

پایش بازار

OIL AND NATURAL GAS PRICES (as of 13:00 PM CT 10/02/20)

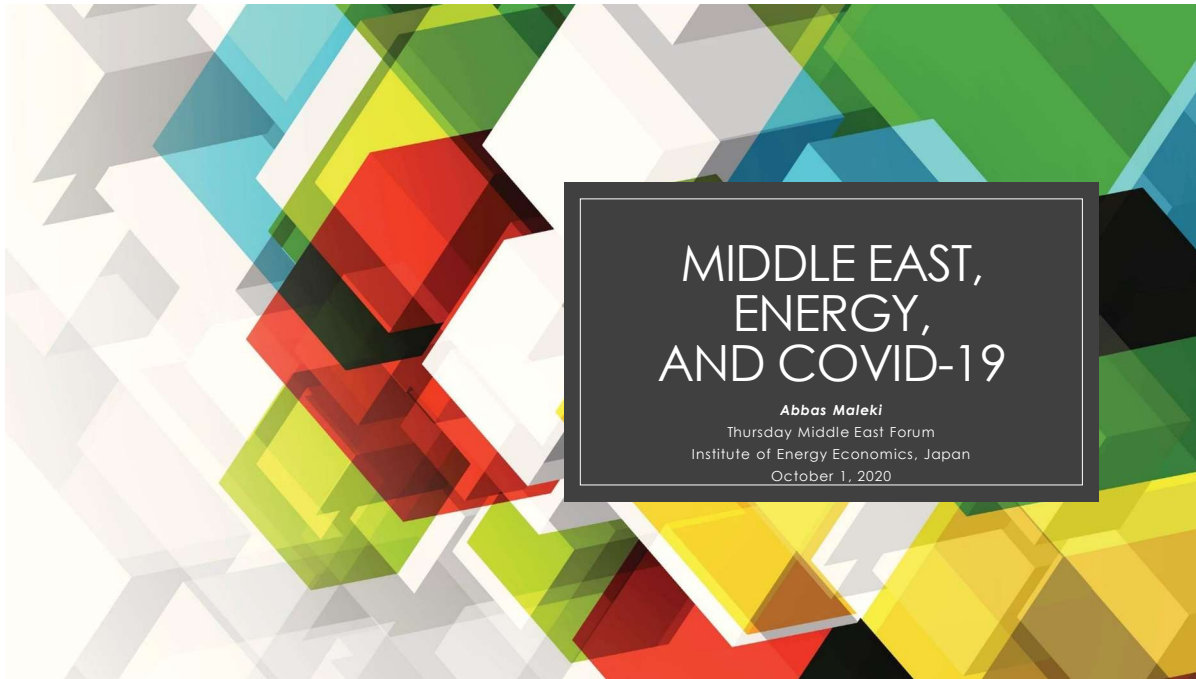
	Price	Change	%Change	Contract
WTI	37.10	-1.62	-4.18%	NOV 2020
Brent	39.32	-1.61	-3.93%	DEC 2020
Natural Gas (Nymex)	2.490	-0.037	-1.46%	NOV 2020

WEEKLY U.S. OIL PRODUCTION (million barrels per day)

	Change from previous week	09/25/20	09/18/20	09/11/20	09/04/20	08/28/20	08/21/20
U.S. production	+0.000	10.700	10.700	10.900	10.000	9.700	10.800

در آخرین ساعات روز جمعه هر دو نفت شاخص قیمت هایی کمتر از ۴۰ دلار پیدا کردند. قیمت نفت خام برنت در حد ۳۹.۳۲ دلار هر بشکه و نفت وست تگزاس اینترمدییت هر بشکه ۳۷.۱۰ خرید و فروش گردید. قیمت گاز از هفته های گذشته بیشتر شد و در هنری هاب به ۲.۵ دلار هر میلیون بی تی یو رسید. مبتلا شدن رئیس جمهور آمریکا به بیماری کووید ۱۹ ممکن است یکی از عوامل کاهش قیمت باشد. همچنین توتال اعلام کرد که شرکت های بزرگ نفتی بدنبال فروش اداری ها یخود در حدود ۱۱۰ میلیارد دلار برای برطرف کردن بدهی های خود هستند. گرچه قیمت های نفت خام نسبت به سالهای قبل کمتر است، اما نکته قابل توجه آن است که قیمت های نفت نسبتا باثبات هستند. بعد از سقوط آوریل ۲۰۲۰، جالب است که قیمت نفت در حدود کانال ۴۰ دلار نوسان می کند. قیمت های نفت از ۲۰۰۸ تا کنون سه بار شدت سقوط کرده و پس از آن نسبتا ثابت باقی مانده اند. یکی در ۲۰۰۸ و ۲۰۰۹ بعداز بحران مالی ناشی از قضیه وام های رهنی در آمریکا، دیگری در ۲۰۱۴ بعد از آن که نفت برنت به ۱۴۷ دلار رسید، و این بار در بعد از آوریل ۲۰۲۰ که قیمت نفت تگزاس از ۶۰ دلار به منهای ۳۷ دلار رسید.

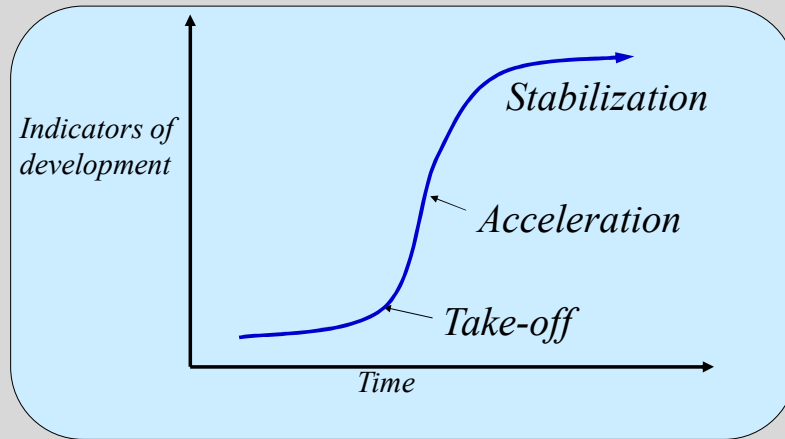
در شب پنجشنبه ۹ مهر به همت انستیتو اقتصاد انرژی ژاپن با همکاری دانشگاه توکیو برنامه ای تحت عنوان مجمع خاورمیانه برگزار شد. در این برنامه من "گذار انرژی با توجه به شیوع بیماری کووید ۱۹ در خاورمیانه" را بررسی کردم. اسلاید های این سخنرانی در زیر آمده است.



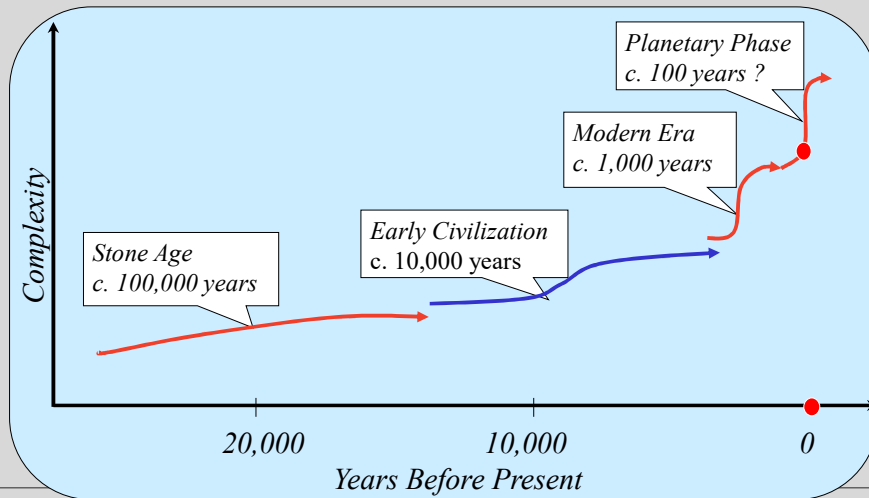
I want to discuss with you on

- Transition
- Oil and Gas Price
- Understanding the impact of Covid-19 to the oil and gas sectors
- Middle East and Covid-19
- Middle East renewables and future of energy
- Conclusions
- Recommendations for Iran

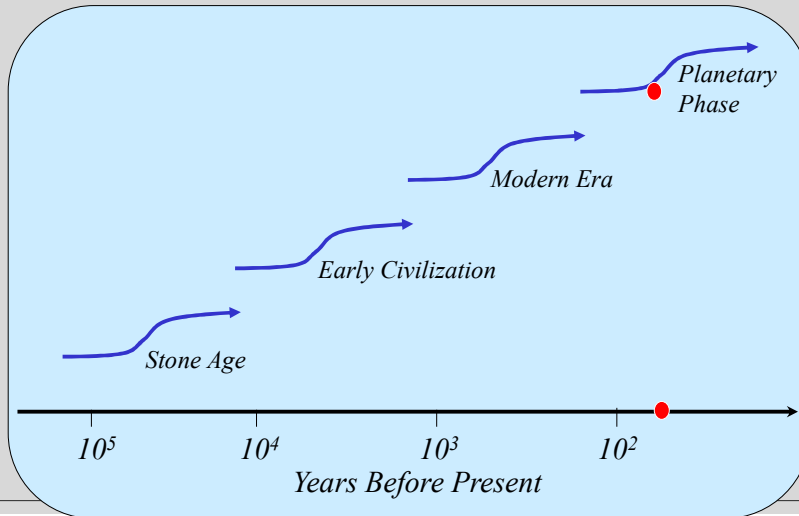
Phases of Transition



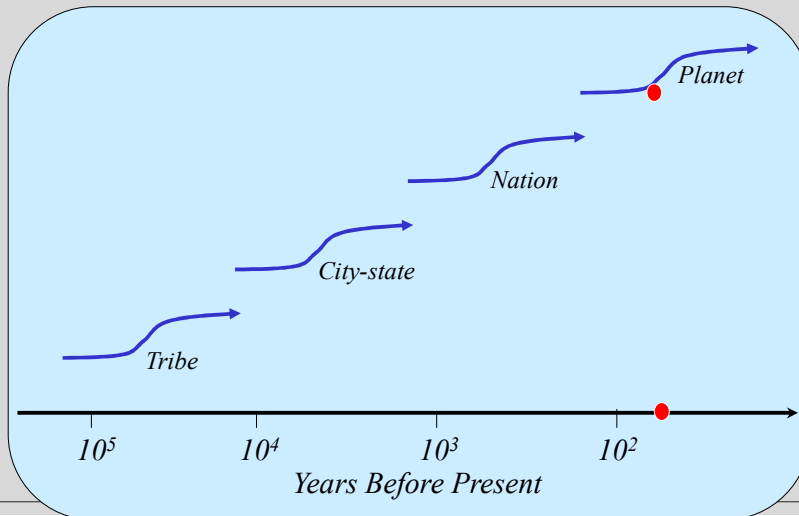
Historical Transitions



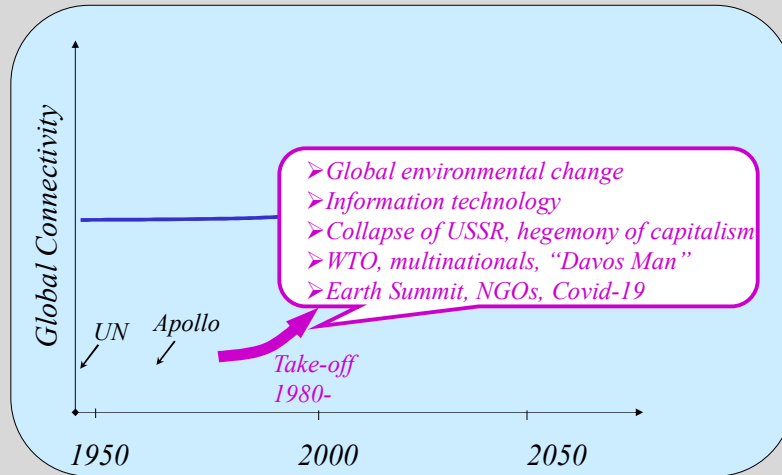
Accelerated Transitions



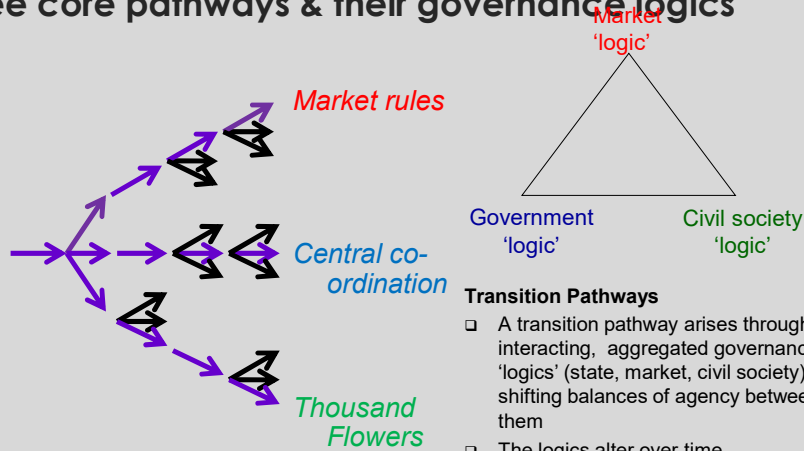
Social Organization



Planetary Transition



Three core pathways & their governance logics



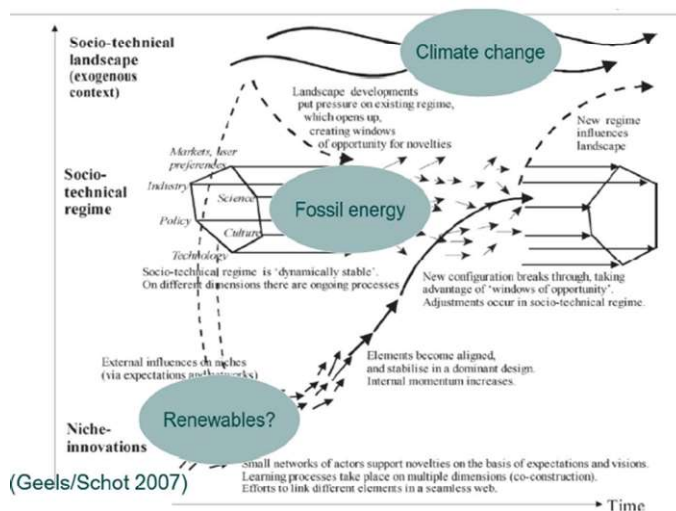
Transition Pathways

- A transition pathway arises through three interacting, aggregated governance 'logics' (state, market, civil society) & the shifting balances of agency between them
- The logics alter over time
- Our three pathways are dominated by one of these logics, but with some degree of hybridity

Three Transition Pathways

- *Market Rules*
 - Limited interference in market arrangements; high carbon price
 - Large companies dominate; big technologies in 'highly electric' future
 - incl. CCS-ready coal/gas, nuclear power, offshore wind
 - 80% generation linked to high-voltage in 2050: grid reinforcement
- *Central Co-ordination*
 - Central government & Strategic Energy Agency commission franchises of low-carbon generation from big companies
 - Via large-scale centralized technologies
 - Cooperation & tensions between key actors
- *Thousand Flowers:*
 - More local, bottom-up diverse solutions led by ESCOs (big & small), local communities & NGOs: closer engagement of end-users
 - Local leadership in decentralized options (50% share)
 - Key technologies: onshore & offshore wind, biomass CHP & solar PV; 'smart grid' technologies to handle power flows

Source: Foxon (2013), in *Energy Policy*



How can we analyze low carbon transition policy

Socio-technical multilevel perspective on transitions

- Three dimensions of Covid-19 in Middle East:
 - Severity of the outbreak
 - Economic capacity
 - capacity of the health systems
- Policy responses on Covid-19 pandemic in Middle East:
- Two broad categories:
 1. policies for closure and
 2. policies for economic support.
- Most democratic countries were less likely to implement the most restrictive closure policies, and more likely to adopt high levels of economic support, compared to the most autocratic countries. Globally, the data shows the following main trends:
- Countries with more democratic institutions were more likely to adopt high levels of economic support.

Covid-19 and Middle East

- COVID-19 was declared a pandemic on March 11, 2020; however, the first reports of its occurrence in MENA came from Iran in late February.
- As of May 6, the disease has spread across the 22 countries in the region, with 224 071 confirmed cases and 8378 deaths (ie, case fatality rate of 3.7%).
- Based on the existing evidence, patients with COVID-19 in MENA are equally distributed within the 15–75 year age range
- Main underlying comorbidities are cardiovascular conditions among women and diabetes among men.
- Although countries worldwide are struggling with the COVID-19 response, the situation in MENA is unique because of the divisions caused by poverty and regional conflicts.

Covid-19 and Middle East II

- Although the states of the Persian Gulf are some of the wealthiest nations because of their oil resources, MENA is also home to some of the poorest countries in the world.
- MENA is the only region in the world where extreme poverty has been constantly increasing since 2011
- More than 20 million people are living on less than US\$1.9 per day
- The economic outlook for these disadvantaged populations is poor, as estimated by the UN Economic and Social Commission for Western Asia:
 1. 1.7 million people in the region will most probably lose their jobs in 2020,
 2. 8 million more people will fall into poverty, half of whom will be children.
 3. Impoverished people in MENA have limited access to clean drinking water, adequate nutrition and sanitation, shelter, health care, and education.

Middle East and Economic Situation

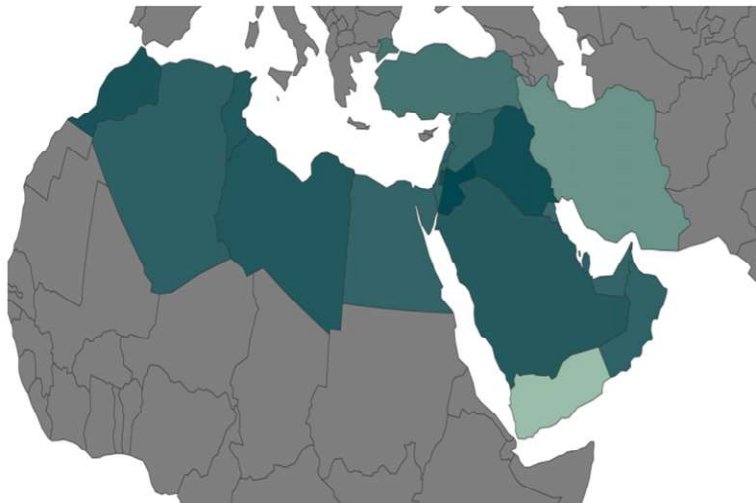


Figure 5: Stringency-index in the MENA region at 1 April. Darker indicates more closure.

Stringency-index in MENA

Source:

"Dealing with COVID-19 in the Middle East",
PRIO Paper, 2020

The Global Situation

1. IMF forecasts a decline of -4.9% for global GDP in 2020—by far the worst global economic performance in the post-World War II era.
2. Oil and gas industry, like many, was powerfully affected by this contraction.
3. Demand for petroleum products fell sharply at a time when global output was ramping up, fueled by rising shale oil production in the U.S.
4. As a result, global oil prices collapsed for the third time in the last 13 years.
5. This decline is compounding the impact of the pandemic in countries where the oil and gas industry is an important, or even dominant, contributor to the national economy.

GLOBAL OIL PRICE DECLINES
Brent Crude Oil, Dollars per Barrel



1. The oil and gas industry was powerfully affected by contraction.
2. Global oil prices collapsed for the third time in the last 13 years

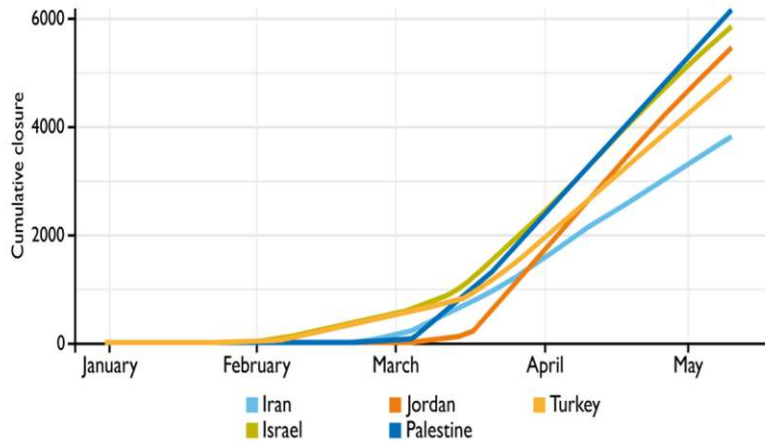


Figure 3: Cumulative stringency-index for the five case countries.

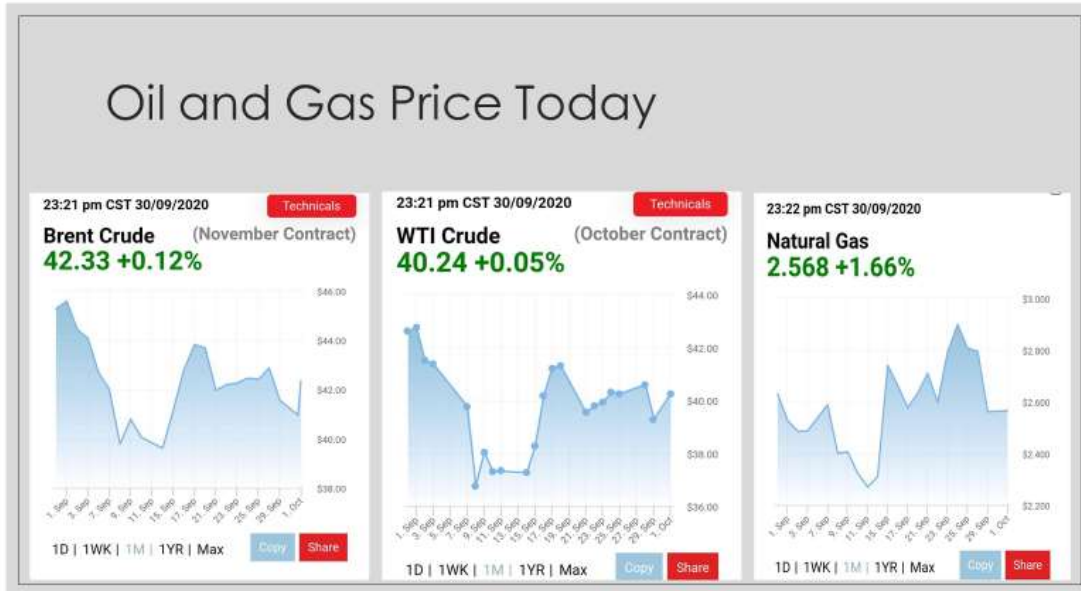
Cumulative Stringency index in ME

Source:
 "Dealing with COVID-19 in the Middle East",
 PRIO Paper, 2020



1. This decline is compounding the impact of the pandemic in countries where the oil and gas industry is an important, or even dominant, contributor to the national economy

Oil and Gas Price Today



WTI

Source:

<https://markets.businessinsider.com/commodities/oil-price?type=wti>

- Energy is a key ingredient to facilitate economic development in the Middle East.
- Expectations for a rapidly growing economy in the next decade will likely cause an increase in the fraction of energy consumed domestically limiting what is available for export.
- These challenges are the biggest for resource-rich countries, since their economy is heavily dependent on fossil fuel exports alongside an energy-intensive economy.
- The energy landscape of MENA has undergone a significant transformation in recent years as a result of intersecting technological, economic and political trends, both regional and international.
- The evolving dynamics of international energy markets, increased diversification of energy sources, global concerns for climate change, and regional conflict are among the leading factors impacting the evolution of MENA energy policy.

Energy in MENA

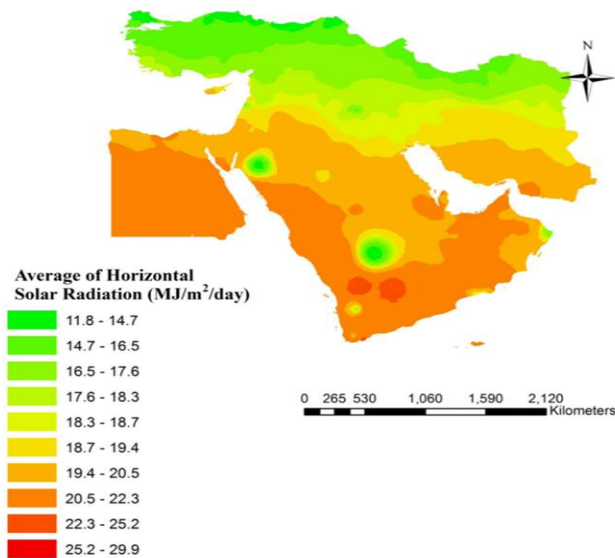


Fig. 6. GIS map of solar radiation in the Middle East.

Renewables in MENA I

Solar Radiation

Yemen, Saudi Arabia and Egypt possess highest exposed areas. Indicating that they can well be recommended as more economical and more promising sites for installing solar facilities

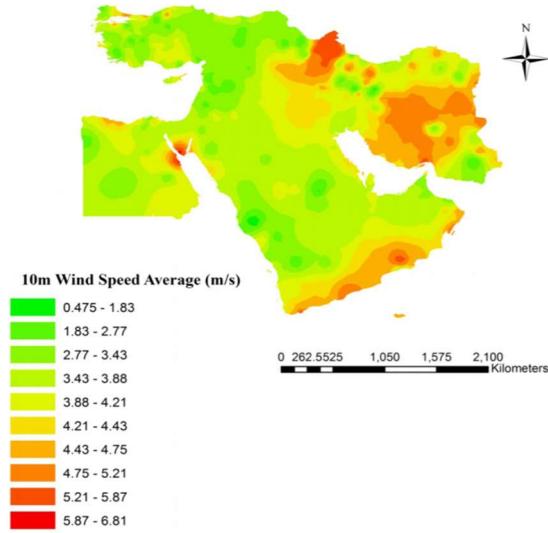


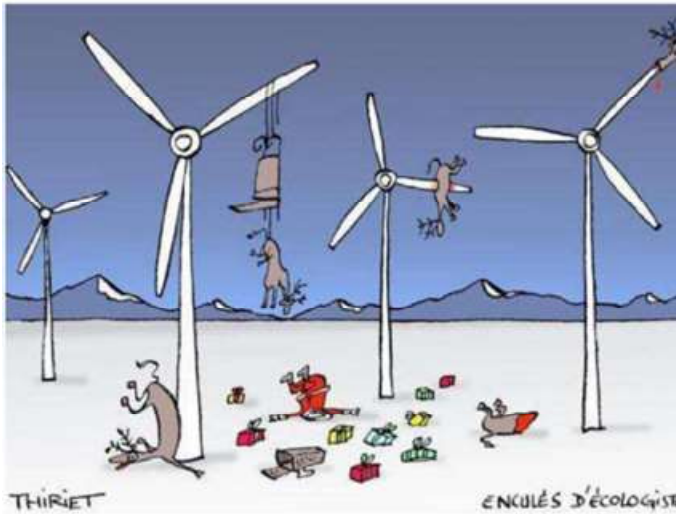
Fig. 7. GIS map of wind speed average in 10 m.

Renewables in MENA II

Considering wind power, Iran, Turkey, Iraq, Egypt, Yemen and Oman are among the top countries with high wind potentials

Source

<https://www.sciencedirect.com/science/article/abs/pii/S1364032115011375>



Energy Transition in picture

Conclusions I

1. The oil supply/demand imbalance is occurring in tandem with the depressed need for chemicals and refined products stemming from industrial slow-downs and travel restrictions in the wake of COVID-19.
2. Consequently, the short- to medium-term outlook for high-cost producers, smaller operators and those companies with high levels of debt appears to be more challenging now than ever
3. For the first time in decades, countries in MENA are facing a common problem with no political or religious agenda, that can nonetheless have devastating effects on millions of citizens.
4. Leaders should put aside differences to come together and revisit their approach to regional security and stability

Conclusions II

4. Statesmen must commit to further investments in regional public health infrastructure and strategies for future disease outbreaks.
5. For the global community, it is imperative to show solidarity and empathy, and to allocate further support and financial and human capital resources to countries in MENA.
6. Infectious diseases know no borders, and future outbreaks could be easily bridged to Europe and Africa and lead to future waves of pandemic.
7. The findings show that the MENA region is during an energy transition that has uncertain outcomes but will undoubtedly have long lasting impacts on the global energy system.
8. I don't think the demand will recover or has COVID-19 accelerated the transition to the nuclear power for the future

- Since the COVID-19 outbreak, Iran has been the hardest hit country in the MENA region, the slowest to close down, and among the first countries to re-open.
- Iran has taken a human-rights-based approach and taken actions such as releasing thousands of prisoners.
- Iran has even made a historical decision to cancel Friday and congregational prayers and to close their holy shrines.
- Despite having the highest number of cases and deaths in the region, Iran was late to enforce lockdown measures and early to resume economic activity.
- Tehran's reluctance to impose a comprehensive lockdown was driven by its lack of capacity to provide economic support to its population.

IRAN & COVID-19 I

- Iran could not afford severe lockdown measures due to
 - US sanctions,
 - A significant decrease in oil prices
 - Leadership's fears of stirring domestic protest
- The lack of effective lockdown, led to severe outbreaks of the virus and significantly impacted the population's trust in government.
- In near future, there is not any clear scope to the better situation in Iran regarding:
 - Low oil and gas production
 - Less export
 - Global decrease in demand for oil and gas
 - Plummeting oil prices

IRAN & COVID-19 II

Recommendations for Iran

- Managing crisis means:
 - Responding
 - Recovering
 - Thriving
- It would be better to refrain from adding the oil money to the budget (escaping from oil curse)
- Iran must invest and develop its LNG trains. There are few projects on mini LNG, needs investment of those countries which need more gas.
- The new situation should be used as catalyst to rethink how to use modern technologies in Iran's oil and gas sector. (digitalization, horizontal wells, ...)
- Iran should focus on common fields along its borders with its neighbors. (Iraq, Kuwait, Qatar, Azerbaijan, ...)
- Iran must retain its educated and skilled labor in pandemic. She needs them after the crisis.

Your Comments?

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