management (SCM) encompasses the planning and management of all activities involved in sourcing, procurement, conversion, and logistics management. SCM is increasingly focused on ESG/sustainability issues as a condition for and part of contracts. There has been a consistent gap between the sustainable actions of reporting global firms and their suppliers, which do not begin to meet best practice sustainability standards. These standards can also be known as green supply chain management, ethical supply chain management, socially responsible supply chain management, etc. Overall, 'green' supply chain management is rapidly increasing due to political, consumer and social (from non-governmental organizations) pressures, along with internal dynamics within firms themselves. Sustainable supply chain management therefore incorporates a very wide range of ESG issues, from human trafficking to carbon emissions to water usage to ownership of supply firms. In fact, it incorporates potentially all ESG issues.

Increasingly in various legal jurisdictions there are requirement for mandatory disclosure. Many global firms incorporate elements of SCM into their employee code of ethics, which means that their managers are responsible for implementing and monitoring these issues. Major laws that target SCM include, for example, the U.S. Dodd-Frank Act, which specifically targets conflict minerals in the supply chain. Similarly the UK Modern Slavery Bill prohibits suppliers from contracting with those that fall below its standards.

## **Sustainable Energy Use & Production**

*Focuses on firms' use and production of sustainable energy forms, including those that minimize negative externalities (e.g. wind and solar power). It also includes how efficiently firms use all energy inputs.*

All firms use some amount of renewable or non-renewable energy, whether it is purchased or produced in-house. Burning fossil fuels such as gasoline, coal, natural gas, jet-fuel, and diesel is a primary contributor to climate change. Managing energy usage is most relevant to companies with energy intensive manufacturing processes such as those producing chemicals, electronics, materials, pharmaceuticals, and industrial goods. Large amounts of energy are also used for transportation, whether it is on site or provided as a service such as shipping. Firms can improve the energy efficiency of their processes, products, and buildings. They may also reduce fossil fuel consumption by switching to renewable fuels on their own facilities or purchasing renewable energy credits to procure renewable energy from the grid. Relevant sources of renewable energy are solar, wind, geothermal, ethanol, biodiesel, biomass, fuel cells and non-fossil methane.

**Exhibit C**

**Insight360 Scoring Description**

# Scoring & Analytical Accuracy

## Scoring

The data extracted by Insight360 comes from a wide variety of sources and can differ widely by type. Both structured data (organized/quantitative) and unstructured data (unordered/semantic content) are normalized within the established sustainability categories according to timeliness, frequency, and intensity through a running sum-based average. Custom materiality lenses can also be developed to weight data points to varying degrees according to sustainability topic, sector, and data source.

### Quantifying qualitative data

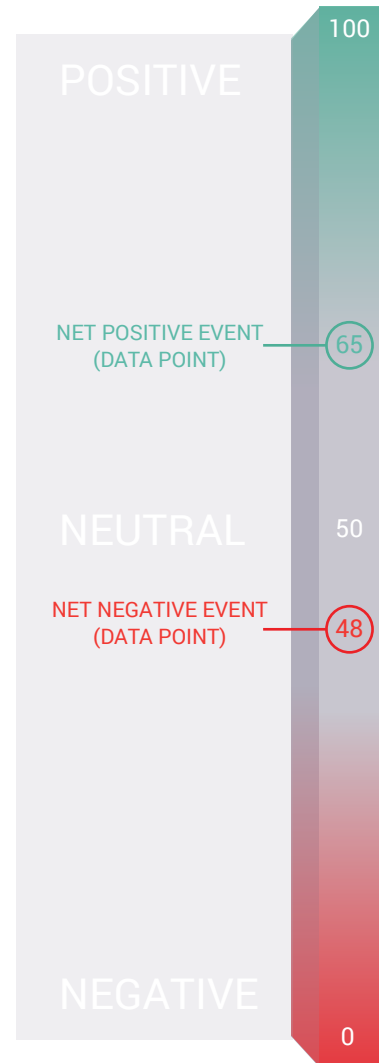
“Unstructured” data inputs are text-heavy and not organized in a pre-defined manner, which has traditionally been difficult to analyze using technology due to ambiguity. The cognitive computing system behind Insight360 uses natural language processing to interpret semantic content and generate analytics in a process that remains consistent with established frameworks, scoring data points on performance using a 0 to 100 scale where 50 represents a neutral impact.

The tendency towards absolute negative or positive for each rating point is dependent on the signals derived from each piece of data as well as the linguistic structures and cues that are inherent within typical text-heavy unstructured data points.

Each rating, in and of itself, is only an incremental data point contributing input to a behavior articulated by an overall trend. The number of data points which contribute substantive information of interest on covered companies results in a varied flow of ratings (negative, neutral, positive) with varying frequencies and direction over time.

### Structured data

Though by nature more quantifiable than unstructured data, structured data sources are highly variable in content and quality. In order to accurately analyze structured content, an established framework is employed to consistently treat structured data sources. This framework considers: source credibility (credentials, editorial independence, verification process), accuracy (data is correct), and timeliness (contemporary relevance).



## Analytical Accuracy

### Inter-rater reliability

Due to its qualitative aspects, sustainability data has traditionally been dependent on the subjective opinions of humans. Human analysts, even those trained in a similar manner and from the same organization, never agree perfectly. Ambiguity, subjective perspectives, and phenomenon such as confirmation bias inherently prevent a completely objective and consistent approach. In statistical terms, the degree of homogeneity in opinions is known as inter-rater reliability.

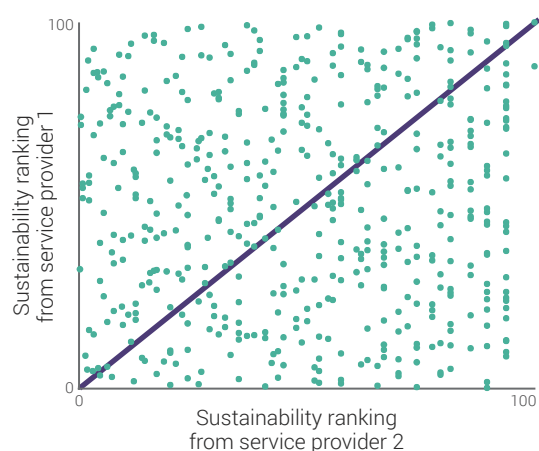
Varying rates of inter-rater reliability mean traditional sustainability data sets can often have different or conflicting opinions regarding the materiality, weighting, and overall effect of issues and their relation to particular performance metrics. This has prevented the establishment of an agreed-upon objective baseline for comparable sustainability data, a challenge acknowledged by many academics and practitioners.

### Data validity framework

To establish a baseline of sustainability data with which to measure the accuracy of Insight360 results, a random subset of underlying content was selected. These pieces of content were then analyzed by subject matter experts and members of the Content & Data team, who analyzed the data and independently determined: the primary target for each particular piece of content, which sustainability categories were relevant to the subject covered, and the expected impact of the content on each particular category. These responses were then used to establish a baseline data set, also called a calibration data set - which is used as a measure to ensure consistency in how data inputs are analyzed.

Comparison of two sustainability data sets rating the sustainability performance of 500 largest listed equities on US exchanges

| Line representing perfect alignment of sustainability ranking



Source Sustainability Ratings, Rankings and Indexes: New technological frontiers: natural language processing, machine learning analytics and crowd aggregated information (2014)

