An Evolutionist Analysis of Oil Competition and Oil Competitiveness Throughout Oil History

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The goal of this paper is to analyze the evolution of the upstream part of the oil industry by using some analytical instruments established by Michael Porter (Harvard University). Initially, we will characterize the different oil actors that participate in the international oil industry. Then, by analyzing competition in upstream activities until the first oil shock of 1973, we will consider a situation of great competitive stability. Finally, we will envisage a situation of great instability, analyzing the case of oil competition during the 1970s and the 1980s. We can thus interpret the dissimilarities of behavior of the various oil actors as well as the temporal changes in their strategies in an attempt to explain the evolution of their respective role in an oil world that is perpetually changing.

The Main Oil Actors and Their Generic Competitive Strategies

Throughout oil history, there have been three distinct groups of oil actors that have found a place in the competition game: 1) the majors; 2) the national oil companies (NOCs) from oil consuming countries and/or from oil producing countries; 3) the independent companies (originally mostly American companies, but gradually from other countries as well). By associating these firms with the generic competitive strategies that we have presented previously, we will try to establish a new characterization of these three categories of oil companies.

The Strategic Positioning of the Majors

Their presence in the Middle East represented the most fundamental and significant criterion that distinguished the majors from the other oil companies. The control held by the majors over large Middle Eastern oil concessions from the end of the First World War until the first oil shock of 1973 allowed these companies to develop a cost leadership strategy. This domination became increasingly manifest as these firms consolidated their presence and their control over great oil reserves in the region. The issue was to keep full control over these great concessions, to maximize their production and to take full advantage of their huge geological asset. Furthermore, these companies have always favored a very international approach, that is, broad-target, competitive scope.

After the wave of nationalizations of the 1970s, the majors were obliged to orient themselves to more technologically sophisticated sub-segments of the upstream industry, while maintaining their international approach. Thus, we can say that, after the first oil shock, the majors were forced to abandon their former strategic positioning, and develop a new broad-target strategy, based on technological differentiation. Henceforth, the characteristic common to all the majors seems to be essentially their capacity to be present in the most sophisticated upstream activities and their degree of internationalization.

The Strategic Positioning of Independent Companies

The oil industry has probably been the one in which small- and medium-size firms have found the most fertile opportunities to share the market and to coexist with larger corporations. This coexistence is fundamentally explained by the fact that, within the oil industry, a certain number of activities are not always undertaken efficiently by the majors. This has opened up interesting possibilities for independent companies to establish themselves in some segments of the industry.

The appearance of independent actors seems also to be strongly linked to the existence of reasonably favorable conditions for entering the industry. Concerning the upstream activities of the oil business, the United States is the country where the barriers of entry have always been the lowest in the world. Consequently, it is not surprising that the United States has by far the greatest number of independent upstream companies. Most of these firms often operate in segments of the business that have been gradually abandoned by the majors. They focus their activities on the most mature regions and on segments that require a lower level of technology.

Recently, the American picture has been partially extended to the rest of the world. This shows that "geographical positioning" constitutes a fundamental parameter of strategic segmentation in the upstream business. Indeed, most independent companies operate on a national (or even regional) level. This geographical specialization constitutes their major attribute, because these companies are able to operate in already well worked regions with costs that remain competitive. This is why we can normally consider the independent companies as being competitors that concentrate on certain activities. They adopt a geographic focus strategy, based on costs. Throughout oil history, this strategy has appeared to be defensible.

The Strategic Positioning of National Oil Companies (NOCs)

As fast as the oil industry has developed and oil has become more important and more strategic for nations, governments have reconsidered their own political strategies vis-à-vis this sector. The political climate of oil activities has changed, with direct impact on competition within the industry. The strengthening of the relationship between oil and policy has induced an increasing sense of oil nationalism. This nationalism then allowed the creation and the expansion of many national oil companies (NOCs).

Apparently the only aspect that is common to all NOCs is the extremely close relationship between their interest as commercial enterprises and the national interest of their country. Most activities of NOCs are developed within their home country, aimed essentially at the promotion of the national interest of the country. Sometimes, these companies are considered as an "emanation of their government" to control the national oil industry. Therefore, what makes NOCs a special case in the oil industry is the particular relationship with their home country and the way in which the country sees its oil company as a strategic national asset.

Due to this characteristic, these companies end up by creating an interesting and significant strategic position.

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NOCs are basically competitors that concentrate on their national market. They build their generic strategy upon the geographical dimension. By developing their national natural resources, they seek to reach a competitive advantage in their target segment. Given the various mechanisms set up by the state to protect them and to help their development, NOCs benefit from a competitive advantage of a political order, which ensures the viability of their differentiation focus strategy. This strategic positioning has allowed them to develop strong technical and commercial capabilities, and sometimes even to launch themselves into international activities.

The Path to Stability and the Challenges of Stable Competition Before the First Oil Shock

Oil history, from the origin of the oil industry in 1859 in the United States until the end of the Second World War, characterizes what can be called the path to stability of oil competition. This path has been built gradually. Its history is mainly the history of the strategic positioning of the oil companies and the consolidation of some dominant forms of competition. This stability became a reality after the Second World War and endured until the first oil shock in 1973.

The different strategies of the various oil actors that have gradually been transformed into dominant forms of competition were essentially the vertical integration of the oil companies, the horizontal integration and the internationalization of the majors, the ideological differentiation of NOCs and the geographical concentration, based on costs of independent companies.

The horizontal and vertical integration of the majors has taken on an extremely important dimension in the oil industry. It has become the key element of the dominating competitive paradigm of the period. Horizontal integration, by binding the most important oil companies to each other, has proven to be an essential instrument in eliminating disastrous competition, allowing these companies to stabilize and to coordinate their competitive environment, and preventing their cost advantage from degenerating into price wars.[1]

Indeed, the rules that guided the operation of the oil consortiums in the Middle East established that any increase in production capacity within the consortiums had to be negotiated and decided with unanimous approval. Individually, no company could build up excess capacity in the most prolific oil province in the world. Therefore, the majors could not profit fully from their cost advantage in this region.

Vertical integration guaranteed outlets for growing oil production. It allowed firms to minimize their fiscal costs by allocating profits to affiliates that were subject to lower rates of tax. Furthermore, it allowed the majors to smooth short term imbalances between demand and supply. Finally, it turned out to be a very effective strategy by which new independent companies could establish their own place in the oil market without becoming dependent upon the majors.

In spite of their huge oil reserves in Venezuela and in the Middle East, the majors have continued to develop a strategy of internationalization. The level of production in the Middle East being defined by very constraining rules within the consortiums, the issue was to find other sources of oil that could be freely developed and used. Even if these new sources were not as cheap as those in the Middle East, the fact that they could be managed with more "suppleness" represented an important competitive advantage.

Fundamentally, this set of dominant forms of competition has led the oil industry to a certain stabilization. Having found their specific strategic positioning within the oil industry, all competitors (the majors, NOCs and the independent companies), have benefited from a very stable competitive environment, strong growth and a general reduction of risks. The international upstream business has experienced a long period of strong growth with stability. The dominant strategies have become very evident and durable. The changes in competition were only marginal and gradual. In addition, despite the precocious internationalization of the business, the industry was not truly exposed to the challenges and the difficulties that usually characterize a "global business" and global competition.

This state of affairs prevailed in the upstream sector of the international oil industry for more than twenty years until the outbreak of the first oil shock in 1973. Nevertheless, by the end of the 1960s, a gradual degradation of the political and economic fundamentals of this competitive paradigm had already begun to dawn.

The rapid expansion into international upstream activities of numerous firms belonging to the independent and NOC groups entailed an escalation of competition and released a series of aggressive competitive strategies. The newcomers have begun to compete with the majors on their own ground, especially in the Middle East. Struggles between the majors, the new international actors and governments have subsequently modified the distribution of power within the industry.

The political and economic transformations that occurred at the end of the 1960s and the beginning of the 1970s have resulted in a gradual loss of political and economic stability in oil competition. Thus, the process that led to the outbreak of the first oil shock in 1973 had a rather endogenous origin, with gradual development. The origin of oil instability of the 1970s must, therefore, be found in the evolution itself of competition during the period of stability.

Oil Competition During the Period of Crisis

The notion of oil crisis from the viewpoint of the upstream sector has a very singular meaning. The oil shocks in 1973 and 1979 did not simply create problems for the industry. They relaunched the profitability of upstream activities, allowing oil companies all over the world to improve their profits. They also opened up new and more sophisticated segments in the industry, creating new opportunities for investment that were not available when prices were low. On the other hand, these two shocks triggered a strong wave of political instability.

The counter-shock of 1985-86 entailed a radical modification in the competition paths. Oil prices declined very rapidly, jeopardizing the profitability and even the existence of some oil companies. All the oil actors had to adapt to the new economic context. On the other hand, the political situation of the industry began to decline.

In an evolutionist perspective, the 1970s and the 1980s were nevertheless characterized by an important common

(continued on page 20)

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[1] See footnotes at end of text.

An Evolutionist Analysis... *(continued from page 19)*

element, that is, the instability, the uncertainties and the growing risks imposed on the oil companies. We witnessed the complete upheaval of the old industrial structure. In particular, we saw the disintegration of the oil industry, and consequently the erosion of the major instrument that used to guarantee competitive stability in the years preceding 1973.

Regarding the strategic redeployment of oil companies, the changes were violent. To a large extent, this global and radical repositioning of firms became the most important driving force towards the acceleration of competition and the escalation of instability.

After nationalization of the upstream activities in the largest producing countries, the majors lost their cost leadership and became broad-target differentiators. Sheltered by higher crude oil prices, the majors began to put into effect a technological differentiation strategy, allowing them to have preferential access to new producing regions (the North Sea, Alaska, and increasingly deep offshore areas), at the limit of existing technological capabilities.[2] Furthermore, the need to find new sources of crude to compensate for the losses in the Middle East brought the majors to strengthen their internationalization policy, making them increasingly broad-target competitors.

The independent companies did not really change their generic strategy. Essentially, they continued to adopt the same geographic focus strategy, based on costs. Even after the decline of international oil prices in 1985-86, most independent companies were able to defend their position in the market.

Finally, due to growing politicization of the oil industry, all the NOCs grew substantially during the oil crisis. In fact, the crisis substantially improved the competitive position of all political and ideological focus strategies.

In particular, NOCs from the producing countries became the new cost leaders, with their immense low cost oil reserves. However, since their activities were essentially centered on their national territory, where they had to maintain special political relations with their government, these firms often had to face other costs (for example, high organizational costs), which partially undermined their geological advantage and cost leadership. Thus, these companies could not enjoy the same cost leadership as the majors did before 1973.[3]

Yet, new NOCs were created or expanded in many smaller producing countries. This new wave of internationalization in the upstream business contributed to unstable competition. Indeed, small producers have a different oil rationale. Their level of production is closely linked to their domestic political and economic limits. These countries are less concerned with the international problems of the oil industry. In addition, the incorporation of these countries into the world oil supply system put the majors in direct competition with many of these new NOCs. Consequently, not only have we seen the integration of new countries into the world oil supply system, but also the integration of new enterprises, a new oil logic, and new frontiers of competition.

Regarding the dominant forms of competition, the most traditional dominant strategies were weakened or disappeared, while other strategic options were proposed, but with less credibility. Many innovations (endogenous and exogenous) were produced, completely transforming some competition parameters. Furthermore, firms reacted to events, introducing other changes that were often even more fundamental. It was a question of outstripping the other competitors in adapting to the new challenges of competition.

Considering all the transformations that developed in the upstream industry during the 1970s and the 1980s, it was obviously not just a question of financial and economic changes. Indeed, during this period, oil competition was greatly politicized. OPEC was both the major actor and the emblematic figure in this process. More than ever, oil history was marked by political conflicts involving countries and companies.

Footnotes

[1] The competition between the majors had to be limited because it was a question of maintaining a certain level of stabilization so as to protect the structure and the general profitability of the industry as well as the huge investments committed. In a sense, it was not a question of developing strong competition between the oil companies, but rather of cooperating with each other so as to reduce production, transportation and logistics costs, thereby improving the general competitiveness of oil compared to other sources of energy.

[2] This strategy has been considered the best answer for the majors to improve their relative position vis-à-vis their competitors, NOCs and independent companies. Based on their technological capability, the majors wanted to strengthen their competitive position by increasing the technological barriers in the most sophisticated upstream activities, making it very difficult for

(continued on page 24)