



# CalPERS' Sustainable Investments 2030 Strategy

November Board Meeting

## CalPERS' Investments Mission Statement

Manage the CalPERS investment portfolio in an efficient and sustainable manner to generate risk adjusted returns to pay benefits now and into the future

## A Synopsis...

The 2030 Sustainable Investment Strategy contributes to building a **higher performing** and **more resilient portfolio** by:

- Implementing a thoughtful plan to put CalPERS on a pathway to Net Zero by 2050, investing over \$100 billion towards climate solutions by 2030 (which is consistent with more than a 50% reduction in portfolio emissions intensity by 2030), and accelerating the transition to a low-carbon economy through more selective investments in high emitting sectors.
- Developing a process, subject to fiduciary duty and investment analysis, to exit certain securities, for companies without credible net zero plans.
- Building on our global leadership in stewardship and advocacy and promoting inclusion in the broader economy and advocating for fair and equitable financial markets.

## SI 2030 Strategy | Objectives

- 1 Generate **outperformance** by investing in climate solutions and emerging and diverse managers
- 2 Increase **portfolio resilience** by fully integrating ESG analysis, including climate risk analysis
- 3 Implement a **thoughtful path to Net Zero** through investments, engagement and advocacy
- 4 Promote greater **inclusion and representation** in the financial industry and the global economy
- 5 Build and promote **efficient and equitable** financial markets through advocacy and regulatory action

# 1 Generate Outperformance

Generate **outperformance** by investing in the transition to a low-carbon economy, including climate solutions, and by investing in opportunities through our Emerging and Diverse Manager Program

## Our Sustainable Investments strategy includes:

- Climate-related 2030 investment targets for the Total Fund
- Developing asset class Sustainable Investment plans that will identify thematic and managers
- Investment allocation to a sustainable investment strategy that will be jointly implemented by the SI team and the asset class
- Building on our commitment to Emerging and Diverse Managers

# 1 Generate Outperformance | Climate Solutions Thesis

	Mitigation	Adaptation	Transition (“Brown to Green”)
<b>What?</b>	<ul style="list-style-type: none"> <li>Reduce or enable the reduction of greenhouse gases (GHG) emissions at scale</li> </ul>	<ul style="list-style-type: none"> <li>Reduce harm or seek opportunities from climatic change effects</li> </ul>	<ul style="list-style-type: none"> <li>Operate in hard-to-abate sectors<sup>(1)</sup> with a credible decarbonization plan<sup>(2)</sup></li> </ul>
<b>Why?</b>	<ul style="list-style-type: none"> <li>Transition to a low-carbon economy drives unprecedented growth in mitigation solutions</li> <li>Markets undervalue potential sharp carbon price rise</li> <li>Valuation challenges arise from technological and regulatory uncertainty, poor data and lack of historical precedents</li> </ul>	<ul style="list-style-type: none"> <li>Market undervalues climate impact on businesses because of:                             <ul style="list-style-type: none"> <li>Over-reliance on past trends</li> <li>Denial of climate change's long-term effect</li> <li>Limited information on sites and supply chains makes modeling hard</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Discounts on high-emitting sectors from widespread portfolio decarbonization</li> <li>Transition leaders to command scarcity and diversification premium</li> </ul>
<b>Why Now ?</b>	<ul style="list-style-type: none"> <li>Government policies, like Inflation Reduction Act (IRA), positively impact the economics of mitigation solutions and create new opportunities</li> </ul>	<ul style="list-style-type: none"> <li>Increased global awareness about frequency and severity of climate change-related hazards</li> <li>Increased occurrence of negative physical risk events</li> </ul>	<ul style="list-style-type: none"> <li>Huge investment need for ‘transition’</li> <li>Realization of limited effect of divestment on decarbonization of brown assets</li> </ul>



(1) Sectors hard to decarbonize with current tech include heavy industry (cement, steel, chemicals), heavy transport (trucks, ships, planes), and fossil-fuel power.  
 (2) SBTi (Science Based Transition Initiative) and TPI (Transition Pathway Initiative) are recognized frameworks for evaluating decarbonization strategies.

# 1 Generate Outperformance | Climate Solutions Examples

Solution Type	Activity	Possible Climate Solution
<b>Mitigation</b>	Renewable energy	Implementing solar, wind, hydro, and other renewable sources to replace fossil fuels
	Carbon capture & storage (CCS)	Technologies that capture and store CO <sub>2</sub> emissions, preventing them from entering the atmosphere
	Waste management	Reducing, recycling, and reusing, as well as capturing methane from landfills
<b>Adaptation</b>	Water management	Implementing systems to manage droughts, floods, and to ensure water supply
	Agricultural adaptation	Techniques allowing agriculture to continue in changing climate conditions, like drought-resistant crops
	Disaster risk reduction	Developing early warning systems and community preparedness for extreme events
<b>Transition</b>	Cement Production	Incorporating alternative cementitious materials like fly ash or slag in cement production, improving energy efficiency in cement kilns, and exploring carbon capture technologies for cement plants
	Aviation	Developing and scaling up sustainable aviation fuels (SAFs) made from renewable sources, and exploring the potential of electric or hydrogen-powered aircraft for shorter routes
	Fossil Fuel-Based Power Generation	Transitioning to renewable energy sources like wind, solar, and hydroelectric power, retrofitting existing fossil fuel power plants with CCS technology, and exploring advanced nuclear power

## 2 Increase Portfolio Resilience

Increase **portfolio resilience** by accelerating the integration of Environmental, Social & Governance (ESG) analysis, including climate risk analysis, into the investment diligence process and portfolio management

### Our SI strategy includes:

- Future incorporation of climate scenarios into our capital market assumptions and asset liability management process
- Performing climate risk assessments on individual investments and overall portfolio (both physical and transition climate risk)
- Establishing an ESG integration team within the Sustainable Investments Program to implement a more systematic and comprehensive ESG analysis across all investments
- Increasing INVO's knowledge of sustainability topics across Total Fund
- Rolling out a system for periodic ESG attestations and reporting from asset managers

## 3

# Pathway to Net Zero

**Generate outperformance and have a meaningful impact on the trajectory of global emissions** by (i) putting our **own portfolio on a pathway to Net Zero** by 2050 through investments in climate solutions; (ii) take **shareowner action** to improve the largest emitting companies' net zero strategies; and (iii) **engaging** the investment industry and **government regulators** to support the transition of the broader economy to net zero

## CalPERS' Net Zero Plan:

- 1. Increase investments in climate solutions** with a 2030 investment target of \$100B\*, which is consistent with more than a **50% reduction in portfolio emissions** intensity by that time
- 2. Engage our portfolio companies** on their net zero plans. **Advocate for policy and regulation** that promote decarbonization and expands our investment opportunities
- 3. Develop a process, subject to fiduciary duty and investment analysis, to exit certain securities**, for companies without credible net zero plans
- 4. Integrate climate risks and opportunity assessment into investment decisions** to accelerate emissions reduction and value creation
- 5. Enhance measurements and reporting** of portfolio emissions

# 3 Pathway to Net Zero

## Moving beyond engagement

**We will develop a process, subject to fiduciary duty and investment analysis, to exit certain securities,** for companies without credible net zero plans. The process will include:

**Assessing the net zero plans of high emitting companies**

**Conducting fiduciary and investment analysis on companies to assess their financial risk as the world transitions to a low-carbon economy**

**Taking action, consistent with fiduciary duties, to exit certain securities where there is not a financial rationale to have continued exposure**

## 3 Pathway to Net Zero

### **Mercer (investment consultant) has assessed CalPERS' Net Zero Plan and considered it well-aligned to achieve CalPERS' objectives**

Mercer evaluated CalPERS' Net Zero Plan and benchmarked it to twelve of CalPERS' peers. When comparing strategies, Mercer found:

#### **CalPERS' Climate Solutions strategy is broadly aligned with industry best practices**

CalPERS' categorization of climate solutions is aligned with leading practices. Most peers follow a similar approach of investing in climate mitigation solutions and hard-to-abate sectors.

#### **There are multiple pathways to achieve Net Zero**

Some peers prioritize portfolio reduction interim targets while others focus more on investing in climate solutions that enable the low-carbon transition and broader decarbonization by 2050.

#### **Climate Solutions taxonomies can differ across peers**

Many peers have developed their own taxonomies; peers' publicly disclosed operating criteria tend to be less rigorous and/or comprehensive than CalPERS' proposed framework.

# 3 Pathway to Net Zero

## Our comprehensive Net Zero Plan is focused on:

Engaging and  
Influencing

We will lean into working with our portfolio companies and regulators to transition. CalPERS will use our influence to be a leader and a catalyst of change, not an organization that walks away.

Maintaining selective  
investments in fossil  
fuels

Fossil fuels are an important source of portfolio diversification that will remain an important near-term component of the global economy and contribute to energy security.\*

Financing the low-  
carbon transition

Estimated \$3T in annual global capex needed to reach net zero is likely to generate investment opportunities to finance the low-carbon transition.

Achieving net  
zero by 2050

Our plan will provide actual decarbonization for both the economy and our portfolio, and not shift the responsibility to others via divestment.



\*IEA's Oil 2023 medium-term market [report](#) forecasts that based on current government policies and market trends, global oil demand will rise by 6% between 2022 and 2028 to reach 105.7 million barrels per day (mb/d) – supported by robust demand from the petrochemical and aviation sectors. Despite this cumulative increase, annual demand growth is expected to slow from 2.4 mb/d this year to just 0.4 mb/d in 2028, putting a peak in demand in sight. In particular, the use of oil for transport fuels is set to go into decline after 2026 as the expansion of electric vehicles, the growth of biofuels and improving fuel economy reduce consumption. [EPA](#) states that in 2022, motor gasoline represented about 43% of total U.S. petroleum consumption. The U.S. Energy Information Administration projects U.S. total consumption of petroleum and other liquids in 2050 to be nearly equal to the projection for 2023. Transportation sector liquid fuels consumption is projected to be about 10% lower in 2050 than in 2023.

## 4 Diversity, Equity & Inclusion

Promote greater **inclusion and representation** in the financial industry and the global economy by promoting Diversity, Equity and Inclusion (DEI) through advocacy and shareowner action

### Our SI strategy includes:

- The use of engagement and our shareowner rights to influence corporations to take action
- DEI Survey of External Managers to better understand the DEI characteristics of our portfolio, as well as measure the progress of our external managers over time
- Annual AB 890 Report to the Legislature tracking CalPERS' investments with emerging and diverse managers (anticipated to reach \$10 billion by 2030) <sup>(1)</sup>
- The use of advocacy to promote regulatory requirements for DEI disclosure

# 4 Diversity, Equity & Inclusion

## CalPERS 2023 DEI Survey

- Conducted by Lenox Park and distributed across 218 asset managers
  - 160 managers (73%) responded
  - 131 managers (60%) provided highly detailed demographic and policy information
    - Across 131 managers that responded, the total workforce was 49,359
      - 35.7% are women and 26.4% are people of color
- CalPERS' portfolio performs above the median in terms of representation of women and people of color across ownership, leadership, and workforce
- Of the respondents, nearly 1/3 of privately held managers (32.4%) were diverse based on CalPERS' definition of "substantial ownership" at 25%

5

# Improve Financial Markets | Regulatory and Human Capital

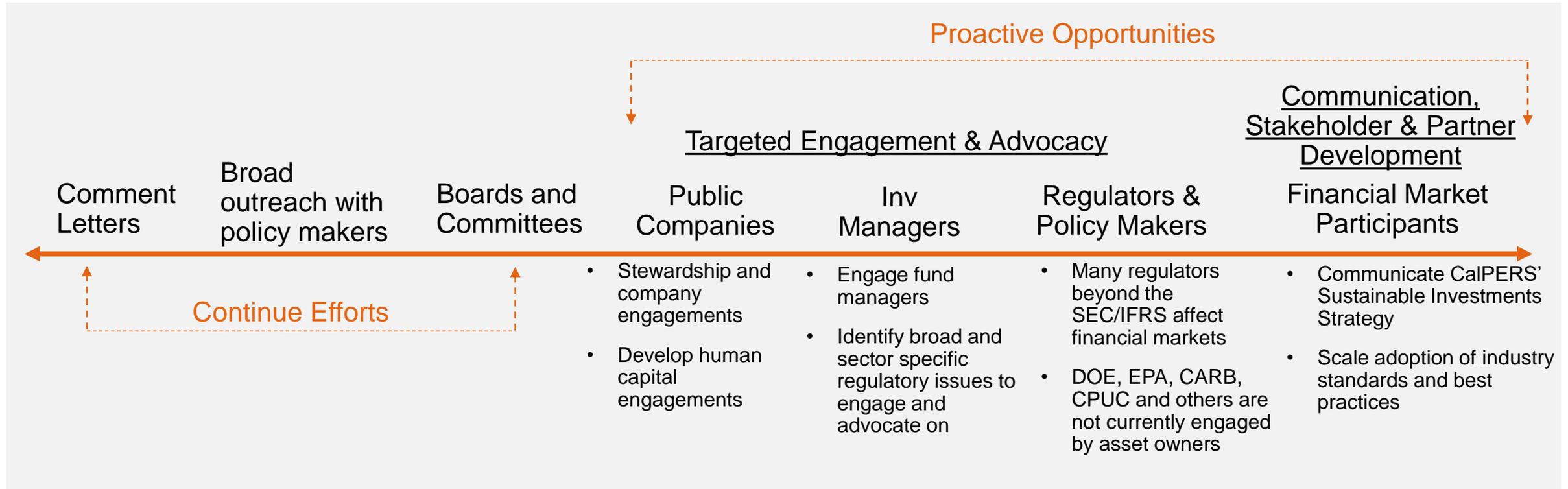
Build and promote **efficient and equitable** financial markets through advocacy and regulatory action, including the promotion of responsible business practices for workers

## Our SI strategy includes:

- Enhancing our financial market focus areas by increasing our advocacy efforts with climate and human capital related regulators
- A focus on evolving human capital trends including:
  - Labor constraints
  - Demographics
  - Education and training from companies
  - Automation
  - Just Transition

# 5 Improve Financial Markets | Regulatory and Human Capital

## Financial Markets Levers to Utilize



5

# Improve Financial Markets | Human Capital

## Human Capital Risk and Opportunity Focus Areas

### Mandatory Corporate Reporting

Promote the development and adoption of disclosure standards so investors can assess a company's human capital management strategy, practices, metrics, and oversight including its approach to material human capital issues.

- Regulatory Engagements
- Engagements with Standard-setters
- CalPERS' Federal Priorities

### Workforce Valuation & Performance Management

Integrate human capital management data and financial performance to support investment decision-making.

- Due Diligence Questionnaire
- Research Application

### Risk Mitigation & Best Practices

Engage companies and managers on human capital management best practices and mitigating risks of material human capital issues to the portfolio.

- CalPERS' Labor Principles
- Human capital management strategy, practices, and oversight
- Side letters
- Monitoring and reporting

5

# Improve Financial Markets | Stewardship

Use proxy voting, company engagement, and shareowner campaigns to hold companies accountable, drive positive changes, mitigate risks, and enhance long-term financial performance for companies in the public equity portfolio

## Stewardship Focus Areas

### Climate

Increase the commitment of companies to pursue a path to net zero GHG emissions and to disclose on their emissions, climate risks, strategy and oversight.

- Climate board oversight
- Company GHG emissions
- Climate Action 100+
- Climate Solutions

### Diversity

Engage companies to improve company diversity by promoting inclusive practices that leverage the diverse perspectives, talents, and contributions of a diverse workforce. This can lead to enhanced innovation, decision-making, customer satisfaction, and financial performance.

- Board Diversity
- California Board Diversity Initiative

### Governance

Engage companies to adopt governance best practices and to adequately align pay with performance.

- Executive Compensation
- Board Composition
- Board Oversight
- Shareowner Rights

5

# Improve Financial Markets |

# Communication, Stakeholder & Partner Development

CalPERS is responsible for preparing reports and conducting several annual assessments

## Sustainable Investments Related Reports

- SB 964 / Task Force on Climate-related Financial Risk Disclosure Report
- AB 890 Emerging and Diverse Manager Report
- Responsible Contractor Report
- CalPERS for California Report

## Committees

- Climate Action 100+ Steering Committee
- Human Capital Management Coalition Co-chair
- ESG Data Convergence Initiative
- United Nations Asset Owner Alliance
- Healthy Markets

## Sustainable Investments Assessment

- UN Net Zero Asset Owner Alliance assessment
- PRI annual total fund sustainability survey
- External fund manager DEI survey
- Labor Principles update

## Additional Activities

- Financial, Reg and Leg Headlines Update
- Stakeholder engagement
- Research initiatives
- SI communications
- ILPA and Real Assets ESG working groups
- Energy Optimization Initiative for Real Estate
- Emerging/Diverse Manager association participation

# Targets and KPIs

To be reported on in annual progress update

New KPI

Updated KPI

Objective	KPI	Target
<b>Generate Out-performance</b>	<ul style="list-style-type: none"> <li>Sustainable Investments performance relative to asset class benchmarks</li> </ul>	<ul style="list-style-type: none"> <li>Outperformance in each asset class</li> </ul>
<b>Increase Portfolio Resilience</b>	<ul style="list-style-type: none"> <li>Periodic Total Fund climate risk reporting</li> </ul>	<ul style="list-style-type: none"> <li>At least annually</li> </ul>
	<ul style="list-style-type: none"> <li>Proportion of investments with ESG analysis integrated in diligence process</li> </ul>	<ul style="list-style-type: none"> <li>100% of new investments</li> </ul>
<b>Pathway to Net Zero by 2050</b>	<ul style="list-style-type: none"> <li>Investments in Climate Solutions</li> </ul>	<ul style="list-style-type: none"> <li>\$100B by 2030 <sup>(1)</sup></li> </ul>
	<ul style="list-style-type: none"> <li>Monitor and report carbon footprint and emissions intensity by asset class</li> </ul>	<ul style="list-style-type: none"> <li>At least annually (subject to data availability)</li> </ul>
<b>Promote Diversity, Equity &amp; Inclusion</b>	<ul style="list-style-type: none"> <li>Cumulative investments with diverse and/or emerging managers</li> </ul>	<ul style="list-style-type: none"> <li>Provide yearly update</li> </ul>
	<ul style="list-style-type: none"> <li>Completion of DEI external manager survey</li> </ul>	<ul style="list-style-type: none"> <li>Provide yearly update</li> </ul>
	<ul style="list-style-type: none"> <li>Percentage of diverse public corporate board directors</li> </ul>	<ul style="list-style-type: none"> <li>Provide yearly update</li> </ul>
<b>Improve Financial Markets Efficiency</b>	<ul style="list-style-type: none"> <li>Compliance with Responsible Contractor Program (RCP) Policy</li> </ul>	<ul style="list-style-type: none"> <li>100% compliance for annual report</li> </ul>
	<ul style="list-style-type: none"> <li>Percentage of Global Public Equity engaged annually</li> </ul>	<ul style="list-style-type: none"> <li>Engage 50% of Global Public Equity portfolio AUM</li> </ul>
	<ul style="list-style-type: none"> <li>Proxy voting and corporate engagements update</li> </ul>	<ul style="list-style-type: none"> <li>Provide yearly update</li> </ul>



(1) Target is consistent with more than a 50% reduction in portfolio emissions intensity by 2030

## Next Steps

### November 2023

- Present CalPERS' Sustainable Investments 2030 Strategy at November Board meeting
- Begin implementation of the 2030 Strategy

### March 2024 and going forward

- Responsible Contractor Program Policy Review

### November 2024 and going forward

- Provide annual progress report on CalPERS' Sustainable Investments 2030 Strategy

## SI 2030 Strategy Summary

- 1 Generate **outperformance** by investing in climate solutions and emerging and diverse managers
- 2 Increase **portfolio resilience** by fully integrating ESG analysis, including climate risk analysis
- 3 Implement a **thoughtful path to Net Zero** through investments, engagement and advocacy
- 4 Promote greater **inclusion and representation** in the financial industry and the global economy
- 5 Build and promote **efficient and equitable** financial markets through advocacy and regulatory action

# Appendix

## Climate Solutions | CalPERS' Taxonomy

- For CalPERS, climate solutions fall under **three categories**:
  1. **MITIGATION**: Aim to directly reduce or **enable the reduction of GHG emissions at scale**
  2. **ADAPTATION**: Aim to **reduce harm** or **exploit opportunities** associated with adjustments in natural or human systems resulting from actual or expected **climatic effects**
  3. **TRANSITION**: (“Brown-to-Green”): Operate in **hard-to-abate sectors**<sup>(1)</sup> with a **credible decarbonization plan**<sup>(2)</sup>, consistent with the latest state of climate science and technological capabilities

(1) Sectors hard to decarbonize with current tech include heavy industry (cement, steel, chemicals), heavy transport (trucks, ships, planes), and fossil-fuel power.

(2) SBTI (Science Based Transition Initiative) and TPI (Transition Pathway Initiative) are recognized frameworks for evaluating decarbonization strategies.

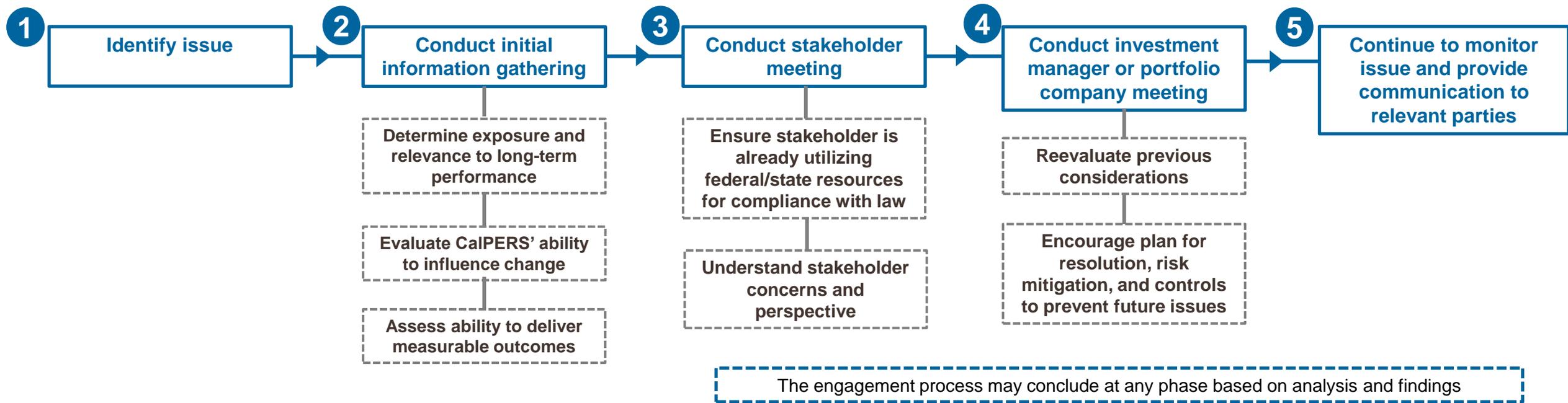
# CalPERS' Labor Principles

- **Freedom of association and the effective recognition of the right to collective bargaining**
  - Seek to support and improve the well-being of employees as part of human capital management strategy and in compliance with applicable laws
- **The elimination of all forms of forced or compulsory labor**
  - Respect the human rights of those affected by their investment activities and seek to confirm that their investments do not flow to companies that utilize forced labor
- **The effective abolition of child labor**
  - Respect the human rights of those affected by their investment activities and seek to confirm that their investments do not flow to companies that utilize child labor
- **The elimination of discrimination in respect of employment and occupation**
  - Respect the human rights of those affected by their investment activities and seek to confirm that their investments do not flow to companies that maintain discriminatory policies. Seek to improve diversity, equity, and inclusion in portfolio investments to address recruitment, retention, and compensation
- **A safe and healthy working environment**
  - Seek to support and improve the well-being of employees as part of human capital management strategy that includes providing a safe, harassment-free and healthy workplace

# Stakeholder Engagement Process

**We promote collaboration, support, and transparency through our stakeholder engagement and investor relations initiatives**

In doing so, we strive to identify and mitigate risks to our portfolio companies that can negatively affect CalPERS' investment returns, reputation, and trust.



# Linking CalPERS' Sustainable Investments 2030 Strategy to CalPERS' Investment Beliefs

The CalPERS' Sustainable Investments 2030 Strategy is guided by the following Investment Beliefs

	Investment Belief 2	Investment Belief 4	Investment Belief 6	Investment Belief 9
	Long Horizon Advantage/Responsibility	Value creation Forms of capital	Strategic Allocation	Risk Multi-Faceted
Generate Outperformance	●	●	●	
Increase Portfolio Resilience	●		●	●
Thoughtful Path to Net Zero	●	●	●	●
Promote Diversity, Equity & Inclusion	●	●		●
Improve Financial Markets Efficiency	●			●

- **IB2:** A long time investment horizon is a responsibility and an advantage
- **IB4:** Long-term value creation requires effective management of three forms of capital: financial, physical, and human
- **IB6:** Strategic asset allocation is the dominant determinant of portfolio risk and return
- **IB9:** Risk to CalPERS is multi-faceted and not fully captured through measures such as volatility or tracking error

