

COP28: Why we need to break our addiction to combustion

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Headlines across the world this year focused on fires, including both <u>wildfires</u> and <u>the use of military firepower</u>, in various places.



<u>Combustion</u> is the key to both.

Considering, and rethinking, the role of <u>fuel</u> in our lives helps put in perspective <u>the wars</u> and <u>climate disasters</u> caused by fuel. At the same time, such an exercise also reveals the role of fuel in both creating and mediating global insecurity. Simply put, while it may still be a necessity, fuel is no longer the solution to insecurity that it may have once been.

As <u>COP28 gets underway today in Dubai</u>, world leaders need to focus attention on fuel and the central role it plays in both the <u>climate crisis</u> and human insecurity. Only by doing so can we hope to address the failures of the past few years to grapple with the urgency of <u>climate</u> <u>change</u> action.

Depending on fuel

Much of the discussion about <u>climate</u> security focuses on questions of <u>whether climate change will cause conflict</u>. But looking at the larger links between climate and the disruptions it causes throughout society are a <u>much more useful way of thinking about climate insecurity</u>.

Floods, <u>storm damage</u>, wildfires and droughts all so disruptive that if current trends persist they may make it impossible for some societies to transition towards a sustainable economy.

Countries may disintegrate and induce conflict that makes coping with climate change even harder, a theme <u>that will be on the agenda</u> for the first time in the history of COP at this year's conference.

As a professor working on security and climate, and the author of a <u>new</u> <u>book synthesizing these issues</u>, it is clear to me that it is time to rethink energy, climate, security and, crucially, fuel.



Fueling insecurity

While Gaza City <u>was devastated by Israeli bombs</u> in October, nearly simultaneously <u>Acapulco was destroyed by hurricane Otis</u>. In both cases, the disruption or destruction of urban infrastructure endangered local populations.

Electricity and internet blackouts because of the disruption of fuel supplies to run generators are a common occurrence across the world, with <u>South Africa</u> and <u>the hospitals in Gaza being a case-in-point</u>. Across the border from Gaza, Egyptians feared <u>blackouts because of natural gas supply disruptions</u> indirectly caused by the war next door.

The danger of wildfires will only grow as <u>climate change dries out</u> <u>ecosystems</u>, <u>effectively turning vegetation into potential fuel</u>. This same combustion within engines and furnaces, meanwhile, <u>is also the source</u> <u>of a sizeable percentage of climate changing gases in the atmosphere</u>. Both involve burning fuel.

But the absence of fuel in South African power stations, hospitals in Gaza or for heating Canadian homes in winter also makes people in these places insecure.

Too much fuel in drying forests is aggravating wildfires. Too little fuel in generators presents numerous hazards when electricity isn't available. Both increasingly require a security response to keep people safe and shore up social arrangements stressed by the disruptions. Security in these circumstances is about maintaining minimal public order so that evacuations can be arranged and relief supplies can be distributed.

Breaking up with fuel



Societies need energy, but if climate insecurities are to be reduced, we need to get it without burning fuel. This will help with reducing greenhouse gas emissions and slowing down climate change and all the disruptions that it is causing. But it will also improve peoples' safety in other ways, too.

Fears of cold winters in Europe without Russian gas, electricity blackouts in Egypt, failing hospitals in Gaza and much else are due to their dependence on fuel. Failure to get diesel, natural gas and petroleum to where it is needed is, in part, because of long supply lines that are easily disrupted by political and economic actions.

In addition to cutting off fuel in Gaza, <u>Israeli attacks destroyed the solar</u> <u>panels at al-Shifa hospital</u>, which, of course, didn't need fuel to keep at least key operating theater and water filtration functions going despite the chaos around them.

Renewable sources of energy, <u>wind power</u>, solar panels, hydro and so on don't use fuel and are less susceptible to supply disruptions. While there are <u>concerns about the international supplies of key components</u> of renewable energy systems, once <u>solar panels</u> are installed in your neighborhood, you don't care if a war in the Middle East causes supply issues; your power supply comes from close by, not the other side of the world.

It's time to break up with fuel—and global energy supply chains more fundamentally—and aim to live more safely with renewable electricity produced closer to home. This may be a tall order at this year's COP in Dubai, which is <u>run by the CEO of an oil company whose track record on climate is dubious</u>.

But there is no time to lose in confronting our dependence on <u>fossil fuels</u>, both at the COP and everywhere decisions about energy use are being



made.

Despite the dominance of fossil fuel interests in Dubai, COP delegates must demand measures to rapidly reduce the world's dependence on fossil fuels. Promoting new initiatives <u>like a fossil fuel non-proliferation</u> <u>treaty</u> to prevent further fossil fuel developments would be a good start.

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