

Submission Summary

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Paper Title

Energy transition is no longer the same idea it used to be

Abstract

Since the beginning of the Industrial Revolution, almost two centuries ago, the economic growth and human prosperity indices have been directly linked to global energy security.

The energy scenario has since been dominated by fossil fuel, currently representing more than 80 percent of the global energy mix, with oil and gas reaching almost 55 percent.

The global energy demand has also been rising proportionately to micro and macroeconomic growth and human prosperity. With it, methane and carbon dioxide emissions have been rising, inducing a global environmental challenge.

Reacting to this global challenge induced by several industries, only the oil and gas industry started scaling up its efforts in developing, deploying and promoting advanced technologies to address these environmental impacts. The initiatives included promoting cleaner and more efficient oil and gas uses, complemented by renewables toward long-term, net-zero carbon dioxide and methane emissions targets.

Unfortunately, the success of these efforts was limited. It was negatively influenced by “enviro-politics,” unfairly calling for unrealistic energy transition strategies around the gradual elimination of fossil fuel. Politicians did not offer any capable alternatives and called to stop investing in oil and gas upstream projects, leading to a potential global unprecedented energy security threat.

Through this unrealistic strategy, the world is indeed shooting its foot, putting the 20th and 21st century’s energy security, economic growth and human prosperity at high risk. The current global energy crisis in Europe and the moderate energy poverty and human prosperity indices in Africa and some Asian countries are good evidence of this fact.

The world failed to realize that energy security always takes priority, as seen today in several European countries raising coal share in their energy mix despite its environmental challenge. All must notice that humankind cannot and will not let go of energy security and economic prosperity regardless of the reason.

Hence, It is highly recommend to use a positive term such as energy enhancement or energy advancement instead of a negative expression such as energy transition.

This proposed term energy advancement or energy enhancement must be built on including all energy sources with solid environmental accountability. It must be strategized around helping the world to become more economically prospered, socially and sustainably developed and environmentally protected.

The focus must be more on putting solid plans to meeting the net-zero carbon dioxide and methane emissions global targets and supporting all United Nations 17 Sustainable Development Goals. This shift in attitude is what is called “global sustainable energy security”.

The long-term energy mix will be led by cleaner and more efficient oil and gas supported by critical large-scale emissions reduction technologies and complemented by several energy sources, including renewables and hydrogen.

The need to sustain global economic growth and human prosperity through secured cleaner energy sources is a must. But also protecting the planet earth is becoming a global moral responsibility that all greenhouse gases emitters must bear, with no exception. Yet, the oil and gas industry is the only one getting blamed. Petroleum Professional Societies including SPE is working hard to change the perception with solid comprehensive strategies based on this new Energy Advancement and/or Energy Transition redefinition.

Dr Sami Alnuaim, 2019 SPE President

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