## Modes Of Deregulation In The Downstream Sector Of The Nigerian Petroleum Industry

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# Background & Statement Of The Problem:

The low capacity utilisation of Nigeria's state-owned refineries and petrochemicals plants in Kaduna, Port Harcourt, and Warri, the sorry state of disrepair, neglect, and repeated vandalisation of the state-ran petroleum product pipelines and oil movement infrastructure nationwide, the collateral damage of institutionalised corruption, with the frightening emergence of a local nouveau riche oil mafia that controls, and coordinates crude oil, and refined petroleum products pipeline sabotage, and theft ("illegal bunkering") nationwide, the insatiably corrupt military Task Force operatives that assist diversions of both crude oil and petroleum products, and large-scale cross-border smuggling of petroleum products, all of which are the root causes of the protracted, and seemingly intractable severe fuel crises that have bedevilled the country relentlessly, for close to a decade now, are all predictable outcomes of government involvement in the downstream sector of the Nigerian petroleum industry, over the past quarter of a century.(1 and 2)

As expected, public opinion about deregulation in Nigeria covers a wide spectrum, and cuts across all sides of the argument. Some Nigerians hold the view that deregulation cannot be complete, whether in the downstream sector of the Nigerian petroleum industry, or indeed, in any other sector of the national economy (1). However, deregulation is seen as desirable in freeing government of its concurrent control, and involvement in the businesses of refining, importation, and distribution of refined petroleum products in the Nigerian market. In their opinion, the deregulation of the petroleum industry in Nigeria should be implemented in phases, so as to enable the state-owned monopolies to regain efficiency, before their full privatisation.

Another school of thought strongly believes that the Nigerian petroleum industry must not be liberalised, or deregulated, or privatised completely, for whatever reason, and that the status quo should remain, maybe, with some minor fine-tuning made, "here and there", to improve efficiency, as appropriate, "in the overall national interest". Essentially, this is the implied position of the Nigerian Labour Congress (NLC).

However, some others insist that complete deregulation, including the total, and final dismantling, unbundling, and subsequent wholesale privatisation of all state-owned petroleum businesses, should proceed without further delay, with maximum despatch, for the continued, and meaningful survival of the Nigerian petroleum industry in the 21st century. In short, for such Nigerians, the benchmarks of globalisation, not nationalisation, dictate the tempo of the new world order in international petroleum market transactions.

Since the early days of the on-going transition from military dictatorship to reasonable democracy, the Federal Government set up a team, led by a technocrat in the Presidency, (recently appointed the Group Managing Director of the state-owned national oil company, NNPC), to explain certain key issues of liberalisation, and to counter the arguments of those opposed to the notion and concept of deregulation of the downstream sector of Nigeria's petroleum industry.

Typically, the scope of discussions covered during the "enlightenment campaign" included such

issues as the burden of subsidies on the national treasury, the strain of financing Nigeria's state-owned petroleum businesses, intra- and trans-ECOWAS smuggling of Nigerian petroleum products, the relative market prices of petroleum products in the ECOWAS sub-region, vis-à-vis their prices in Nigeria, licensing of private refineries, the need to break the monopoly of NNPC, and the general benefits of deregulation. Reactions to the government-sponsored "enlightenment campaign" range from outright objection, to cynical disinterest, through cautious empathy, to dogmatic assertion of the ultimate inevitability of the deregulation of the Nigerian petroleum industry.

Here, we will consider and make realistic assessments of probable scenarios of deregulation in the downstream sector of the Nigerian petroleum industry, against the general background of global trends in deregulation and restructuring in the petroleum industry, coupled with the current level of public awareness, and government's posturing on the issue of deregulation in Nigeria.

Five (5) likely scenarios, or probable modes of implementation of the deregulation process in Nigeria, are summarised as follows:

Supply side deregulation.

Demand side deregulation.

Complete deregulation.

Phased deregulation, starting from the upstream sector.

Retention of the status quo.

The time frame of implementation of workable petroleum industry reforms, the potential effects on both Major and Independent petroleum products marketers, the role of both the currently dysfunctional state-owned refineries and prospective private refineries, salient factors of acquisition of the existing state-owned facilities, and the criteria for identifying suitable players in a deregulated downstream sector of the Nigerian petroleum industry, are all crucial to the success of the deregulation process, and are therefore considered here.

Below are highlights of the five (5) likely scenarios of deregulation in Nigeria:

#### Scenario #1: Partial Deregulation Of Only The Supply Side.

The inherent assumptions of this scenario are that:

The Federal Government is sensitive to the inadequacies of the existing state-owned petroleum refining, and refined products supply and distribution systems in Nigeria, and desires to maximise supply sources for the refined products market in the country.

Federal Government monopoly of refining, pipeline operations, and primary distribution from the state-owned storage depots would be completely unbundled, and abolished.

Local and foreign private investors would be willing to take over the state-owned facilities (refineries, depots, and pipeline systems) in their current state of dilapidation, disrepair and poor performance, and operate them efficiently and profitably thereafter.

Private refineries would procure crude oil at competitive rates, and sell their refined products profitably, and at international prices, both in Nigeria and beyond, as desired by the refiner.

Private importers would procure refined petroleum products and sell such products at deregulated prices, in line with prevailing market prices.

Barriers to new entrants into private refining, pipelines and depot operations would be eliminated.

Hypothetically, with anti-monopoly policies (which are not yet in place in Nigeria), and with competition among private refiners, the demand for petroleum products could be met and sustained. However, because of the low buying power of the consumers in the Nigerian market, the demand for petroleum products, sold at international market rates, would be reduced significantly.

Profitability of business at the retail end of the downstream sector would be dictated mainly by economies of scale: only the big players in the petroleum products marketing sub-sector would survive. Consequently, up to 95% of existing Independent marketers may cease to be in their present form. Alternatively, there could be mergers among weaker Independent marketers (with between 1 ~ 10 outlets) to compete with the present top Independent players, on the one had, and individual Major marketers, on the other. In short, the market would be segmented into individual Majors, individual current top Independents, and groups of merged minor Independent marketers of petroleum products.

The current sorry state of the state-ran refineries, pipeline networks, and depot operations may not encourage private investors (local or foreign) to acquire them. And so, KRPC, WRPC and PHRC may continue to be state-owned enterprises, which may, or may not continue to operate under state protectionism. This scenario is very analogous to what happened in the Nigerian aviation industry following "liberalisation".

Essentially, the Federal Government holds on tenuously to "fine-tuning" an evidently inefficient state-owned business that goes through a long drawn out process of slow and progressive extinction. In a sense, the medium to long-term consequences of Scenario #1 on KRPC, WRPC and PHRC is that they would decay slowly, and finally die under government protectionist cover.

The first generation of post-deregulation private refineries in Nigeria would be the stand-alone type: In this scenario, private refineries would manufacture petroleum products, and distribute them to targeted segments of the Nigerian market (most likely, regional) from their loading facilities within the refinery complex. In other words, there will be no private pipeline operating companies to move refined products from such private refineries to their markets.

The predominant mode of refined products distribution would be outlet-specific truck loading, mainly to domestic retail affiliates of the refiner. In short, private Nigerian refiners would initially secure their market, built around the retail outlets of groups of Independent marketers, while potential private foreign refiners, if any, would preferably target their distribution at both the Nigerian, and export markets, possibly through the Majors.

## Scenario #2: Partial Deregulation OF Only The Demand Side.

The inherent assumptions of this scenario are that:

The Federal Government, though fully aware of the glaring inadequacies of the existing state-owned supply and distribution systems in Nigeria, would prefer to restructure the decrepit refineries, pipelines and depots, so as to enable them compete in tandem with the proposed new refineries that would be built, and managed by private investors.

Federal Government monopoly, control, and/or coordination of petroleum products importation would stop.

Private investors would have open access to state-owned facilities like petroleum reception jetties at Okrika, Effurun, Calabar, Escravos, and Atlas Cove (Lagos), including the storage tanks at PHRC, WRPC, and KRPC, and at non-discriminating tariffs, for expediting the logistics of importing petroleum products into Nigeria.

Private products marketing companies would form strategic alliances or mergers in order to optimise operating costs.

Price fixing, "uniform pricing", and so-called "bridging" subsidies by the Federal Government would stop.

Barriers to new entrants into wholesale, or/and retail marketing of petroleum products would be eliminated by law.

Clearly, because of the lead-time to effective attainment of improved performance, and adequate supply of refined products by the existing state-owned refineries, coupled with the lead-time necessary to build and operate new private refineries to complement existing supply sources, the availability of refined products may not be much different from what obtains currently. Therefore, the market segments (Majors and Independents) may also alter very marginally.

However, opportunities exist for private importers to complement shortfalls in product stocks. With this scenario, there may be an upsurge in private importation of petroleum products. Recent acquisition of import reception facilities by Independent marketers indicates a potentially competitive market for both marketer groups: Majors and Independents. This scenario forces mergers on the existing Independent marketers in order for them to be cost-effective.

The emergence of post-deregulation private refineries in Nigeria would be very dependent on the policies of the Federal government with respect to the price of crude oil allowed both private refiners, and the state owned refining companies. With the current disparity between the open market price of crude oil and that conceded to the state-owned refineries, it is not likely for private refiners to invest under such conditions. In this scenario, the state-owned refineries would remain protected, probably selling their products at international rates. Though pipeline operations may still be monopolised by NNPC, very likely, "bridging" and "uniform pricing" could cease to apply. Potential private Nigerian and foreign refiners would not be attracted to invest under such policy regimes. Consequently, the only possibility for expansion of refining capacity would be dependent on new state-owned refineries that may be added to the existing pool.

## Scenario #3: Complete Deregulation of the Downstream Sector.

The inherent assumptions of this scenario are that:

The Federal Government is conscious of the gross inadequacies of the downstream sector of the Nigerian petroleum industry. However, government would restructure all state-owned refineries, pipelines, and storage depots, prior to their unbundling, and final acquisition by private investors.

The Federal Government desires to maximise supply sources for the refined products market in Nigeria, including the build-up of a so-called "strategic nation reserve" of refined petroleum products.

A critical mass of qualified private Nigerian investors exists that can take over the stateowned downstream petroleum businesses, now ran by NNPC, and manage them efficiently and profitably.

Two (2) separate and independent downstream policy formulation and enforcement agencies would be established by the Federal Government to monitor the sector effectively, post de-regulation.

Private businesses may import refined petroleum products and sell such products at competitive prices.

Barriers to new entrants into all segments of the downstream sector would be eliminated.

Unnecessary (legal and illegal) impediments, including the existing overbearing procedures for granting licenses to private refiners, and other potential investors in the downstream sector, must be abolished by law, with maximum despatch.

There must be open access to state-owned monopolistic facilities such as jetties, storage tanks, and pipelines, through non-discriminatory tariffs to private operators.

Price fixing in any guise, by government, must stop.

As in Scenario #2, because of the lead-time to attainment of improved performance and adequate supply of refined products by the existing state-owned refineries, the availability of refined products may not be much different from what obtains currently. Therefore, the market segments (Majors and Independents) may only alter very marginally in the short to medium terms. However, if and whenever full price deregulation starts to apply, opportunities could emerge for private investors to move in and compete effectively.

With this scenario, there would be an initial inertia in private sector participation, to be followed by a trickle of private refiners, and operators of existing state-owned product pipeline networks (if any). With such private refineries, effectively competing at global pricing and other standards, refineries would be retail outlet-specific. This scenario forces mergers on the existing Independent marketers in order for them to be cost-effective. The scenario would also result in Major marketer refiners preferentially directing their distribution to their own outlets. In this scenario, the supply and primary distribution of refined petroleum products in Nigeria would very likely be under the control of the Major marketers, ultimately.

## Scenario #4: Phased Deregulation Starting From The Upstream Sector:

The inherent assumptions of this scenario are that:

The Federal Government would ensure the effective implementation of a planned phased transition to comprehensive deregulation of the entire petroleum industry (upstream and downstream) in Nigeria.

The Federal Government would enforce applicable conditions for stimulating competition in the market, while concurrently discouraging monopoly behaviour in the domestic retail market.

Private suppliers of crude oil to Nigerian refineries would be encouraged.

Prices of crude oil and refined products would be set in line with international benchmarks, and prevailing foreign exchange rates.

All NNPC Joint Venture contracts with multinational E&P companies operating in Nigeria would be replaced with Production Sharing contracts.

Crude oil produced by private operators would be theirs to sell at competitive market prices in Nigeria or overseas.

NNPC and its subsidiaries would be restructured in phases and subsequently broken up.

Regulatory role of the DPR must be redefined to enhance its capacity to effectively monitor and enforce compliance as an independent agency of the Federal Government.

With a well-articulated plan of phased deregulation of the entire petroleum industry in Nigeria, starting with the upstream sector, the availability of crude oil to the local refineries would be based on competition among private suppliers. This would encourage private E&P investments, particularly local marginal field operators. With the removal of both monopoly advantages, and mandatory JV contracts with multinational E&P companies from NNPC, the state-owned company would undertake more PSC contracts with foreign and Nigerian partners in the short to medium terms, if ownership of the crude oil were reviewed in favour of the producer.

At the stage of full deregulation of the entire oil industry, private crude oil marketers could compete to supply feedstock to the local refineries, either as affiliates, or as independent suppliers. Private pipeline companies could operate the existing petroleum products primary distribution networks, and storage depots. This scenario forces mergers on all players in order for them to be globally competitive.

The scenario would also result in Major refiners preferentially directing their distribution to their outlets in Nigeria and overseas. Supply and primary distribution would ultimately be under the control of the big players in this scenario. It appears rather strange that, to date, very little or nothing has been said or done by the Federal Government about the deregulation of the upstream sector of the Nigerian oil industry. The implication of this observation is not trivial, and could in fact adversely influence the deregulation process in the downstream sector if not addressed quickly.

# Scenario #5: The "Do Nothing Option":

The inherent assumptions of this scenario are that:

Deregulation of the Nigerian oil industry is not in the "security, and overall national interest" of the country, and therefore, not desirable.

Existing inefficient government-owned facilities in the downstream sector can be satisfactorily upgraded.

In a sense, the "Do Nothing Option" represents the worst-case scenario, and is also the most probable scenario in Nigeria. In this scenario, the status quo remains: i.e. "Business unusual, as usual".

Private players are not, (and will not be) motivated to invest under the prevailing state-protectionist regulatory framework. The chances of improved performance in the state-controlled petroleum refining, and refined products supply and distribution systems, are near-zero, with no meaningful competition to the existing sick, and severely dilapidated refineries, and product pipeline infrastructure.

Predictably, the entire Nigerian petroleum industry becomes progressively moribund, unattractive to both Nigerian and foreign investors alike, in both the upstream and downstream sectors, then comes to a grinding halt, and finally collapses.

#### Conclusion:

The role of the Federal Government, vis-à-vis the Nigerian petroleum industry, is being redefined, little by little. Possibly, state-owned monopolies like NNPC may, in the end, be dismantled completely. State interventions, such as the Petroleum Equalisation Fund (PEF), price fixing, uniform pricing, including the so-called "bridging reimbursements" may, one day, cease to be, and, hopefully, the Nigerian petroleum products market could be meaningfully reformed and effectively deregulated ultimately. Maybe.

Indeed, opening up crude oil and petroleum products markets to transparent competition is not easy. Nevertheless, it is central to the successful implementation of petroleum industry reforms worldwide. This involves facilitating access to capable importers and exporters of both crude oil, and refined petroleum products, consequently forcing the local (private or state-owned) refineries, and products marketing companies to face serious and meaningful competition, which must be in place, a priori, for the deregulation process to succeed.

Deregulating the downstream sector of the Nigerian petroleum industry requires a change in pricing policy. Product prices, before tax, must be set in line with economic border prices. Taxation must not discriminate between local and foreign investors. However, several sub-Saharan, Latin American, Caribbean and Asian countries have allowed for a short transition phase that ultimately led to full deregulation in the downstream sector. It is therefore necessary to design a systematic basis for introducing economic pricing before price deregulation, so as to ensure the continued meaningful participation of private operators in the business.

Distortions in the prices of petroleum products need to be reviewed. For Nigeria, as sub-regional integration progresses within the ECOWAS sub-region, cross-border prices will become increasingly harmonised, while the usual excuses, indeed, the very notion of smuggling of petroleum products within the sub-region will become progressively meaningless.

Below are key characteristics of the regulatory environment of an energy industry under reform:

Unnecessary legal impediments and bureaucratic procedures that inhibit meaningful participation of private companies in the petroleum industry must be dismantled and abolished by law.

There must be open access for private investors to use state-owned facilities such as jetties, storage tanks, and pipeline operations. Tariffs for such access must be non-discriminatory.

The functions policy formulation and regulation enforcement must be explicitly separated and assigned to different and independent agencies.

The number of supply sources must be maximised.

Creating minimal conditions for market competition takes time, depending on the country, the size of its markets, and its national economic and political priorities. It takes time for a market to respond to new rules. A transition stage is thus unavoidable.

The following are important features of a market in transition:

Depending on the size of the market, a minimum number of private players must be involved.

Government must be sensitive in its relations with private investors in the petroleum industry.

Prospective private operators must have the necessary financial and technical capacity, and be liable to applicable environmental, community relations obligations, safety, quality and other standards. They should also be able to maintain a minimum national strategic supply stock, in case of emergency.

Independent agencies, (at least two (2), one technical, the other economic), must be established to monitor the market continuously, and to react quickly to any deterioration in product quality, or/and monopolistic tendencies.

In principle, Scenario #4 is the most optimal, given the size of the Nigerian petroleum industry. However, judging from the posture, and public pronouncements of the Federal Government, and placed within the context of prevailing political and national economic priorities, the most likely outcome of the deregulation of the downstream sector of the Nigerian petroleum industry could involve a combination of Scenario #2, and Scenario #3.

Depending on the effectiveness of implementation, the deregulation process could subsequently either progress along the general direction of Scenario #4, or degenerate along the lines of Scenario #5. It is relatively unlikely that Scenario #1 would apply.

The above projections are based on the following:

Although the Federal Government is fully aware of the underperformance of the existing state-owned petroleum refining, supply and distribution systems in Nigeria, it would prefer

to restructure the domestic refineries, pipelines and petroleum products storage depots, so as to enable those refineries operate side-by-side with the proposed new refineries to be built, and managed by private investors. Top policy makers in government still believe, tenaciously, that the existing inefficient government-owned facilities in the downstream sector can be satisfactorily upgraded, despite the glaring evidence to the contrary.

Barriers to new entrants into private refining, pipelines and depot operations may not be eliminated. However, Federal Government monopoly and/or coordination of petroleum products importation may stop in the long term.

There are no clear indicators that private investors would have open access to stateowned facilities like storage tanks, and products reception jetties, at non-discriminating tariffs, for importing petroleum products into Nigeria.

Unnecessary (legal and illegal) impediments, including overbearing procedures for granting licenses to prospective private refiners and other potential investors in the downstream sector may continue to remain, given the nature of the bureaucracy in Nigeria today, and the seeming lack of political will to open up the petroleum industry to transparent transactions, and open competition.

The Federal Government could establish, in the medium to long-term, two (2) separate and independent petroleum industry policy formulation and regulation enforcement agencies that would monitor the sector effectively.

The Federal Government may not encourage private supplies of crude oil to Nigerian refineries. The definition of ownership of produced petroleum may not be revised in favour of private E&P investors.

Resistance by the Nigerian Labour Congress (NLC) to the complete deregulation of the Nigerian petroleum industry remains defiant.

Private local and foreign investors may not be willing to take over the state-owned facilities (PHRC, WRPC, KRPC, Eleme Petrochemicals Company (EPCL), twenty-one (21) petroleum products storage depots, and nine (9) LPG storage depots) in their current state of abject inefficiency, and disrepair.

There are possibilities that private petroleum products marketing companies, both Majors (as with TotalFinaElf) and Independents, would continue to form strategic alliances or mergers in order to optimise their operations, and sustain profitability.

Private importers may supply refined petroleum products and sell such products at competitive prices.

Prices of crude oil and refined products could be set in line with international rates and, maybe, prevailing naira exchange rates. Price fixing, uniform pricing and bridging subsidies by government could stop in the medium to long-term.

What has become clear is that, despite the flood of applications for private refinery licenses in Nigeria, in the end, because of the high costs and risks involved, only a few private refineries, (whether Nigerian or foreign owned), may ever emerge ultimately. It is further envisaged that most of the first generation of private refineries in Nigeria (if any), may not be brand new: That is to say,

private investors, particularly the indigenous ones, may rather procure refurbished refineries, presumably to minimise their initial risk capital.

Earlier attempts at reforms in the telecommunications and aviation industries suggest that it could be a bit premature to provide definitive appraisals of the impact of deregulation in the downstream sector of the oil industry in Nigeria at this moment (3). For example, consumer prices of mixed LPG (domestic cooking gas) vary from a low of US\$336 per metric ton (N588 per 12.5 kg cylinder), to a high of US\$652 per metric ton (N1141 per 12.5 kg cylinder) in some countries (Cameroon, Côte d'Ivoire, Ghana, and Senegal) within the ECOWAS sub-region. However, in Nigeria, where the LPG market has been completely deregulated as far back as 1998, as we are made to believe, the consumer price of a 12.5 kg cylinder of domestic cooking gas, varies between N1,600 and N2,000 today, clearly the highest in the ECOWAS sub-region! Definitely, the differences in subsidy levels in the respective countries contribute significantly to the observed spread in consumer prices across the sub-region.

So, what exactly is it that they are doing right in Cameroon, Côte d'Ivoire, Ghana, and Senegal, that we are doing very wrong in Nigeria? Or have some Nigerians started "bunkering" LPG (and LNG) too?

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#### References:

Adams, G. Aret: "Deregulation of the Downstream Sector of the Petroleum Industry"; Post Express Newspaper, Lagos, Nigeria; (17 May 2001).

Braide, K.M: "Guaranteeing Petroleum Products Self-Sufficiency in Nigeria"; Annual Dinner Guest Lecture of the Nigerian Society of Chemical Engineers, held at Shell Club, Port Harcourt, Nigeria; (29 November 1997).

Braide, K.M.: "Deregulation: An Executive Guide for Elder Statesmen"; (24 August 2003)

Mayorga-Alba, E.: "Deregulation and Reform of Petroleum Markets"; Energy Issues; FPD Energy Notes # 6; World Bank Group, Washington D.C.; (September 1995).

Niskanen, W.A.: "The Peculiar Economics of Bureaucracy"; American Economic Review; Papers and Proceedings; 58; 298; (1968).

Perotti, E.C.: "Credible Privatization"; American Economic Review; 85; 847; (1995).

http://www.nigerdeltacongress.com/marticles/modes\_of\_deregulation\_in\_the\_dow.htm: Nov 2003