PerspECCtive

Leading in the Energy Trilemma

A balancing act to net zero





Key Takeaways

- The solution to the Energy Trilemma is an energy mix there isn't a silver bullet
- Experience and experimentation are critical to successfully developing energy assets especially as technology continues to evolve and new ones emerge
- Stay in the know new and/or updated legislative, policy, supply chain, and other factors are happening at a rapid pace
- Leadership starts by starting we have to be willing to innovate ... and be wrong
- Be open minded to new ways and tools to plan and execute partnering, generative ai, etc.



Danny Splettstosser

Vice President of EPC Strategy AES Clean Energy

What is the Energy Trilemma?

Danny Splettstosser







Recognized for our commitment to sustainability





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9,100 people



25M people served









The energy transition must be led by the electric sector to achieve net zero by 2050



Source: IEA 2022 WEO



Energy Transition, A Massive Opportunity in Power Sector



Total Electricity (kTWh)



AES' Business Units are set meet the opportunity of the energy transition





Accelerating responsible and just energy transitions







Garrett Fultz

Global Construction, Projects, and Assets Lead FTI Consulting

How can we lead in the transition? Garrett Fultz



Setting the Tone for the Challenge Ahead

"A good plan is one that meticulously applies experimentation or experience. A great plan is one that rigorously applies both."

- Bent Flyvbjerg, How Big Things Get Done (2023)



Solving the Challenges of the Energy Trilemma Will Take Everything We've Got



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There is not one solution to the Energy Trilemma



Generation Mix

Source: World Energy Council; BP Statistical Review of World Energy

Note: Top 10 & Bottom 10 refers to combined energy trilemma scores from the World Energy Council

There remains a significant need for an energy mix to deliver on the global energy demand and manage the tradeoffs within the energy trilemma

Key Battlegrounds for Success



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Dow and X-Energy advance efforts to deploy first advanced small modular nuclear reactor at industrial site under DOE's Advanced Reactor Demonstration Program

Dow and X-energy sign joint development agreement to develop a four-unit Xe-100 facility at one of Dow's US Gulf Coast sites

United States Department of Energy makes Dow a subawardee under Xenergy's Advanced Reactor Demonstration Program Cooperative Agreement

Dow and X-energy to develop and license technology applicable to other industrial customers

Alice Bullington

Principle Technical Expert, Risk Management **Shell**

Observations: How can we achieve the balance? Alice Bullington

A balancing act to achieve net zero

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Fireside Chat

