

Geopolitics of Iran Nuclear Agreement – Impact on oil markets

22nd January 2020

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Analysis and views expressed in this article through analysis of data and information available in media and published reports in public domain , are of the author only.

Abstract

US – Iran conflict, although has been showing rising trends since 2018, in 2019 it crossed the diplomatic boundaries and field subversive activities started in Middle East. Though it imposed higher risks in the production and sea borne transportation of oil & gas from this region, its impact on price remained volatile; increasing for a short duration. At the end of current round of events in early 2020, oil settled at about 65 USD per barrels (Brent FOB Spot), significantly higher than 54.13 USD per barrels in 2017. However, there was no serious impact on supplies. Both the parties to the conflict exhibited their willingness to avoid military confrontation at least for the time being. Diplomatic resolution to the issues may not be possible in near future after the unilateral walk out of US and Iran indicating no confidence on any global deal, howsoever rational it may appear.

With this scenario and also the fact that oil supply is surpassing the demand on global level, the disruption in oil & gas supply may not be there in near future but markets to remain volatile due to prevailing uncertainty in geopolitics.

India, heavily depending on import and aware of the risk, stepped up its efforts to increase its strategic reserves capacity and content. Present capacity including stock with refiners is sufficient for about 74 days requirement. Capacity for about additional 12 days has been approved. India is importing from 38 countries at present. Import sources outside Middle East is another approach to which country is resorting to for risk management.

1.0 Nuclear Deal – An Overview

With the announcement of President Trump on May 8 , 2018 that US is withdrawing from the Iran Nuclear Deal , the clock on the deal started ticking backward and stopped on January 5th, 2020 when Iran , post early 2020 attack on convoy and killing of Iranian military commander Qasem Suleimani in Baghdad , announced its walk-out of the deal.

To understand the geopolitics of US-Iran conflict, it is essential to have an understanding in brief, about the Iran Nuclear Agreement, formally known as ‘Joint Comprehensive Plan of Actions (JCPOA) signed in Vienna on 14th July 2015.

The deal with a primary aim to keep a check on the nuclear weapon capabilities of Iran and release the economic sanctions placed on it subject to its compliance, was arrived at after the prolonged negotiation and was signed between Iran on one side and US, UK, France, Russia and China, all five having permanent status in UN Security Council plus Germany on the other side (commonly known as P5+1)

According to the deal, Iran agreed to restrict its stockpile of enriched Uranium for 15 years and the use of its centrifuges to enrich Uranium for ten years. Iran also agreed to repurpose its existing Heavy water reactor for research, Industrial and medical use. The deal also has the provisions for inspection by IAEA, the nuclear watch-dog agency of UN and safeguard for any leaks and violations.

In return, this deal also have scope relief to Iran on 'Sanctions'. EU, US and UN, all committed to lift their nuclear –related sanctions as long as IAEA concludes that Iran's nuclear activities are peaceful in nature. In January 2016, post certification by OAEA about the compliance by Iran, all repealed or suspended their sanctions related to nuclear activities. US also lifted embargo on Oil export by Iran to pre-sanction period and unfroze certain funds from Iran.

Donald J. Trump ran for the President of US and declared President- Elect in Nov. 2016. On assuming charge, he made good on the election campaign promise of 'US would no longer be a party to the (Iran) agreement'.

Not heeding to the advice of European allies, Trump made his intentions clear to re-impose the economic sanctions that were waived when deal was signed in 2015. On May 8 , 2018 , he withdrew US from the agreement citing that deal did not has any provision to regulate ballistic missile program of Iran and also its role in regional wars.

Iran expressing shock and criticism on unilateral withdrawal of US, in the meantime asked other countries in the deal to intervene. France, UK and Germany, earlier tried to convenience US to change the approach, expressed 'regret' over the US decision. Russia also expressed disappointment over this turn of US. UN spokesperson also expressed 'deep concern' over the development and urged all to abide by the deal. Israel and Saudi Arabia expressed their support for President Trump decision.

Whatever may be the global reaction, mostly advising US not to resort to such turn-around, no concert diplomatic efforts were made by anyone to persuade US to review and not to proceed.

2.0 Economic Sanctions re-imposed

Starting May 8, 2018 as Zero date, Trump Administration announced re-imposition of sanctions in two phases; first phase to be effective on August 7 after a gap of 90 days wind-down time (read grace period) to wind up the on-going activities.

This phase include prohibitions related to trade and had impact on contract to sell aeroplanes to Iran, export of caviar, transactions with gold exchange and trade with

Iran, export of carpets and pistachio from Iran and foreign auto companies operating in Iran. Purchase of US Dollar by the Iranian Government was also prohibited plunging Iran currency in the international market.

All activities relating to contract for activities eligible under the 2015 Iran Nuclear Deal are also revoked on August 7, 2018.

Second phase of sanctions which came into force from 5th November 2018 included more stringent sanctions: embargo on oil export from Iran and cutting off Iranian Banking System from global market. Embargo on oil is the most stringent measure as it is the major source of revenue to Iran. New sanctions on Iran included 50 banks and their subsidiaries, the national airline, and 200 members of the shipping industry and vessels as well.

Eight countries, including Tehran’s biggest customers, were granted temporary waivers of 6 months (up to May 2, 2019): China, India, Italy, Greece, Japan, South Korea, Taiwan and Turkey. India stopped oil import of Iran after this date.

3.0 US – Iran Standoff: - Rising Tempers

Year 2019, in the backdrop of mounting tensions between Washington and Tehran, witnessed more field related actions raising the risks of military confrontations. Let us have a look, how the events un-folded each time with rising severity.

The trigger point of recent actions was pressed on May 8, 2018 when the President Trump declared US withdrawal of US from Iran Nuclear Deal 2015 and re-imposition of US sanctions on Iran (for more details , please see section of this report). US placed tough demands which were rejected by Iran.

Table given here give the sequence of major events after this declaration:

Event	Time Line	Description and Remarks
2018		
Two rounds of sanctions; First from August 7 and second from November 5 th . First round sanctions were related to Trade whereas second for oil movements and banking restrictions		
2019		
US declare Islamic Revolutionary Guards Corps of Iran Military as ‘International Terrorists; first time in the history. US sending aircraft carrier in May in the middle-east for response to any escalatory indication by Iran.		
May 12 , Four tankers (2 Saudi Arabian, 1 Norwegian and 1 UAE bunker barge) subjected to sabotage operations off Fujairah		
May 14 , Yemen Houthi rebels launched rocket attack on Saudi Arabia major oil pipeline. Iran denied the involvement.		
May 19 , Rocket lands near US Embassy in Baghdad.		
June 13 , One Japanese and one Norwegian tanker came under attack in the Gulf of Oman.		

June 20 , Iranian forces shot down a US military drone.
US deploy more troops and equipment in the Gulf. Impose personal sanctions on Iran Supreme Leader Khamenei. Iran start enriching Uranium beyond 2015 deal limits.
July 4 , UK seize an Iranian Oil Tanker in Gibraltar. Iran on July 19 , seized a British Oil tanker. Both the tankers were set free in Sept.
More sanctions for Iranian agencies in space research in Sept. Iran continued diplomatic efforts to resolve the issues.
Iran continued with higher Uranium enrichment levels.
September 14 , Yemen Houthi Rebels claim responsibility of drone attacks on two major Saudi Aramco Oil Facilities knocking down more than half output from the country. Iran dismissed the blame of its involvement.
Naval exercise and patrolling on both sides with respective allies continued in Nov. and Dec.

Table 1 - Timeline of major events of US – Iran conflicts Source: Media reports

Escalation to military actions by US forces started on December 29 when they made a retaliatory attack on Iranian backed Shiite militia in Iraq and Syria who earlier attacked Iraq military base in Kirkuk killing an American contractor and wounding several Iraqi and American Services members. Iraq put death toll at 31 due to American retaliatory attack. Iran backed militiamen stormed US Embassy in Baghdad on 31st Dec. forcing more stringent security measures by US after the militiamen withdrew.

Above developments clearly indicate the influence of Iran over Iraq government and Iraq feeling the pinch of US-Iran conflict on its own countrymen, its parliament passed resolution seeking the faster departure of American Troops.

On January 3, 2020 the second most important persons in Iran, IRGC Commander Qasem Soleimani and Iraq’s Popular Mobilisation Forces (PMF) Commander Abu-Mahdi al-Muhandis were killed in a US drone strike. Both US and Iran entered almost into open conflict on January 8, 2020 when IRGC launched missile attacks against two Iraqi military bases housing US soldiers. With no casualties, US administration curtailed the tensions by not resorting to military actions at least for the time being.

4.0 Case of Oil Diplomacy?

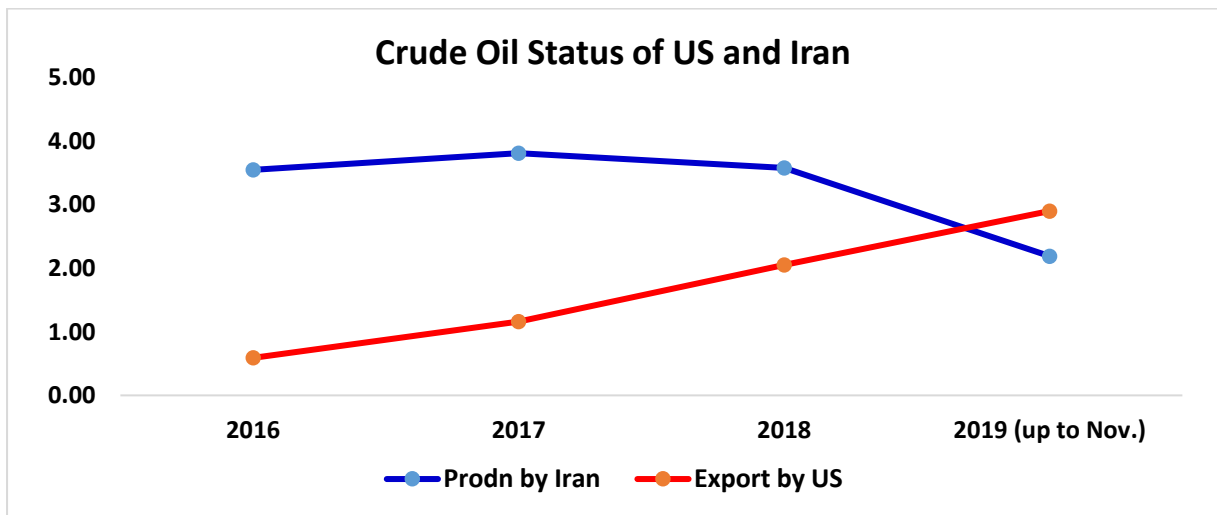
Iran – US conflict appear , at least with all diplomatic statements and media description, to be over issues of role of Iran in the nuclear developments and middle-east zones of conflicts. Does it have Oil angel as well? Let us examine the data from 2016 till date to find out if any clue.

	Units	2016	2017	2018	2019 (up to Nov.)
Export from Iran		3.55	3.81	3.58	2.19

Export from US	Million BBL per day	0.59	1.16	2.05	2.90
US Crude Oil Production		8.83	9.35	10.99	12.11
Brent FOB Spot Av. Price	USD / BBL	43.64	54.13	71.34	63.97
WTI FOB Spot Av. Price		43.14	50.88	64.94	56.72

Table 2 - Oil Production, export & pricing, Source: EIA Data

Above data clearly shows that Iran’s re-introduction in the market with higher than 3.5 million BBL crude addition in the international supply, the oil price took a dip raising a risk of economic viability over oil producers. In US, production of non-conventional crude oil did not show southward trends as were the estimation at that time. In 2016, Brent and WTI spot prices averaged to 43.64 and 43.14 USD per bbl. in the market.



Graph 1- Oil production & export by US, Source: EIA Data

Sanction by US on Iran after walking out of Iran Nuclear Deal resulted in the upsurge in oil prices in 2017 and 2018 as may be noted from the table above, US export jumped from 0.59 in 2016 to 2.9 million bbl. per day (MBPD) in 2019. In spite of immediate reduction in the risk of military action by US and Iran both, the prices remains higher than 2017 levels and are not likely to touch those levels (43 USD per bbl.) in near future. Production from Iran has come down to 2.2 million barrels per day from 3.81 MBPD in 2017.

5.0 Oil & Gas Global markets –An assessment of impact

Strait of Hormuz, the entry and exit channel to and from the Middle East is the focus point of hydrocarbon trade in this region. Let us understand the geography of this channel for better appreciation of the possible impact on the hydrocarbon trade in this region.



The Strait of Hormuz (see map) is about 90 nautical miles (167 km) long, with a width varying from about 52 nautical miles (96 km) to 21 nautical miles (39 km). On the north coast lies Iran, and on the south coast the United Arab Emirates and Musandam, an enclave of Oman. Navigational Channel has 2 miles gap between inlet and out let channels

Photo 1 – Strait of Hormuz

According to EIA estimates, in 2018, about 21 million barrels of oil (crude condensate and petroleum products) which constitute about 21 % of global consumption of liquid hydrocarbons at an estimate cost of about 1.19 billion USD, pass through Strait of Hormuz on daily basis. This volume is about one-third of the world’s sea borne oil trade. Beside liquid, about 4.1 TCF per year of gas flow through this route. Hydrocarbons from Iraq, Kuwait, Saudi Arabia, UAE, Iran and Qatar pass through this channel. Together these countries produce about 26.33 (2018) million barrels of crude per day which is almost 26% of the global supplies of liquid.

As of 2018 data, oil traffic from Saudi Arabia constitute 40%, Iraq 22%, Kuwait 12 %. As of now, 11 % of Iran share (about 1.8 million barrel per day) is out due to sanctions. All this makes this navigational channel very important zone for global oil and gas risk management. Saudi Arabia and Abu Dhabi developed pipelines for alternate route through red sea but this does not have enough capacity to cater to major outflow.

Importers from this region are mainly Asian countries like China, India, Japan, South Korea, Singapore and US (Outside Asia). About more than 80% of oil from this region goes to these countries.

Strait of Hormuz, in spite of its significance and critical to hydrocarbon trade, has a history of international military conflicts almost on regular intervals, major among them from 1988. Each time Iran and US remained the prime role players.

With this background, and considering attack on Saudi Arabia’s oil facilities in the current conflicts in 2019, the risk factor remain alive all the time. However, considering the fact that demand growth of Oil is not as fast as it was in 1988 and immediately thereafter and supply with surplus capacities available across the globe, the severity

of risk is not so critical unless major disruption happens. The point that almost 1.8 million barrels of oil from Iran is out in 2019 but had little or no impact on supplies fulfilling demand and also pricing proves the point.

6.0 Politics of multidimensional conflicts – An analysis

Iran US conflict in its current avatar re-surfaced after the unilateral withdrawal of US from the 2015 deal in 2018. Meanwhile Iran, as per UN regulatory agency reports exhibited the compliance as per the provisions of the deal. In spite of all efforts by the other signatories and Iran, US continued with its approach and imposed sanctions on Iran in 2018. Iran in the meantime, after its call to other signatories for their intervention but not finding concrete results, started increasing enrichment of Uranium beyond agreed level to put pressure on international community for their efforts to convince US. Other signatories to deal, although stated that they will continue to abide by the provisions of the deal, little economic impact was there on economy of Iran as individual business entities refrain from dealing with Iran in such conditions.

With all these diplomatic efforts and actions, the year of 2018 was mostly a year without any significant field subversive activities in middle-east. With total ban on Oil and banking system from Iran in May 2019, field subversive activities started appearing with greater presence of US military in the region. With a number of attacks on tankers and oil facilities (of Saudi Arabia), situations did not escalate to any major conflict as it was not established the involvement of Iran.

This ultimately led to flash point in the very early days of January 2020 with attack and killing of Iranian General Qasem Suleimani and others. Subsequently, Iran's attack on US Embassy areas was considered the trigger point for major escalation of confrontation. However, with no casualties, US did not react with military action. The whole world heaved the sigh of relief.

Oil markets also which followed a rising price trend after the attack on Iran officials in early January came to normal after 8th Jan. 2020.

Although, the flash point situation is over, at least for the time being, the simmering still remain with a potential of eruption again. With Iran declaring not to abide by the limits on uranium enrichment as per deal, Britain, France and Germany took a first step toward re-imposing international sanctions on Iran, seeking to pressure Tehran into returning to compliance with. Russia, which with China remains a party to the deal, saw the move as "deep disappointment and serious concern," The most serious unfortunate incidence was shooting down of Ukraine plane killing 176 passengers.

The ground situation for the deal remains tricky, volatile and hazy. European allies to the nuclear deal, not able to put any pressure on US but asking compliance from Iran even under US sanctions may not yield favourable and peaceful results. In such circumstances, risks on oil traffic from the Gulf and production in the region is under

constant threat of conflict and subversive activities. Iran, in Raisina Dialogue 2020 at New Delhi, mentioned that Iran want diplomacy but not negotiation with US.

Though both the major parties, US and Iran may like to avoid major war like confrontation as far possible and as is experienced recently, there may remain possibilities of attacks by the splinter groups working in Iraq, Syria, Lebanon and Yemen. This may keep the situation explosive in continuity in near future.

7.0 Risk Management by India

7.1 Realignment of oil imports

India, being an oil deficit country, has 83% dependence on import to meet energy requirement. Crude import from different countries / regions (in context of this document) is give below:

(Qty. in Million MT and Price in USD Billion)

	2017-18		2018-19		April-Nov 19	
	Qty.	US \$	Qty.	US \$	Qty.	US \$
Gulf Country- wise Oil Import						
IRAN	22.59	8.97	23.90	12.11	1.97	0.99
IRAQ	45.74	17.54	46.61	22.26	33.44	14.95
KUWAIT	12.85	5.28	10.78	5.43	6.11	2.92
QATAR	3.02	1.26	2.30	12.15	1.537	0.74
SAUDI ARAB	36.16	15.26	40.33	21.38	27.97	13.75
U ARAB EMTS	14.29	6.122	17.49	9.51	12.08	6.17
Oil Import from US	1.44	0.60	6.40	3.58	6.75	3.50
Oil import from Russia	2.96	1.17	2.22	1.18	2.81	1.41
Total Oil Import in India	21810	87.37	22645	114.04	143.24	67.89
Oil Import from Gulf Countries	134.68	54.45	141.43	71.91	83.13	39.54
% of Oil import from Gulf	61.75	62.33	62.46	63.06	58.03	58.24
% of Crude from Iran	10.36	10.28	10.56	10.62	1.38	1.47
% of crude from US	0.66	0.70	2.83	3.15	4.72	5.16

Table 3 - Oil import by India, Source DGCI&S data

Till 2018, India was importing about 62 % of its oil from Middle East countries passing through Strait of Hormuz. However, with closure of import from Iran post US sanctions in 2018, India alone with 8 other counties was allowed a grace period of six months from November 2, 2019 to wind up. From May 2nd 2019, India stopped import from Iran bringing import from middle-east to 58 % in 2019. India during this period picked

up more oil from USA and net import from US increased by about 4 %, making up decrease from the Gulf.

Indian Refiners have been talking to Russian oil majors for import of crude from their country. In first eight months of 2019-20 (April to November 2019) , oil import from Russia is 2.81 million MT which on pro-rata basis, is 91 % higher than import from this country during 2018-19 (2.22 million MT).

7.2 Strategic Reserves of India

Like all countries with oil import dependency, India has also own program. Already three underground storage facilities of total 5.33 million MT (MMT) are in operation (Vishakhapatnam -1.33 MMT on east coast, Mangalore – 1.5 MMT on west coast and Padur in Karnataka – 2.5 MMT). These facilities provide cover of about 9 days crude processing requirement of India beside storage with refiners for 64 days. In June 2018, Government of India approved the addition of 6.5 MMT storage (4.0 MMT at Chandikhol, Odisha and 2.5 MMT at Padur in Karnataka). This will add to requirement of 12 days making India total oil reserve for about 86 days.

Indian Strategic Petroleum Reserves Limited (ISPRL) has signed an agreement with ADNOC permitting them to use Mangalore. ISPRL has also signed an MOU with Saudi Aramco for sharing Padur operating facility. Discussions are on to convert this MOU into an agreement.