

Morningstar, Inc.

Code of Ethics

As amended and in effect on May 15, 2020

Morningstar has created an open environment for our employees, and we value trust and honest communication. Our high standard of ethical behavior serves as a foundation for our work and helps to create a positive work environment for all employees. Acting ethically helps ensure that people outside of Morningstar will continue to hold us in high esteem and that customers will have a consistently positive experience with us. We owe much of the goodwill we enjoy from customers to our reputation for high ethical standards. Our customers rely on us to be an objective, honest, and credible source of investment information, analysis, products and services.

Our philosophy is that by giving employees the freedom and tools to make their own decisions, people can and will do their best work. With this freedom comes the responsibility to always act with the utmost integrity. Situations will arise where you will be faced with ethical decisions, and this Code of Ethics is meant to help guide you through those decisions. By clearly spelling out where Morningstar stands on bigger issues, we hope to provide you with a framework for making good choices on a daily basis. In serving this purpose, these guidelines will help ensure that Morningstar will continue to be seen for what we are – a company that puts investors first and in doing so promotes honest and ethical conduct, including the ethical handling of conflicts of interest and compliance with applicable laws, rules and regulations.

This Code of Ethics applies to all Morningstar employees (including employees of Morningstar subsidiaries). The pertinent provisions of this Code of Ethics also apply to members of Morningstar’s board of directors and to Morningstar’s temporary workers, interns, independent contractors, and consultants in connection with their work for Morningstar. For this reason, except where the context requires otherwise, references to “employment” will be deemed to include all activities on behalf of Morningstar. In addition, your business unit or country manager may impose additional guidelines

depending on business needs and applicable legal requirements. Please note, however that to the extent any specific provisions are inconsistent with your local laws, they will not apply to you.

We expect all Morningstar employees to incorporate these ethics into their daily work. You must read through the provisions of this Code of Ethics carefully and apply them to all aspects of your work. If you are unsure about how to handle a situation, ask your manager or the Legal department for guidance on the situation and an appropriate course of action.

Personal Responsibility

Accountability: Morningstar holds all employees responsible for the quality of their work. Employees are expected to honor promises and commitments made to co-workers and contacts outside Morningstar with respect to deliverables, deadlines and other aspects of their work. Faulty or incomplete work product and missed deadlines create backlogs in any process, so it’s imperative to handle any possible errors, shortfalls or delays properly.

Professionalism: Morningstar has a business casual environment, but that does not mean that employees should be any less professional. The need for professionalism extends beyond the confines of our office space. Each and every one of us is a spokesperson for Morningstar, and our recognition of that important role should be at the forefront of our every professional interaction, both inside and outside of the workplace, whether with clients and end customers, other commercial parties, fellow employees or the investing public. Whether you’re on the phone, at a conference, in a business meeting, or conducting an interview, you are Morningstar to the person or people with whom you are speaking. Therefore, we all must be mindful of the responsibility that goes along with representing Morningstar.

Honesty: All employees are expected to be truthful in their dealings with others. Honest communication breeds openness and trust. It enhances your own credibility as well as that of Morningstar. We will not tolerate dishonesty.

Compliance with Laws: All employees and board members are expected to obey the laws, rules, and regulations of the countries and localities in which Morningstar does business. Obeying the law, both in letter and in spirit, is the foundation on which Morningstar's ethical standards are built. To the extent not prohibited by applicable law, employees convicted of a felony, theft, or crime of dishonesty during their time of employment or within the past 12 months must inform Morningstar's general counsel within 30 days of conviction. Failure to do so may result in disciplinary action up to and including termination of employment.

Conflicts of Interest

One purpose of this Code of Ethics is to help you address situations that may involve a conflict of interest. These include situations in which your personal interests are in conflict with the interests of Morningstar, situations in which you, or a person with whom you have a personal relationship, might receive personal benefits as a result of your position with Morningstar, and situations that otherwise may cast doubt on your ability to act with objectivity in your dealings with or on behalf of Morningstar.

Employees must avoid situations where their personal interests or other business interests could conflict with the interests of Morningstar or could be perceived by others as doing so. Conflicts of interest arise when an individual's position or responsibilities with Morningstar present an opportunity for personal gain separate and apart from the direct rewards of employment, or when an employee's personal interests or other business interests are inconsistent with those of Morningstar and could lead to his or her responsibilities with Morningstar being compromised.

A conflict of interest or the appearance of a conflict, may arise in a variety of circumstances and it is not possible to describe every situation. By way of example, however, a conflict occurs when an employee or individual with whom an employee has a personal relationship:

1. Directly or indirectly has a personal or financial interest in any transaction which is or may be adverse to Morningstar; or
2. Engages in or recommends a business transaction for Morningstar that results in personal profit or gain.

Beyond the clear cases of conflict of interest described above, there are situations that are inconsistent with the high standards of business ethics required by Morningstar that cannot be

compromised. If there is room for suspicion that an interest in, or connection with, another venture might affect, or reasonably appear to affect, an employee's exercise or judgment on behalf of Morningstar, the interest or connection shall not be entered into, and once identified, shall be immediately brought to the attention of the employee's manager.

If you become involved in or are otherwise made aware of a conflict of interest, please consult your manager, your human resources representative, your compliance officer, your country manager, the head of your business unit, or another officer of Morningstar. In addition to these requirements, company board members are expected to comply with their obligations described in the Conflicts of Interest section of Morningstar's Corporate Governance Guidelines.

Gifts

You should not accept any gift, entertainment, meal, or favor from any client, potential client, candidate for employment, supplier or vendor, or potential supplier/vendor that would influence or potentially influence your conduct, or that could reasonably be viewed by an outside observer as affecting your judgment or actions in the performance of your duties on behalf of Morningstar. This principle, which does not prohibit reasonable client or prospect entertainment, applies to our transactions everywhere in the world, even where the practice is considered "a way of doing business."

In particular, you should not in any circumstances accept any gifts, entertainment, meal, or favor from any client, potential client, candidate for employment, supplier, or vendor worth more than U.S. \$100 or its equivalent without first consulting your manager, the chief compliance officer in your region, the global chief compliance officer or the Legal department. Furthermore, you should not under any circumstance accept (i) a gift consisting of cash or (ii) any gift, entertainment, meal, or favor (of any size) if it is offered in exchange for Morningstar information, data, services, or preferential treatment. If you have any questions regarding the appropriateness of any gift, entertainment, meal, or favor, you should first consult your manager, the chief compliance officer in your region, the global chief compliance officer or the Legal department.

Similarly, you should not offer gift, entertainment, meal, or favor to any client, potential client, candidate for employment, supplier/vendor or potential supplier/vendor that is intended to or would result in favorable treatment or influence over a business decision or could be reasonably viewed as (i) not appropriate in its business context or (ii) placing the recipient under a real or perceived obligation to you or Morningstar.

See the information under the headings “Anti-Bribery” and “Entertaining or Doing Business with the U.S. and Non-U.S. Governments” for special considerations concerning any gift, entertainment, meal or favor involving a government official.

Non-Morningstar Business Activities

While Morningstar affords its employees flexibility with respect to pursuing business and employment opportunities outside Morningstar, all full-time employees should understand that their work for Morningstar takes precedence over any such opportunity. The appropriateness of a Morningstar employee engaging in an outside business or employment opportunity depends on many factors, including the nature and extent of the outside activities and whether they might detract from you performing your work for Morningstar, the potential for conflicts of interests, any actual or potential relationship between the outside business and Morningstar, and the duties of the employee when engaged in the outside business or employment activities. Because it is not always easy to determine whether outside business or employment activities could be in conflict with your work for Morningstar, subject to the few exceptions described below, employees must obtain prior written approval from Morningstar’s general counsel or his or her designee before undertaking or accepting:

- ▶ Any outside business or employment activity for which you will be paid, including a second job, and any paid service to a not-for-profit organization.
- ▶ Whether or not you will be paid, any affiliation with another business as a director, officer, advisory board member, general partner, owner, consultant, holder of 5% or more of the business’ equity interests, or any similar position or role.

You are NOT required to obtain prior written approval of the general counsel or his or her designee for the following types of activities:

- ▶ An unpaid board or official position with a not-for profit entity unless that entity is a customer of or supplier to Morningstar or your service would create the appearance of a conflict of interest for Morningstar.
- ▶ An unpaid position (elected or appointed) on a municipal or town level board such as a village board, school board or library board.
- ▶ An unpaid affiliation with a trade association, professional association or other organization related to your position with Morningstar, except for any such affiliation involving lobbying activities.
- ▶ Unpaid positions with co-op boards, condominium associations and similar organizations relating to real property in which you reside.
- ▶ Unpaid positions with holding companies, trusts, or other non-operating entities established solely for purposes of your or your

family’s estate or tax planning or to hold your or your family’s real estate.

- ▶ Non-continuous and irregular paid business or employment activities that are wholly unrelated to investment research, investment management, software, data, credit ratings, or any other business in which Morningstar is then engaged. Examples would include babysitting, authoring and publishing a cookbook, leading a tour, driving occasionally for a ride sharing service such as Uber, preparing a tax return for another person or coaching a child sports team.

However, you must obtain the approval of your manager for any of the activities described above if the activity will involve a regular or substantial time commitment from you during your normal working hours.

You should recognize that the great majority of requests for approval of outside business or employment activities, such as teaching a university course, giving a lecture, or working in a business unrelated to Morningstar’s businesses, are approved. However, if you are approved to work outside Morningstar, your work for Morningstar takes precedence over any such opportunity.

You may not claim to represent Morningstar when you are working in a different capacity nor may you use Morningstar’s facilities, IT systems (e.g., networks, Morningstar email address), brand or reputation in connection with such work. In addition, if you encounter in performing non-Morningstar work any actual or apparent conflict of interest between such work and your work for Morningstar, you must disclose the situation to your manager and discuss how any attendant risks can be managed. Your business unit or country manager may impose more restrictive guidelines depending on business need.

Employees must obtain prior written approval from Morningstar’s general counsel or his or her designee before making any investment in a client, potential client, or other business entity with which Morningstar has or may have dealings, if the employee is in a position to influence Morningstar’s decision to do business with the client, potential client, or other business entity. This restriction does not apply to an investment in a publicly held company if the investment constitutes less than 5 percent of the ownership of that company.

In no circumstances may an employee have any direct or indirect ownership interest of, or management or operational involvement in, any business that competes with Morningstar for clients,

suppliers, employees, or alliances. This restriction does not apply to an investment in a publicly held company if the investment constitutes less than 5 percent of the ownership of that company.

Employees owe a duty to Morningstar to advance Morningstar's legitimate interests when the opportunity to do so arises, and absent to prior written approval from Morningstar's board of directors, are prohibited from taking for themselves personally, or for the benefit of family members or friends, opportunities that are discovered through the use of Morningstar's assets, property, information, or position or which relate to any corporate or business opportunity that falls within Morningstar's lines of business or represents a current commercial interest or expectancy of Morningstar. Employees may not use Morningstar's assets, property, information, or position for improper personal gain, including for the gain of family members or friends, and no employee or officer may compete with Morningstar directly or indirectly. Board members should exercise their business judgment to act in what they reasonably believe to be in the best interests of Morningstar and its shareholders, and to conduct themselves in accordance with their duties of care and loyalty.

Purchasing

Employees who purchase equipment, supplies, and services for Morningstar may not do so for any personal benefit or for the financial benefit of family or friends. This means that employees should always seek out reputable vendors with the most suitable products. While this may be a family member or a friend, one must be able to demonstrate that the choice made is the best available option for Morningstar. Employees must justify any deviation from this standard. Purchasing decisions are also subject to various corporate approval requirements. Please refer to the Global Approval Guidelines available on the Approval Matrices page of The Pond.

Hiring Practice

Morningstar will not give any person any preferred conditions of employment because of familial or personal relationships. All personnel decisions are, and will be, based on sound management practices and the individual merits of each applicant.

Equal Employment Opportunity

"Great People" is one of Morningstar's core values, and when it comes to our people, our differences are one of our strengths. Morningstar is strongly committed to creating and preserving equal opportunity for all employees and applicants. We make all employment decisions — including recruitment, hiring, compensation, training, promotion, transfer, discipline, termination, and other personnel matters — without regard to race, color, ancestry, religion, sex, national origin, age, disability, protected

veteran status, marital status, sexual orientation, genetic information, citizenship, gender identity and expression, parental status, or other legally protected characteristics or conduct. Morningstar's strong commitment to equal opportunity requires a commitment from every employee. Compliance with the letter and spirit of this policy is required of all employees.

Antitrust Laws

Our policy is to comply with all U.S. federal, state and local antitrust laws, as well as all applicable non-U.S. antitrust laws. Antitrust laws, also known as 'anti-monopoly', 'competition' or 'consumer protection' laws, are intended to preserve competition by prohibiting actions that could unreasonably re- strain the functioning of a free marketplace. These laws govern relationships among and between Morningstar and its competitors and clients. They, among other things, prohibit making agreements with competitors or clients to limit or restrict competition, and the sharing of information with competitors or clients that would limit or restrict competition. As a general rule, contacts with competitors should be limited in scope and should always avoid subjects such as references to specific clients or client groups or prices or other terms and conditions relating to transactions with clients.

Participating with competitors in an industry association is generally acceptable when the association has been properly established, has a legitimate purpose, and has limited its activities to that purpose. Please contact the general counsel with any questions or concerns around antitrust laws.

Insider Trading

Overview. The following rules apply to all Morningstar employees. In addition, if you are a board member, executive officer, research analyst, or investment management professional of Morningstar, substantial additional requirements relating to securities laws are applicable to you and you should consult the policy or policies specifically applicable to your position or business.

Trading based on material nonpublic inside information is strictly prohibited and applies to all persons subject to this Code and all such person's immediate family members. Insider trading rules apply to purchases and sales of Morningstar securities of any kind, as well as securities of other entities, including clients or suppliers of Morningstar, companies whose securities Morningstar covers, and entities with which Morningstar may be negotiating significant transactions.

The term "insider trading" is generally considered to include both

the use of material, nonpublic information to trade securities and the communication of material, nonpublic information to others. Accordingly, no Morningstar employee may trade a security, or direct any other person to trade a security while being aware of material, nonpublic information concerning that security or the issuer of that security, or may communicate or “tip” to any other person, other than a person under a duty of confidentiality to Morningstar with respect to such information, any such material nonpublic information. What is material nonpublic information?

- ▶ Information is material if there is a substantial likelihood that a reasonable investor would consider it important in making an investment decision.
- ▶ Positive or negative information may be material.
- ▶ Information is nonpublic if it has not been disseminated in a manner making it available to investors generally.
- ▶ As a general rule, information is not considered public until it is considered absorbed and evaluated by the investment market after completion of the second trading day after the information is released to the public.

You may be found liable for effecting securities transactions while being “aware” of “nonpublic” or “inside” information, except in the following three situations:

- ▶ You can demonstrate that before becoming aware of the inside information, you entered into a binding contract to trade that security;
- ▶ You provided instructions to another person (i.e., broker) to execute a trade before becoming aware of inside information; or
- ▶ You adopted, and had previously adhered to, a written plan specifying purchases or sales of a security prior to becoming aware of inside information.

Limits on Trades In Morningstar Securities — “Blackout”

Periods. A “blackout” period is a period during which an employee or board member may not execute transactions in Morningstar securities. There are two types of blackout periods Morningstar employs:

Quarterly Earnings Blackout Periods. Employees or board members may not buy or sell Morningstar securities during the period beginning with the close of business on the last business day of a fiscal quarter or year and ending at the open of business on the third business day after the date of the public release of the financial results for the fiscal quarter or year (for example, by means of a press release or a government filing). Morningstar’s Legal department will provide notification to employees alerting them of when a quarterly earnings release period begins and ends. However, absence of that notification does not relieve employees or board members from compliance with this section.

Event-Specific Blackout Periods. Morningstar reserves the right to impose trading blackout periods from time to time when, in the judgment of Morningstar’s general counsel, a blackout period is warranted. A blackout period may be imposed for any reason, including Morningstar’s involvement in a material transaction or other material public announcements. The existence of an event-specific blackout period may not be announced, or may be announced only to those who are aware of the transaction or event giving rise to the blackout period. If an employee or board member is made aware of the existence of an event-specific blackout period, that employee or board member should not disclose the existence of such blackout period to any other person. Individuals that are subject to event-specific blackout periods will be contacted when these periods are instituted from time to time.

Even if a blackout period is not then in effect, an employee or board member may not trade in Morningstar securities if he or she is aware of material, nonpublic information about Morningstar. For example, if Morningstar issues a quarterly earnings press release and an employee is aware of other material, nonpublic information concerning Morningstar not disclosed in the earnings press release, the employee or board member may not trade in Morningstar securities. The prohibition on trading while being aware of material, nonpublic information about Morningstar extends to sales of shares issued upon exercise of stock options or upon vesting of restricted stock units granted under a Morningstar stock incentive plan.

Other Restrictions. We consider it improper and inappropriate for our employees and board members to engage in short-term or speculative transactions in Morningstar securities or in other transactions in Morningstar securities that may lead to inadvertent violations of insider trading laws. Accordingly, employee and board member transactions in Morningstar securities are subject to the following guidance:

Short Sales. Employees and board members may not engage in short sales of Morningstar securities (sales of securities that are not then owned), including a “sale against the box” (a sale with delayed delivery).

Publicly Traded Options. Employees and board members may not engage in transactions in publicly traded options on Morningstar securities (such as puts, calls, and other derivative securities) on an exchange or in any other organized market, including over-the-counter or custom options.

Derivatives and Hedging Transactions. Employees and board members may not enter into derivative or hedging transactions intended to reduce their risk of owning Morningstar securities, while still maintaining ownership of such securities.

Standing Orders. Standing orders should be used only for a brief period of time. A standing order placed with a broker to sell or purchase stock at a specified price leaves the seller with no control over the timing of the transaction. A standing order transaction executed by the broker when an employee or board member is aware of material, nonpublic information may result in unlawful insider trading even if the standing order was placed at a time when the employee or board member did not possess material, nonpublic information.

Margin Accounts and Pledges. Securities held in a margin account or pledged as collateral for a loan may be sold by the broker if an employee or board member fails to meet a margin call or by the lender in foreclosure if the employee or board member defaults on the loan. Employees and board members may not have control over these transactions as the securities may be sold at certain times without the employee's or board member's consent. A margin or foreclosure sale that occurs when an employee or board member is aware of material, nonpublic information may, under some circumstances, result in unlawful insider trading. Because of this danger, employees and board members should exercise caution in holding Morningstar securities in a margin account or pledging Morningstar securities as collateral for a loan.

The withholding by Morningstar of shares to satisfy a tax obligation of an employee relating to the vesting or exercise of an equity award made under any of Morningstar's stock-based compensation plans is not prohibited by this policy.

Insider Trading Violations. The Legal department will investigate any allegation of insider trading involving an employee. Upon determining that a violation or possible insider trading violation has occurred, the Legal department will report its recommendation for resolution to the chief executive officer and general counsel. They will review the Legal department's findings and will discuss the matter with the employee believed to have violated the policy as appropriate.

The chief executive officer in consultation with the general counsel may impose sanctions against the employee, as he or she deems appropriate under the circumstances.

Appropriate sanctions may include without limitation:

- ▶ The immediate unwinding of the transaction.
- ▶ A forfeiture of any profit from the transaction.
- ▶ Termination of employment.
- ▶ Notification by Morningstar to the CFA Institute or other professional standards bodies for employees who are CFA charter holders or candidates in the CFA program.

- ▶ For insider trading violations, notification by Morningstar to the U.S. Securities and Exchange Commission or other relevant authority, if deemed appropriate, of the alleged violation and cooperation with the SEC or other local authority in any enforcement action and/or prosecution of the individual(s) involved.

If an employee or board member is aware of material, nonpublic information concerning Morningstar when his employment or service relationship terminates, that person may not trade in Morningstar securities until that information has been publicly released.

Health and Safety

Morningstar strives to provide a safe and healthy work environment that complies with applicable laws and regulations. Each employee has a responsibility to maintain a safe and healthy workplace for all other employees by following safety and health rules and reporting accidents, injuries, and unsafe practices or conditions. In addition, each employee must adhere to all other health and safety policies, including the prohibition of weapons on any of Morningstar's premises.

Morningstar does not permit violence or threatening behavior under any circumstances in the workplace. As an employee of Morningstar, you are expected to report to work in condition to perform your duties, and you must be free from the influence of illegal drugs and alcohol. We will not tolerate the use of illegal drugs or the misuse of alcohol or legally prescribed drugs in the workplace.

Confidential Information

As an employee or board member, you will become aware of certain information of a confidential or proprietary nature. Much of this information, such as subscriber, client, or customer lists, is not readily available to the public and took Morningstar years to develop. Some of the information may still be in the development stages and includes plans for new and innovative products or services or plans to improve some of the existing ways in which Morningstar conveys financial information or delivers other financial or investment products or services. Confidential and proprietary information may also include ideas or information developed by you during your employment with Morningstar. Morningstar expects employees and board members to act with discretion when discussing Morningstar information with third parties.

In addition, during the course of your job, you may be informed about various Morningstar developments. Keeping employees

apprised of Morningstar's financial standing, plans, clients, and product development, for example, may be necessary for you to do your job. This information is intended for internal use only, however, and should never be shared with those outside of Morningstar. Morningstar tries to be open with this kind of information, and we trust employees and board members to handle this confidence responsibly.

Because confidentiality is very important to us, particularly as a public company, we have a specific set of guidelines on this topic. You should review and must comply with the Guidelines for Disclosing Information about Morningstar, a copy of which can be found on The Pond.

This confidentiality obligation continues after the termination of your employment with Morningstar. In the event that you violate these confidentiality obligations after termination of your employment, Morningstar may take legal action against you to enforce this policy. In that event, Morningstar may seek both injunctive and monetary relief.

Employee Work Product

Employees should recognize that the work they do for Morningstar belongs to Morningstar. Morningstar retains sole and complete ownership of all concepts, ideas, methodologies, writings, software, illustrations, materials, or other information ("Work Product") conceived or produced while you are employed by Morningstar. This claim of ownership does not apply to work: (1) for which no Morningstar facilities, supplies, or information were used; and (2) that was created or produced on an employee's own time; and (3) that does not relate directly to Morningstar's business or to any Morningstar work. To protect Morningstar's interests, employees should be prepared to provide and/or sign any information or documentation reasonably requested by Morningstar.

Third Party Proprietary Information and Intellectual Property

Morningstar respects the intellectual property of third parties. Employees should not copy or use content (including data) belonging to or sourced from a third party unless Morningstar has the right to copy or use the relevant content. If you have any doubt as to whether you may use third party content you should ask your manager for guidance. Please note that the unauthorized use of third-party content may expose Morningstar to legal liability and Morningstar may take disciplinary action against any employee involved in such activity.

You may be a former employee of another company and possess proprietary information or trade secrets of that company. You must not reveal any information to Morningstar that might

reasonably be considered proprietary or a trade secret of a former employer or, in the case of a board member, of other entities to which you owe a duty of confidentiality.

Some of the software used at Morningstar was created and copyrighted by other companies and may be subject to nondisclosure restrictions. Such software is usually governed by a license agreement. It is Morningstar's policy to comply with license agreements that govern the use of software. Reproducing software without authorization may violate these agreements, and is likely to violate the U.S. Copyright Act, and the copyright laws of other countries. You shouldn't make copies, resell, or transfer software created by another company unless it is authorized under the applicable software license agreement.

You may, under a written agreement (typically a Nondisclosure Agreement completed in accordance with Morningstar's procedures) become familiar with another company's proprietary designs, processes, or techniques, or gain other information that the other company has designated as proprietary or as trade secrets under that agreement. You must take care to respect the proprietary nature of this information and not use it other than as permitted by the applicable Nondisclosure Agreement.

Personally Identifiable Information

In the course of performing your duties for Morningstar, you may come in contact with the personally identifiable information of third parties, including that of colleagues, clients and their customers ("PII"). As the name suggests, PII is information that allows someone to identify a particular individual. You have a duty to protect this PII and maintain its confidentiality by following all relevant Morningstar policies and by complying with all privacy laws applicable to it. Except as specifically authorized, you must not share PII with anyone inside or outside of the Company and then only for a legitimate business-related need. If you have any questions around your use or distribution of any PII, contact Morningstar's Legal department.

Investigations

From time to time, Morningstar or third parties designated by Morningstar may conduct investigations of various matters that arise during the course of our operations. These investigations are critical to Morningstar's efforts to comply with applicable law and our policies/procedures, including this Code of Ethics. Thus, your full cooperation is required in any such investigation. Full cooperation means that you will make yourself available as requested to be interviewed, will answer all questions posed truthfully and completely, will supply any documentary evidence requested, and more generally, will conduct yourself in a manner designed to assist Morningstar with the investigation.

Political Contributions

Morningstar supports active participation in the political process and urges you to support the candidates and issues of your choice. However, political contributions by you must be made in compliance with this Code of Ethics, all applicable legal requirements and, to the extent legal, in accordance with local custom. Any use of Morningstar's funds, assets or facilities for the benefit of any government official or employee is prohibited, unless you receive prior written approval from Morningstar's general counsel. We will not reimburse employees for sponsoring or attending fund-raising events for candidates or political organizations. Personal service on behalf of a candidate, political organization, or campaign on company time may be deemed a contribution and is prohibited.

Accounting Standards and Record-Keeping

Morningstar's books and records must accurately, completely, and properly reflect all assets, liabilities, revenues, and expenses. You should not establish undisclosed or unrecorded funds on behalf of Morningstar for any purpose. We forbid any attempt to create false or misleading records, and you may not record or establish any false or misleading entries in Morningstar's books and records for any reason.

Morningstar's business transactions worldwide must be properly authorized and completely and accurately recorded on Morningstar's books in accordance with Morningstar's established financial, accounting, and management policies. No payment or transfer of Morningstar's funds or assets may be made or approved with the intention or understanding that any part of such payment or transfer is to be used other than as specified in the supporting documents.

We encourage employees to handle all communications with discretion. Business records and communications often become public, and employees should take care to avoid exaggeration, derogatory remarks, guesswork, or improper characterizations of people, events, or companies. This guideline applies to e-mail, voicemail, Skype messages, internal memos, formal reports, and business letters. E-mail systems and information technology systems provided by Morningstar should be used only to advance the legitimate business purposes of Morningstar, although we do permit incidental personal use. Employees should always retain or destroy records according to Morningstar's record retention guidelines. In no event should records (including any e-mails) be destroyed that relate to an existing dispute or investigation, unless directed by Morningstar's Legal department. You should consult Morningstar's Legal department with any questions concerning record retention.

Public Company Disclosure

Filings submitted to the U.S. Securities and Exchange Commission

by public companies must be accurate and timely. At times, you may be called upon to provide necessary information and/or certifications to assure that Morningstar's reports and its other public communications are complete, fair, accurate, and understandable. Morningstar expects you to take this responsibility seriously and to provide prompt and accurate answers to inquiries related to Morningstar's public disclosure requirements.

Anti-Bribery

Persons subject to this Code may not pay or accept bribes of any type. A bribe is defined as a payment –whether money or otherwise – made to influence someone to act or omit to act to benefit the person paying the bribe. The U.S. Foreign Corrupt Practices Act places restrictions on bribes, the violation of which may result in both civil and criminal liability for Morningstar and the person making the bribe (and allegedly acting on Morningstar's behalf). Similar laws, such as the UK Bribery Act, also apply and may have a worldwide reach.

All offers, promises to pay, authorizations to pay or any actual payments of money, gifts, or anything else of value to any government official, political party or party official from either Morningstar or any private funds (on behalf of Morningstar) in furtherance of Morningstar's business are strictly prohibited.

You may not make payments to any government officials or employees or representatives of any political party without obtaining approval from Morningstar's general counsel.

Entertaining or Doing Business with the U.S. and Non-U.S. Governments

Giving anything of value to a government official or employee is strictly regulated and, in many cases, prohibited by law, even if it might otherwise be considered to be in the ordinary course of business. You should consult with Morningstar's Legal department before providing or paying for any meals, refreshments, travel or lodging expenses, or giving anything of value to any U.S. federal, state or local government employee, or to government employees of other countries. You should also consider that in many other countries, employees of state-owned enterprises such as banks may be considered government employees.

Integrity and Accuracy of Research and Editorial Content

At the core of all Morningstar products and services is our data and investment research (including our editorial content). That's why it is vital that we in no way compromise the accuracy or the integrity of either. Morningstar has procedures in place for collecting, entering, and presenting data. These procedures,

which are being strengthened continually, are designed to protect the integrity of our work, so they should be followed at all times.

We have an obligation to our customers to provide them with data and analyses (including editorial content) that we believe to be accurate and objective.

To help maintain the integrity of Morningstar's investment research, there is a strict functional separation between the fund and stock analyst groups (including for this purpose any employee who produces editorial content), on the one hand, and the company's sales teams, on the other. Except as described below in this paragraph, sales personnel may not contact individual analysts directly. Instead, in the United States, all requests must be funneled through the head of securities analysis, the director of fund analysis, or the director of stock analysis. Outside of the United States, all requests must be funneled through the local head of research, editorial director for the relevant publication, or the local country manager. Sales personnel hired specifically to promote access to the stock analyst group may contact individual stock analysts solely in connection with those sales efforts. Most importantly, there must never be any explicit or implied pressure applied by anyone outside the relevant analyst group to influence or change the opinions or conclusions reached in analyses (including editorial content) or research projects. Other than under programs offered by Morningstar Institutional Research Services, Morningstar's institutional clients should not be given preferential access to fund analysts, and sales personnel are prohibited from setting up meetings between fund analysts and institutional clients or potential institutional clients outside such programs. Again, maintaining objectivity and editorial freedom is essential for Morningstar to keep its position of respect in the investment community.

In general, each employee is responsible for identifying and properly handling situations in which the integrity of our work could be compromised. If you are unsure about something, ask your manager. We simply cannot be too careful about safeguarding our data and research, which are the core of our business.

No Retaliation for Good Faith Complaints

Morningstar strictly prohibits and does not tolerate retaliation against any employee for making a good faith complaint under this policy, regardless of the outcome of the investigation. If you are subjected to any conduct that you believe violates this policy, please contact your manager or, if the conduct involves your manager, contact your human resource representative. Additionally, any manager who observes retaliatory conduct must report the conduct to the human resource representative for the department/office so that an investigation may be made and, if appropriate, corrective action taken.

Your Responsibility

Please keep in mind that this Code of Ethics does not contain a comprehensive recitation of all appropriate and inappropriate behaviors. We expect you to use your best judgment and be guided by common sense. It is everyone's responsibility to assure that we are all operating within the highest ethical standards.

If you observe unethical behavior, try to gather relevant details because this may help Morningstar to address the problem. If you find yourself questioning your own actions, err on the side of caution and disclose potential or real conflicts as they occur to your manager. We all know mistakes can happen, but to protect yourself, you should disclose any mistakes in judgment so they can be rectified. By not disclosing mistakes, you leave your intentions open to question. Ask yourself if there is shared responsibility in a given situation and discuss with your colleagues, if applicable. If you find yourself being asked to do something you are uncomfortable with or you believe to be unethical, use your best judgment and share your concerns with your manager or someone you trust.

Reporting Procedure

Any employee who suspects that this policy has been or may have been violated should immediately notify the global chief compliance officer. When in doubt about the appropriateness of any conduct, please contact your manager, the chief compliance officer in your region, the global chief compliance officer or the Legal department to seek guidance before taking any action.

You are encouraged to discuss any concerns with your manager,

your human resources representative, or an officer of Morningstar. If you are not comfortable speaking to someone directly, Morningstar has established a confidential hotline called the Morningstar Ethics Hotline which you can use to express your concerns. The Morningstar Ethics Hotline is available 24 hours a day, seven days a week at <https://www.integrity-helpline.com/morn.jsp> (or at <https://www.financial-integrity.com/morneu.jsp> in Germany, France, and Spain) and the following telephone numbers:

Australia	1800 14 1924	Mexico	001 800 658 5454 then enter: 800 555 8316
Brazil	0 800 890 0288 then enter: 800 555 8316	Netherlands	0 800 022 9111 then enter: 800 555 8316
Brazil (mobile)	0 800 888 8288 then enter: 800 555 8316	New Zealand	0800 450464
Canada	800 555 8316	Norway	800 190 11 then enter: 800 555 8316
Chile	800 800 288 then enter: 800 555 8316	Singapore	800 011 1111 then enter: 800 555 8316
China	40 088 11462	South Africa	0 800 99 0123 then enter: 800 555 8316
Denmark	800 100 10	Spain	900 97 1031
France	0800 90 1703	Sweden	020 799 111 then enter: 800 555 8316
Germany	0800 187 3586	Switzerland	0 800 89 0011 then enter: 800 555 8316
Hong Kong	800 962 881	Taiwan	00 801 102 880 then enter: 800 555 8316
India	000 800 100 1075	Thailand	001 800 11 008 3246
Italy	800 788340	United Arab Emirates	8000 21 then enter: 800 555 8316
Japan	00531 11 0170	United Kingdom	0808 234 7051
Korea	00 729 11 then enter: 800 555 8316	United States	800 555 8316
Luxembourg	800 201 11 then enter: 800 555 8316		

Subject to compliance with applicable law or regulation, Morningstar reserves the right to handle situations that violate this Code of Ethics in accordance with local disciplinary procedures. Potential penalties include terminating the employment of the person who commits the violation. Because each situation is unique, disciplinary decisions will be made on a case-by-case basis.

Amendment and Waiver

This Code of Ethics may be amended or modified only by the board of directors of Morningstar. A waiver of this Code for executive officers or directors may be made only by the board of directors of Morningstar or a board committee acting on behalf of the board of directors, and will be promptly disclosed to the extent required by

law. A waiver of this Code for all other employees may be made only by Morningstar’s Legal department.

This Code of Ethics is not a contract and should not be viewed as such. This Code does not supersede or replace the terms and conditions of any agreement signed by you and Morningstar. If you believe the terms of this Code conflict with any such agreement, you should contact Morningstar’s general counsel for clarification. Morningstar reserves the right to modify, change, delete, suspend, or discontinue any part or parts of this Code of Ethics at any time without prior notice as business, employment legislation, economic conditions, or other considerations dictate.

Acknowledgement of Receipt and Review of Morningstar, Inc.’s Code of Ethics as amended and in effect on May 15, 2020.

I have received a copy of Morningstar’s Code of Ethics, as amended and in effect on May 15, 2020, which I have read in its entirety, and understand its contents. I will direct any questions that I have concerning the Code of Ethics to my human resources representative, my manager, or a Morningstar officer.

Signature

Print Name

Date