



COLLABORATION WITH COLUMBIA ON CLIMATE CHANGE AND INVESTING

In September 2019, AllianceBernstein (AB) announced an initiative in cooperation with Columbia University's Earth Institute focused on integrating climate risks and opportunities into the investment process through training, research and collaboration.

BACKGROUND

For many years, AB has recognized the potential far-reaching impacts of climate change on financial and economic outcomes. In fact, environmental, social and governance (ESG) considerations are integrated into our research and investment processes. We actively engage with company management teams on these issues, and our voting activities reflect our perspectives.

But we're also aware of the growing social, economic and regulatory momentum to address complex climate-change issues proactively within financial markets. That need was the driving force behind a dialogue AB initiated in 2017 with leading scientists at the Earth Institute. Those conversations culminated in the February 2019 launch of a pilot climate-risk training program for a select group of AB investment professionals from across asset classes. The resounding success of—and interest in—this module, and the related opportunities for research and collaboration, ultimately led to the creation of this novel initiative between AB and the Earth Institute.

PURPOSE

Our joint effort highlights a new intersection between the latest research and scientific discovery on climate change and a deep, fundamental understanding of financial markets and investing. This work will help our investment teams better assess climate-change risks and opportunities as they analyze investments. It will also enhance our engagements with company management teams and ultimately enable us to deliver better results for our clients.

We're also very excited about the professional-development opportunities for our people—our most valuable resource at AB and a vital part of our firm's success. The collaboration with Columbia University fully aligns with our culture of research and diverse perspectives. It's another facet of our ongoing commitment to investing in our employees and positioning them for continued growth and success in a period of rapid evolution—both in capital markets and the investment industry.

CURRICULUM

The first step is to work together with the Earth Institute to develop and implement the "Climate Science and Portfolio Risk" curriculum. This first-of-its-kind program is designed to help AB portfolio managers, analysts and other investment professionals better discern and analyze climate-change risks and integrate them into their investment decisions.

Training is under way at the Earth Institute's Lamont-Doherty Earth Observatory in Palisades, New York, and will span several sessions. Attendees will include our investment, risk and responsible-investment colleagues from across asset classes. The curriculum will be very interactive, and include lectures, panels and roundtables showcasing the latest scientific research and developments. Learning will be encouraged through open dialogue and case studies.

The curriculum will provide a foundational understanding of the science behind our changing climate. It will offer an in-depth view on climate-change issues such as rising sea levels, extreme weather and natural hazards. Participants will learn about potential opportunities in mitigation, adaptation and resiliency measures that could potentially reduce the impact of climate change, as well as technology-based solutions. The curriculum will also cover related data sources that investment professionals can use to augment AB's research process.

Learning objectives for participants include:

- + Summarizing the major scientific results for climate change and describing the most significant elements of identifying, assessing and managing climate and environmental risks
- + Articulating potential climate impacts on economic activity in select sectors and asset classes
- + Understanding how to assess companies' efforts at mitigation, adaptation and resilience—and understanding the adequacy of various performance indicators
- + Enhancing engagement with corporate management teams through a sector-specific evaluation of climate risks and opportunities

ABOUT THE EARTH INSTITUTE AND LAMONT-DOHERTY OBSERVATORY

The [Earth Institute](#) at Columbia University encompasses leading environmental and social scientists, lawyers, and engineers as well as management, health and policy experts spread across dozens of research programs and centers, including the [Lamont-Doherty Earth Observatory](#). While the Earth Institute focuses on advancing a basic knowledge of earth science and applying that knowledge to the decisions made by governments and businesses, the Lamont-Doherty Earth Observatory seeks a fundamental understanding of the origin, evolution and future of the natural world. Its scientists study the planet from its deepest interior to the outer reaches of its atmosphere, on every continent and in every ocean, to provide a rational basis for the difficult decisions facing humanity.

ABOUT ALLIANCEBERNSTEIN

AllianceBernstein is a leading global investment management firm that offers high-quality research and diversified investment services to institutional investors, individuals and private wealth clients in major world markets.

As of June 30, 2019, including both the general partnership and limited partnership interests in AllianceBernstein, AllianceBernstein Holding owned approximately 35.6% of AllianceBernstein and AXA Equitable Holdings ("EQH"), directly and through various subsidiaries, owned an approximate 65.2% economic interest in AllianceBernstein.

Additional information about AllianceBernstein may be found on our website, <http://www.alliancebernstein.com>.