

Regimes Governing the Development of and Revenues from
Upstream Petroleum Sector in Iraq
“Background paper”

By

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Introduction and analytical outline

Upstream petroleum sector in Iraq has been on significant development drive, in time and magnitude, since mid- 2009, and such development efforts would, if realized, bring outstanding results for Iraq and the world petroleum market.

In an unprecedented move in the history, a developing country with significant proven reserves and many giant fields offers all its prized petroleum fields for foreign direct investment (FDI). With an open, TV covered and competitive bidding process through three rounds Iraq contracted 17 oil and non-associated gas fields. These petroleum fields would be developed by the contracted 18 IOCs from 14 countries, including all the permanent members of the UN Security Council. In addition to the contracted 18 IOCs there will be more business opportunities for the conventional service companies and related companies worth billions of US dollars.

Moreover, the ministry of oil has been preparing for a fourth bid round covering 12 exploration blocks, scheduled for end May 2012 after many postponements. Also there are talks about “mini” bid rounds regarding other major oilfields such as East Baghdad, Nassiriya and even more.

The development of these petroleum fields is governed by long-term technical service contracts (LTTSCs), though in reality these contracts are hybrid of conventional service contracts and production sharing contracts. Four model contracts were used for these LTTSCs with similar structures but different in substance for many components of the fiscal and financial nature. Such differences could manifest positive learning curve in some aspects, confusion and lack of proportionality in other aspects, and unnecessary concessions for the remaining.

KRG, on its side conclude in a short period significant number of production sharing contracts-PSCs without consultation with or approval of the federal ministry of oil.

This paper is primarily about the 15 concluded LTTSCs, which among them cover 14 oilfields and 3 gas fields, and deals with the significance and components of the fiscal regime as stipulated in the four model contracts, and presents necessary and possible calculations of the most critical factors. Therefore, no attempt will be made to address in details other legal, technical and production aspects of the contracts and related possible scenarios.

The paper is structured to provide brief review of the main features of the Iraqi petroleum policy as manifested in the Ministry's development plan. The second part describe briefly also the legal and regulatory frameworks governing the upstream petroleum development by identifying four different layers from the Constitution at the top down to operational and directives and regulation.

Part three addresses various types of existing and possible contractual modalities, which are reviewed with particular focus on the models of the LTTSCs and their specific characteristics. This part provides detailed examination and comparative analyses of the components of fiscal regime of these contracts. These components fall in two broad categories: specific and quantifiable such as signature bonus, remuneration fees, corporate income tax, R-factor values, interest rates, training fund and administrative overhead charges. Attempt is made to produce numerical values of what IOCs could earn from their contracts. The second category comprises vital components of significant impact such as stabilisation clause, baseline production, conditions for early cost recovery, conditional first IOCs rights, performance factor and production curtailment.

This part will also address, but briefly, the main features of the KRG PSCs, gas utilisation and BGC deal with Shell and Mitsubishi, and the forthcoming exploration bid round.

Part four is about the transparency and credibility of bidding and contracting process done by the federal ministry of oil and by the KRG.

The revenue issue is addressed through annual budget and the allocation of national development plan in the perspectives of oil export revenues generated in the last three years, and this done in part five.

Finally the paper ends with few concluded remarks. Related data is provided in the tables at the end of the paper in Annex 1 and a list of relevant publications by the author is provided in Annex 2.

I- Preview of Main Components of Iraq's Oil Policy

Iraq's petroleum policy seems to rest on five vital pillars: expand oil and gas production capacities; diversify export outlets and market configuration; augment petroleum reserves through enhancing recovery factors, deep formations drilling and more exploration with advanced technologies; increase gas utilization with zero or absolute minimum gas flaring; and finally enhance refining capacities.

The Ministry of Oil plan 2011-14 provides detailed information on the above together with good indications on the vision, components and detailed objectives, which the plan aims to achieve. In this respect the plan could manifest the main pillars of the country's oil policy or orientations.

The "vision" of the plan is set to:

1 – Increase the production capacity in the oil and gas, as well as oil products at international standards and an increase in the oil and gas reserves for the permanency of the situation in Iraq in an advanced position among the producers and exporters in the world and the exploitation of these vital resources in a sustainable manner.

2 – Working to keep pace with scientific and technological developments and the advancement of the oil industry and to bridge the gap occurring as a result of interruptions to keep pace with the development which occurred during the past years.

The "General Goals" of the plan can be summarized as follows:

- 1 – A significant increase in oil and gas reserves.
- 2 – Increase the production capacity of crude oil and gas.
- 3 – The escalation of gas investment.
- 4 – To meet the growing need of oil products and gas through the increase in refining capacity and gas processing.
- 5 – Improve the quality of products.
- 6 – Rehabilitation and development of systems, storage, transport and current export and open new export outlets.
- 7 – Increasing environmental awareness and reduce environmental pollutants.
- 8 – To provide fuel for power plants.
- 9 – Workforce development.

The aim of the next four-year plan to achieve significant economic revenues to Iraq through the achievement of rising rates of production during the years of the plan will be elaborated under the logical sequence of oil operations.

Achieving the above objectives in the stated four years will bring additional revenue to the state for the purpose of improving infrastructure and raising the level of services and livelihood of citizens. (The plan provides further details on each of the above items)

II- Legal and Regulatory Frameworks

The development of Iraq's upstream petroleum sector is and undoubtedly would be affected by the complexities and intertwinement of various legal, constitutional, institutional, agency and policy frameworks.

The pyramid of legal and regulatory framework governing the petroleum sector policy and development impacting its formulation and execution is composed of many levels each has distinct authority with legal and legislative instruments.

At the top/ first level of the pyramid stand the federal Constitution, which provide the basic principles and constitute the heart of the mandatory framework within which petroleum policy functions.

The Constitution is the sovereign law with its enshrined principles pertinent to our subject matter. Collective 'ownership' (Article 111) and 'highest benefit' (Article 112:2) are the most powerful core principles; participatory 'co-management' (Article 112: 2) is basic operational principle, and 'encouraging' the private sector involvement both domestic and foreign is necessary promotional principle (Article 112: 2).

The second level includes related legislative instruments on petroleum sector. These include the proposed Federal Oil and Gas Law (FOGL), which is a legal framework of direct relevance to petroleum sector and the federal petroleum policy especially with regards to upstream and midstream development in the sector.

The proposed FOGL has been in deadlock since early 2007, and all proposals by the parliament, the ministry of oil and even the latest political deals between the federal and KR governments have not lead to the promulgation of the law.

In addition to the stalled FOGL there are few existing laws dated prior to enactment of the current constitution that are directly related to oil upstream development and still applicable and in force.

This level includes also other laws of particular relevance such as those related to Law 3 of 1997 for the protection of the environment; Income Tax Laws 113 of 1983 (and 19 of 2010); Public Company Law 22 of 1997.

In addition to FOGL there are other, but enacted laws that have direct and indirect implication for petroleum-related projects. Among them are the Private Investment in Oil Refining Law 64 of 2007 and its related amendments, the Provincial Law 21 of 2008 and its amendments and the Investment Law 13 of 2006 (and its amendments), which created the National Investment Commission and the Provincial Investment Commissions (PICs).

In the third level there are or would be the ministerial/institutional legal frameworks. These includes the anticipated laws for the MoO, Iraqi National Oil Company (INOC) and any other related entity that could have a role in the formulation and implementation of the petroleum policy in general and upstream sub-sector in particular.

Until new laws for MoO and INOC are enacted, the old laws remain valid and enforceable such as Law 80 of 1961 (promulgated 99.5% of concessions areas), Law 97 and 123 of 1967 (related to INOC, which was dissolved in 1987 and merged within MoO), Law 84 of 1985 (preservation of national petroleum wealth) and Law 101 of 1975 (for the MoO)

The legal instruments for the second and third levels are usually propose by the government through the CoM, approve and enact by the CoR, and enter into force upon publication by the Official Gazette *Alwaqee aliraqia*.

The lowest and fourth level of the pyramid includes instructions, directives, guidelines, and alike that fall within the mandate of and issued by any executing related entity, such as MoO and INOC among others. These instruments are directly related to execution and implementation purposes and functions.

There is a considerable degree of legal uncertainties, ambiguities and disparities that could lower the legal predictability in upstream development arrangements, especially those involving IOCs. Ambiguities and imperfections, different interpretations of certain constitutional provisions had and could generate daunting uncertainties on one hand and referral to older, though still valid, laws on the other. This has generated serious rifts between the legislative and executive branches on their respective roles in the development process of the upstream sector. With the proposed FOGL stalemate, the executive branch (CoM and MoO) relied primarily on its own interpretation of selective old instrument to move forwards with its actions, causing further legal uncertainty.

The principles enshrined in the constitutions have caused serious difference of interpretation, opinions, and generate ambiguities to the extent that observers find it necessary to resolve these ambiguities and make the required constitutional amendments.

The most apparent and lingering problem is the legal status of the concluded contracts covered by this paper. While the executive branch, CoM and MoO, considers the enactment of these contracts falls within its mandate and authority, others within the legislative branch – the parliament/ CoR and outside it think the government illegally intrudes on the parliament prerogatives. Informed legal and professional opinion extends support to the position taken by CoR. Furthermore, IOCs expressed concerns about the legality of these contracts in the absence of clear legal framework, though they are willing to accept the risk associated with such legal uncertainty. But many have even worried that the new government and parliament might cancel or radically modify these contracts, which might affects the economics of the related contracts.

During March 2010 election campaign and in the immediate aftermath political parties and groups declared their dissatisfaction with these contracts, and called for revising them once the new government assumes office.

That said, in the absence of specific hydrocarbon law, vague and ambiguous provisions of the current Constitution and selective invoking of pre 2003 laws, the legal framework governs the upstream petroleum projects remains shaky and thus generates good deal of legal uncertainty.

III- Types of Contracts

Different contractual modalities were considered and are utilised for the development of upstream petroleum sector in Iraq. The most known among these modalities are the followings:

Long Term Technical Service Contracts- LTTSCs, based on the four “Model Contracts” used for the three bid rounds and an earlier oilfield, Al Ahdab. LTTSCs cover the most prized oilfields with more than 68 billion barrels (bbls), representing 59% of Iraq proven reserves. The 15 concluded LTTSCs are for 14 oilfields and 3 free-gas fields. So far the same model will also be used for the fourth bid round covering 12 exploration blocks with both oil and gas potentials.

Engineering, Procurement and Construction contracts- EPC. On the Iraqi side this type of contracts was negotiated with selected IOCs that led to nominating one consortium to award the contract if negotiation succeeds. Unlike the open and transparent process of the LTTSCs, EPC contracts have been negotiated directly with few pre-selected companies and therefore no detailed information was available on the fiscal and legal provisions of these EPC. An extended version of this type is the engineering, procurement, construction and management contract- EPCM, which is concluded by the contract winning IOCs and their sub-contractors. Accordingly, EPC contracts are not covered in this paper, though a reference to them might be made in due course.

Technical Support Contracts- TSCs. These were developed as a result of many Memorandums of Understanding-MoUs concluded between MoO and IOCs prior to the adoption of LTTSCs, and had contributed to the formulation of the latter. A form of this type of contracts is the conventional service contract with international petroleum service companies. Another form of this type of contracts is the front-end engineering and design- FEED.

Joint Venture-JV. So far this modality is confined to the Basra Gas Company pursuant to the Head of Agreement- HoA concluded between MoO and Shell in September 2008. Critical reviews and assessments of HoA had been made taking into consideration the latest development pertaining to the Joint Venture. Brief review of the concluded BGC is provided later.

National Efforts or Direct Execution-NE/DE. This is mainly a direct implementation and execution by the Iraqi oil companies, which could includes TSCs, EPC/M, FEED and or supply contracts. Officially, all oil and gas fields that were not awarded through the first and second bid rounds were to be executed through this modality. But that have been changed as indicated above for the three gas fields, and recent information indicates also to the possibility of offering Nassiriya oilfield for international investors through LTTSC or EPC

KRG concluded more than 45 Production Sharing Contracts for upstream petroleum sector within the Kurdistan region and inside what is known as “disputed areas”. The main structure of the PSCs s explained latter.

The Service Contracts

The General structure of the contracts

This paper focuses on one type of these contracts, namely LTTSCs since these are currently the most prevailing and therefore the remaining space is reserved for these contracts.

Very brief, LTTSCs have similar structure with same number of articles, almost common clauses, identical annexes and addendums.

The remuneration fees (RF) are denominated in US\$ not in barrels of crude oil, and this prevents IOCs from capturing the windfall of high prices.

The contracts are constructed on the principle of take or pay (TOP), whether pay now or later, resulting in putting all risk entirely on the Iraqi side.

Each contract has an Iraqi State partner with “carried” interest of 25% share.

The duration of each contract is 20 years with possibility of 5 years extension.

All IOCs are subject to 35% corporate income tax imposed on the earned remuneration fees.

Finally, t

The contracts are in a sense a hybrid in nature as they comprise components from production sharing contracts such as long duration, exclusive or first right, financing, signature bonus and effective management participation on one hand, and on the other from service contracts such as remuneration fees, sovereign control (though conditional), host government risk.

As mentioned earlier the proposed FOGL has been in deadlock since early 2007, INOC law discussion in the Parliament did not go beyond the first reading; MoO law and Revenue Sharing Law have not yet proposed by the executive branch. Until the above ambiguities are cleared and the pending laws are enacted the governing framework is currently confined to the concluded contracts- LTTSCs, though with challenged legality.

Components of the fiscal regime of the service contracts

This part attempts to provide comprehensive and comparative analyses of the fiscal regimes of the four model contracts governing both brown and green oilfields and gas fields..

A thorough examination of the Iraqi “Model Contracts” would indicate to a complex fiscal regime comprising many important variables that are effective in determining the final direct revenues/cash flow to the foreign companies (N/IOCs) from their involvement in these fields, and to Iraq. Significant indirect benefits, such as long term secured access to oil resource, the possibility for further business opportunities through contractual provisions related to the so-called ‘exclusive/first rights’, establishment of strategic alliances and partnerships etc, are referred to but no attempt was made to quantify them in this occasion.

In the following space the paper identify and briefly analyse the critical and most important variables and components comprising the fiscal regime of these model contracts.

1- Signature Bonuses:

Payment of signature bonuses is normal practice in oil industry especially in the developing countries. They intend to provide an “up-front” income, and generally they are non-recoverable. However, it is highly likely that IOCs “factor-in” the amount paid as signature bonus and thus recover it back indirectly through various ways and means during the term of its contract. In spite of this real possibility, there could be a rather heavy “political price” if the host government accepts or asks for low signature bonus especially when information indicates to high bonuses paid elsewhere. Furthermore, where oilfields are high prized and allocated by competitive tendering or bidding, the signature bonuses offered/asked may become a key factor, and thus could be very significant. The MoO did not use signature bonus as a competitive factor in the bidding rounds. Finally, with growing and aggressive role of State owned/ supported NIOC, such companies demonstrate willingness to pay record high signature bonuses to win a foothold in energy rich location, as shall be referred to hereunder.

Each of the four model contracts has provisions for signature bonus but they differ in substance reflecting a rather inconsistent attitude by MoO in deciding the magnitude, form and rational for this factor.

For Alahdab contract the amount of the signature bonus is only (\$3) million. This in comparison with those under the other oil related two model contracts and what has been paid somewhere else is unreasonably low.

Unlike Alahdab, the PFTSC for BR1 initially called for much higher signature bonuses- Rumaila: \$500; West Qurna1: \$400, and for Zubair and Missan group \$300 million each. However, instead of been income and non-recoverable they were considered interest bearing loans (at LIBOR+1) payable with interest over five (5) years in quarterly installments commencing two (2) years after the contract's effective date.

Many, including this author, considered this not only giving away what should have been revenue but also set costly precedent for the country at large. Furthermore, converting signature bonuses into loan could be unconstitutional, and thus was challenged legally.

The BR2 generated \$850 million of unrecoverable signature bonuses.

While this was good improvement reflecting the effects of the criticisms on the way signature bonuses were handled under the BR1, the requested amounts do not reflect the quantitative aspects of the oilfields in term of the potential of the fields (measured by production plateau, its duration and the total proven reserve) and the qualitative aspects (such as quality of the crude, type of reservoir formations and location of the field.) Obviously, the comparative proportionality for this group of oilfields is not very clear and thus the amounts of the requested signature bonuses are questionable here again.

It is worth mentioning in this juncture that record high signature bonus of \$2.2 billion was paid by the Chinese company "Sinopec" in 2006, to outbid its competitors to get the rights for oil and gas exploration in two blocks in Angola. Two exploration blocks, with all risks involved, in Angola generate \$2.2 billion in signature bonus revenues, while 14 Iraqi oilfields (currently producing 1.6 million b/d, and upon full development they could produce 11.2 mbd) generate \$2.05 billion (and \$1.2 billion of them are loan) in signature bonuses!

However, MoO agreed, in April 2010, to reduce signature bonuses on West Qurna 1 and Zubair oilfields from \$400 million and \$300 respectively to \$100 million each but converting the bonuses from loans to unrecoverable up front.

The decision by MoO was seen as a preemptive measure intends to weaken the lawsuit that was before Federal Supreme Court-FSC. However, that decision did not cover Rumaila contract because the amount have been paid in January 2010. That explanation did not last long, and during July (2010) Baghdad conference MoO asked BP/CNPC to convert \$500 million signature bonus from interest bearing loan into \$100 million unrecoverable payment, following what other IOCs did for West Qurna1 and Zubair oilfields. MoO's DG was reportedly said in justifying the request, 'If it stayed as a soft loan, we have to get parliament's approval for it, and there is no (functioning) parliament right now'.

Obviously that decision did not show a measure of proportionality, otherwise why the bonuses for Rumaila, West Qurna 1 and Zubair were reduced to the same amount though they have different initial amounts.

MoO through its DG had conceded publicly now that the contracts concluded under the umbrella of the first bid round should have been approved by the parliament because of the signature bonuses, and therefore, it has acted unconstitutionally.

While the decision to change signature bonuses from interest bearing loans back into unrecoverable amount is to remedy a wrong done to begin with, nevertheless it should be welcomed and appraised.

As for the three gas fields offered under BR3 MoO abandoned signature bonuses as one of its concessions to induce IOCs, and thus MoO attracted criticisms for this unjustifiable u-turn on signature bonuses.

The above discussion clearly indicates inconsistent approach and ambiguous policy by MoO regarding signature bonuses.

- 2- **Remuneration Fee (RF)** is the fee paid to the contractor (composed of the N/IOCs and the Iraqi State-Partner) per barrel for the “Incremental/ Improved” production above the baseline initial production rate (for BR1) and or upon reaching the “Commercial Production” as quantified in the related contract (for BR2) and stipulated and calculated in the clauses therein. Each oilfield has its final/bid RF that was agreed upon during the bidding process. Moreover, contractually the IOCs are entitled to receive the same remuneration for oil barrel and for the processed associated gas from the same field based on barrel oil equivalent-boe. As for the three gas fields under BR3, RF is paid per boe.

RF is field related and considered as one of two major bidding parameters, which IOCs had to compete against each other and against a predetermined maximum RF the Ministry is willing to pay, and minimum production plateau targets set beforehand by MoO. Table (1) summarises the bid and final RF by all consortia for each field against the final/accepted RF by the winning consortium.

3- R-factor (R-f)

It is the ratio of cumulative cash receipts to cumulative expenditures in the conduct of petroleum operations as defined in the related contracts. Unlike RF, which varies depending on the contracted fields, the R-factor is unified and fixed for all fields under the related model contract/the bid round, meaning we have structurally different R-f tables (as shall be elaborated soon).

R-factor is a sliding-scale (*Progressivity*) method according to which the value of the RF declines as cumulative cash receipts increases as function of the incremental oil and gas production (and also higher oil prices.) In other words with increasing profitability of the N/IOCs the RF per barrel declines, starting from the maximum value of RF, as stated in the agreed bid, ending with the minimum value as percentage of the RF defined in the related model contract.

An obvious criticism of R-f is that it encourages ‘gold plated’ attitudes by IOCs on the expense of cost-effectiveness of the operations in order to keep the R-f at the upper range as long as possible to insure receiving highest portions of RF possible.

There is some validity in this view, though R-f is not peculiar to the LTTSCs under consideration here in this paper. However, the contracts themselves provide (or should provide) sufficient protection against cost inflating if implemented efficiently and managed effectively. The issue then is not the R-f itself but the national capacities responsible for these contracts’ oversight.

4- Corporate Income Tax-CIT.

All IOCs working in Iraq have to pay a unified CIT according to Iraqi income tax laws and regulations. The Parliament approved, on 25 January 2010, and the law enters into force once published in the Iraqi Official Gazette- *Alwaqee aliraqia*. The promulgated Law 19 of 2010 has three articles: increase CIT for IOCs to a rate of 35%, instead of the 15% applied prior to January 2010; link this new law with still valid Income Tax Law nr.113 of 1983, and finally mandated the Ministries of Finance and Oil to issue the operational directives to facilitate its implementation.

Oil contracts concluded pursuant to the three bid rounds would be subject to CIT. But it is not yet clear whether the CIT for Alahdab contract will increase from 15% to 35 % or remains the same under the pretext of stabilisation clause of the said contract. I expect CNPC adheres to the new law similar to the prevailing contracts including the new ones signed by CNPC itself.

5- The State Partner

For each of the 15 contracts there is Iraqi oil entity- “State partner” as part of the foreign contractor(s)- the N/IOCs. The share- or the participation interest of the State partner (PISP) within the contractor-N/IOCs is fixed at 25% without actual beforehand payment from the Iraqi side since this share is “carried” by other N/IOCs in the consortium. This means that one quarter of the remuneration fee will be earmarked for the Iraqi “State partner”. Also the State partner has one/forth representation within the foreign contractor’s side. For example each contract has a Joint Management Committee-JMC comprising eight members four representing Iraqi contracting side and four, one of them is the State partner, representing the foreign contractors.

All state partners are companies within the structure of the MoO, but they should not be the contracting party-ROC itself.

The advantage of this arrangement is to provide channel of on-field cooperation and coordination between the regional contracting company and other Iraqi oil companies. But this could have many problems as well. First, there could be a conflict of interest. For example when Iraqi Drilling Company- IDC is the state partner it has an interest in securing drilling contracts to itself or to its foreign partners. The second issue is the level of representation. If the representation is confined to a level of director general, then it is expected the same person (DG) who represents his company. Moreover, in case there is a financial remuneration associated with the representation, there is high probability of monopolising it by the same person in the company-its DG. Finally, there is the issue of technical competence and professionalism. Field development requires, at the JMC level, intensive level of technical competence in upstream petroleum. During and after July 2010 conference held in Baghdad for the contracted IOCs, many complained that some Iraqi members of JMCs have not seen the related contracts, they do not speak English or technically incompetent.

6-The Formula

The combined effect of the PISP and CIT, since both are constant percentages, is a formula dividing the payable remuneration fee between Iraq and the N/IOCs by 51.25% and 48.75% respectively. The implication of this formula is that each dollar Iraq pays in remuneration fee, she gets back/ deduct 51.25 cents from it.

7- The “**Participation Interest-PI**” of each N/IOC within the related consortium is established at the time of the bid, but can also be adjusted later subject to the approval of the Iraqi side, as was the case with BP/CNPC for Rumaila oilfield and Lukoil/Statoil for WQ 2.

The share of the N/IOCs from RF is decided within each consortium in accordance with their respective participation interests.

The Numerical Values of Remuneration Fees

Considering the above, tables (2) and (3) present our calculations of the maximum each of the involved N/IOCs would get under five R-factor values, specified in the related model contract, after deducting CIT and PISP.

It should be noted that R-factor effect on the payable remuneration fee has changed for the last two segments- from 0.5RF and 0.3RF for the fourth and fifth segments respectively in model contract “PFTSC” of BR1 to 0.4RF and 0.2RF for the fourth and fifth segments respectively in model contract “DPSC” of BR2. Accordingly, Iraq would recover more of what it would pay to the N/IOCs in remuneration fee for these two segments as compared with those covered by BR1. This, in my view, is a slight improvement, though much less than what I have advocated for earlier.

As the calculation in tables 2 and 3 demonstrates, N/IOCs remuneration fee would in fact be measured in cents rather than in dollars, since Iraq gets-back 51.25% of the remuneration fees it has paid for every additional barrel of oil over-and above the contractually fixed base-line production level/ incremental of the related oilfield.

Moreover, even these fees are subject to further reduction if the N/IOCs fail to attain the Production Plateau Target-PPT specified in the contract, as shall be discussed later under item Performance Factor.

But in comparison with the two model contracts for BR1 and BR2, Alahdab contract with CNPC is the most disadvantageous to Iraq.

From table (4) one can see that the R-factor has four instead of five segments; the lower effect of R-f on the remuneration fee is limited to 50% (as compared to 30% in BR1 and 20% in BR2), and finally the R-f effects on (reduction in) remuneration fee in the last three segments are lower than the other two model contracts.

8-Administrative overhead charges

These are based on one percent (1%) of “Petroleum Costs” and “Supplementary Costs” incurred, and shall be shared equally between Contractor and ROC under PFTSC, but such sharing occurs from the date of transfer of operatorship under DPSC. The corresponding percentage for Alahdab is (2%), adding further disadvantage of Alahdab deal.

If these charges were subject to the CIT then Iraq would recover back some 35% of what it pays to the IOCs of such charges. This, however, depends on the application of the new CIT Law 19 of 2010, referred to earlier.

9-Stabilisation clauses,

The contract provides protection from any “change to the Law,..., or by revocation, modification, or non renewal of any approvals, consents or exemptions granted to Contractor, ..., in order to maintain contractor's financial interests under this Contract reasonably unchanged.”

This is stabilization or pre-emptive regulatory capture clause and could have recourse effects with substantial financial impacts on the Iraqi interests. The application of this clause can best

be illustrated by Alahdab contract with regard to the CIT mentioned above. If the new CIT Law applies to this contract and CNPC pays the extra 20% but invoke the stabilisation clause, it could then ask the North Oil Company-NOC for reimbursement.

With contract duration of 20+ years any government decision or legal instrument over this long period could affect the financial interest of the contractor one way or the other.

Therefore, the final cost of the contract depends entirely on the number and magnitude of claims that could be made by the contractor and the outcome of, eventually, the arbitration process. The expression 'reasonably unchanged' is rather vague, open-ended and lacks precision and thus requires further qualifications. Furthermore, this implies that MoO has acted on behalf of other ministries and even the legislative authority by providing exemptions from any future laws.

10- Baseline Production (BLP)

BLP is important factor for deciding the aggregate of remuneration fee paid by Iraq. For BR1 oilfields N/IOCs made their bid and calculation taken into consideration the Initial Production Rate-IPR provided to them by the ministry. But since the fields offered are already producing fields thus production rate at the time of signing the contract could be higher or lower than the IPR. Naturally, the Iraqi side tends to tilt towards the rate at or close to the date of contract signing, while the N/IOCs could stick to the IPR. Good negotiation efforts were needed to reach consensus on the BLP. At the subsequent years the contract provides specific formula for BLP declining at 5% per annum calculate quarterly.

For oilfields covered by BR2 the matter is much easier since these are green-oilfields, and the level of commercial production was fixed in each contract from the start. Also no BLP was needed for BR3 gas fields.

11- Cost Recovery and RF Payments: Commencement and Caps

Many factors have to be considered in this regard: payment caps, type of cost, interest rate for unpaid entitlements, and condition for commencement of cost recovery and RF payment.

N/IOCs are entitled to recover their cost and fees, including the carried share of the state partner, and receive their remuneration fees according to the provisions of their related contracts. The four contracts governing the deals under consideration are not unified on these matters. Some of the provisions are the same and applicable to all while others are different. The major differences are addressed below.

For Alahdab, fee payment is subject to 100% of deemed revenues of the production in that particular quarter. Unpaid fees carry 'LIBOR+3' interest rate per annum. Payment commencement was not clearly stated, however it is assumed that it is linked to attaining commercial production of 25,000bd referred to in its contract.

For model contract of BR1, 'Service Fees' (comprising petroleum cost and remuneration fee) due to contractor are paid without interest, and the payable amount is limited to (50%) of the deemed revenues of the Incremental Production, while 'Supplementary Fees' are paid to the extent of (10%) of the deemed revenues. Unpaid supplementary cost/fees bears interest at LIBOR+1 pa.

Remuneration fees and petroleum cost are payable only after Net Production Rate-NPR reaches 10% above the Initial Production Rate, with petroleum cost has priority before remuneration fees in case the total payable amount exceeds the allowable cap.

The same provisions apply for model contract of BR2 but each contract has its own First Commercial Production-FCP level, which decides payment commencement (see tables 4).

For the gas fields under BR3 the commencement of cost recovery and RF is subject to attaining 25% of the specified plateau targets in the related contracts, other conditions remain effectively the same as for BR2.

The advantages for Iraq could be many: first, for each field the payment of development cost and RF does not occur unless specific production threshold has been reached and sustained for specific period of time. This implies the availability of oil and gas revenues to cater for the invested capital by and service fees of the contracted IOCs. Also this early recovery of payment mechanism provides incentives for the IOCs to expedite efforts to reach such threshold. Second, except for Alahdab, the maximum percentage of these revenues to be earmarked for IOCs is 60%, leaving for Iraq the remaining 40%, as a minimum due to R-f effects plus 51.25% of the remuneration fees (as discussed above)

The possible disadvantages could be that once IOCs reach the minimum production threshold they would limit their investment to the generated revenues from that level of production. The contract contains actually many precautions against such tendency including the 'Performance Factor', which is discussed hereunder. Another disadvantage could be the use of technically unsustainable or even harmful methods to boost production to threshold levels, as reported on ENI regarding Zubair oilfield.

Prioritisation of recovering petroleum cost is advantageous to the IOCs since unpaid petroleum cost bears no interest, and therefore it is financially rewarding to recover such cost within the allowable payment cap and reinvestment them in the project. Unlike petroleum cost, the supplementary fees/costs are interest bearing, and therefore generate income as long as they are unpaid. Finally, giving priority to petroleum cost before remuneration fee is also for the interest of the IOCs since 51.25% of these remuneration fees would be recovered back by Iraq due to CIT and State partner share, as discussed above.

The early payment possibility had contributed to enhance the return on investment (and the Internal Rate of Return-IRR) and considered one of the attractions of the fiscal regime of the model contracts for the IOCs.

Many statements made by senior people and advisors with BP, Lukoil, Statoil, and others have made specific reference to this fact. Furthermore, The MoO confirms in a direct letter (dated 28 February 2010) that the threshold for early recovery of cost is practically achievable during the first year for each of the brown oilfields.

In fact the IOCs can recover much higher investment if they decide to invest more than the MEO to expedite the development efforts of the related oilfield. The ERPC can then re-invested to attain higher production leading to the designated PPT. In Rumaila for example, BP/CNPC had agreed with SOC on 2010' work program with a budget of \$1.7 billion leading into additional production of 150,000-200,000 by the end of the year. Such accelerated development, as compared with the contracted MEO over 3years, would allow BP/CNPC to generate much more revenues to finance the gradual expansion to reach the plateau target on or before the envisaged date.

The term "**deemed revenues**" is important provision in the model contracts for two main reasons. The first is related to the payment caps as explained above, and the second is the payment of the contractors' dues (petroleum and supplementary costs and remuneration fees) in kind, as far as it is permitted according to the relevant provisions of the contracts.

On the operational level, estimation of deemed revenues is a function of petroleum valuation and price of the related crude. Assuming the qualitative aspects of the produced crude- in

terms of API, sulfur contents, etc- are given then higher international oil prices leads to higher 'deemed revenues' and higher allowable payment under the stated caps, and vice versa at lower oil prices. Consequently, higher oil prices expedite the application of R-f leading to lower remuneration fee, and lower number of 'barrels of oil' if the contractors chose to receive their dues in kind.

The contracts offer the possibility for the IOCs to take part in the process of estimating the deemed revenues, and thus get involved in the work of the State Organization for Marketing Oil- SOMO regarding the pricing of the related crude. This could constitute an infringement on sovereignty and create corruption-enabling environment.

On the other hand SOMO is the "State partner" in the Rumaila and Alahdab contracts. This could create a conflict of interest problem on the part of SOMO, requiring effective comprehensive and independent good governance to ensure and protect the interest of Iraq.

12- Performance Factor.

The actual payable remuneration fee could be reduced even further in accordance with the performance factor formula if the net addition in production is lower than the contracted Production Plateau Target-PPT. The inclusion of this condition in the contract was to prevent N/IOCs from inflating the PPT with the purpose of gaining higher score to outbid other competitors and crowd-them out during bidding process. Hence, performance factor is applicable only during the production plateau period-PPP.

13- Production Curtailment

All concluded contracts are based on 'take or pay'-TOP principle, implying that all risks are and would be shouldered by Iraq. This is clearly specified in the sub-articles regarding production curtailment in two cases: (i) Government imposed production curtailment; and (ii) where normal production is curtailed or suspended through failure of Transporter to receive the same at the transfer point through no fault of the operator or contractor.

The first case has implications regarding for example OPEC quota requirements and related obligations, while the second could be related to demand conditions, infrastructure limitations or circumstantial conditions such as security etc.

Contractually, there are few consequences and conditions pertaining to production curtailment aiming at protecting IOCs' interest.

First, production curtailment should be applied equally and proportionally to all IOCs to ensure equal burden-sharing, none-discriminatory (*parri passu*) treatment. However, in reality this could face efficiency related problem due to different qualities of crude produced by all fields, market premium or surcharges, phases of field development, variations among remuneration fees, etc.

Second, IOCs must be compensated for such production curtailment either now or later, in application of TOP-N/L principle mentioned above. Implying that Iraq has to pay compensation either now (N) to cover the 'lost' remuneration fees due to production suspension or later (L) by prolonging contract period for the duration of suspension period. Third, during production curtailment period under either case, performance factor would cease to apply.

However, an argument was made that these conditions constitute intrusion on sovereignty, and many of such conditions could fall under the provision of *force majeure*.

14- Conditional Rights for IOCs on Additional Possibilities

For each contracted field the related IOCs do have the rights for further business opportunities.

Contractually, there are two economically significant additional possibilities: the first is related to the ‘discovered but undeveloped reservoirs’, which the contracting IOCs may develop and produce under the same contract but shall be subject to a separately agreed remuneration fees. This should be done within 6 years from the approval date of the Enhanced Redevelopment Plan, or 9 years from effective date. The second is related to ‘explore for and develop the undiscovered potential reservoirs’, which IOCs have the ‘right’ to negotiate a new agreement within 6 years from the effective date of the contract.

The significance of the first possibility is in its deadline, which falls in the middle of the PPP. If both parties agree on new remuneration fee the development of these discovered reservoirs proceeds and thus new level of production emerges. Since the development of these new reservoirs will be governed by the same contract, then the maximum duration IOCs could have to utilise them would be confined to 15 years only, assuming 5 years extension of the contract original duration is granted.

As for the second possibility, it occurs at the commencement of the PPP. If the contracting parties agree on new ‘separate agreement’, this could have totally different provisions leading to new production target and probably longer contract duration.

In case the contracting parties fail to reach agreement or the related IOCs fail to meet the stated conditions, the Iraqi contracting regional oil company ROC- can invoke the relinquishment clause of the contract.

During the negotiation period leading to the development of the Model contracts of the bid rounds, IOCs managed to gain the above two additional possibilities, though MoO opposed similar requests during 2007/8 discussions on the technical support contracts.

The first to grab one of these additional opportunities is West Qurna 1 consortium- ExxonMobil and Shell. Few months after the effective date of their contract ExxonMobil and Shell agreed with MoO to include the discovered, undeveloped formations of Yamama, Khasib, S’adi and few smaller reservoirs to their contract. This would add 0.5 mbd, for a \$2/b in RF, bringing WQ1 PPT to 2.825mbd with a RF weighted average of \$1.92/b.

Available information indicates that MoO had agreed to the above addition to WQ1 contract, without getting the approval from the council of ministers or disclosing relevant and full information on this matter and how to integrate the addition to the original contract, and why MoO accepted higher RF. Moreover, how the development of the added formations and reservoirs would be treated since they are structurally different from the original contract, etc.

15- Training, Technology and Scholarship Fund- TTSF.

All concluded contracts oblige IOCs to allocate, as a minimum, an annual amount for this TTSF for the durations of the contract, which is 20 years + possibly 5 years. The article concerning the Fund is identical in all contracts.

Again the obligations are different depending on the contract itself. For Alahdab the annual amount for TTSF is \$200,000, for contracts under BR1 and BR 2 it is five million US Dollars, and finally for the gas fields under RB3 it is \$1 million annually. The payment to the Fund is not recoverable, as cost but it would be considered for the purpose of R-f application. Annually, IOCs should pay to this Fund a total of \$58.2 million. The amount paid by IOCs to the Fund is not totally cost free to Iraq. Since the amount paid to the Fund is included in the expenses for R-f application, then this would allow IOCs to recover the amount paid through higher R-f value. Oilfield with higher daily production rate could, due to economies of scale, recover higher proportion of the paid amount than the fields with lower production rate. Also, IOCs may ‘factor-in’ what they pay to the Fund, and thus recover part paid amount. Finally,

some of the needed services covered by the related article might be provided by the IOCs themselves, hence the possibility of ‘transfer pricing’ is very obvious and highly probable.

Considering the above and recognising the critical human capacity development the MoO and all involved IOCs have to agree and establish the necessary modalities on how to manage and utilise the Fund.

Utilization of Natural Gas

In addition to the three gas fields contracted under bid round three, there will be significant associated gas resulting from the development of the oilfields covered by the first and second bid rounds.

Associated gas, beyond the operators use, from the oilfields of the first bid round will be utilized in accordance with the Basra Gas Company-BGC, which is JV between SGC, Shell and Mitsubishi (as shall be elaborated next).

As for the second bid round, the contracting consortiums are contractually responsible for the utilization of the associated gas from these oilfields.

The Basra Gas Company-BGC

The three oilfields, which the BGC agreement is about are Rumaila, West Qurna 1 and Zubiar, currently generate at least 1.1 billion standard cubic feet per day (scf/d) of gas, more than 700 million scf/d of which is flared.

The market value of the gas lost to flaring every day is about \$5 million, and the economics of BGC is primarily about utilization of the associated gas that would be come on stream due to the expansion of oil production from these three oilfields over the coming 20-25 years. The followings are the main economic parameters of BGC.

Capital equity shares of the JV is divided as follows: 51% SGC and 49% Shell/Mitsubishi (44%/5%)

The Daily capacity: 2000msqf

Investment Cost (capex) estimated at \$17200 million US comprising Refurbishment and construction of gas installations of \$12800 million US and LNG unit 4400 m\$

SGC financial obligations:

SGC assets were estimated at 1524 m\$ will be deducted from the SGC capital contribution. 3700 m\$ will be financed from the annual budget in the first three years.

The remaining amount will be financed from the revenues of the JV.

Revenue profiles:

SGC Net Revenues over the project period: \$36555m (\$18851m net cash flow+\$17704 m from sale of dry gas to BGC)

Iraq’ gross revenues: 58636 m\$ (SGC 36555 m\$+22081 taxes and SOMO marketing fees)

Iraq’ net revenues: 31138m\$ (58636m\$-27498 gas price subsidies in domestic market)

It must be stated that many Iraqi oil experts, including this author, made serious and thorough assessment of BGC agreements, its weaknesses and flaws and possible ramifications on the Iraqi interests.

Bid Round Four: Exploration Blocks

The ministry of oil began the process of holding this round for more than a year. There will be 12 oil and gas exploration blocks (please see the PowerPoint presentation on this item).

International interests in this bid round positive as 50 IOCs applied for pre-qualification and 46 of them were qualified.

The model contract for these blocks is similar to those used for the previous three bid rounds. However, there are serious differences that are introduced to the contracts of the exploration blocks:

- Province' Infrastructure Fund: Companies pay 10% of annual approved budget. (Petroleum Costs) Plus early Province' participation;
- Training, Technology and Scholarship Fund: \$1 m/y
- R-factor: Better than 3BRs- 100%, 60%, 40%, 30% & 20%
- Contract periods: De-mining period (1Y); Exploration Period (4+2Ys); Development Period (20Ys)
- A seven-year holding period applies before developing oil discovery, subject to certain provisions. So why the hurry?
- State Partner(s): Initial OEC then to another when revenues exceed expenditures.
- No (PF) since no PPT as bidding parameter
- Payment Caps (after First Commercial Production): PC at 50% DR: RF at 20% of remaining deemed revenues;
- RF linkage to Recoverable Cost to avoid cost exaggeration!

The actual bidding event has been postponed many times: some suggest problems with the components of the model contract, while others attribute it to logistical and domestic political conditions.

The main structure of KRG PSCs

All PSCs concluded by KRG has similar structure with very minor differences among some of these contracts. The general structure includes the following components:

- 1- The government Royalty at 10% of the produced "Operational Oil";
- 2- The remaining "Net Available Oil" is divided at 40% for "Cost Recovery Oil" and 60% for "Profit Oil".
- 3- The Profit Oil split between KRG and the "Operator" depends on the value of the "R-factor: cumulative revenue/cumulative cost". When R-f is less than 2 the split is 30% for operator and 70% for KRG, and when it reaches 2 and beyond the split becomes 15% and 85% respectively;
- 4- The "Operator" share in the "Profit Oil" split to 20% for KRG and 80% to the IOCs.

The comparison between the above terms of the KRG PSCs and those related to the service contracts concluded by the federal ministry of oil would indicates that the later is more to the interests of the Iraqi people, as mandated by the Constitution, especially at higher oil prices. The same applies to issues of transparency, integrity of the awarding process and the compliance to competitiveness. This is discussed next.

IV- Transparency of bidding and contracting process

The federal government bid rounds

All the four bid rounds done by the federal ministry of oil followed similar procedure comprising the following steps in the bidding process of each bid round:

- 1- Announcement of the oilfields offered for bidding;
- 2- Request the IOCs to apply for qualification;
- 3- Specify the parameters for IOCs qualification and announcement of the qualified IOCs;
- 4- Prepare a profile and data package for each offered field, and sale such information to the interested pre-qualified IOCs;
- 5- Hold workshops for the IOCs to discuss the data package, the draft of the model contract and review the bidding process and bidding parameters. These workshops are usually open for the media and attended by senior officials from the ministry;
- 6- All the bidding events were held in Baghdad with full publicity, TV coverage and the bids are made, opened and announced in public with full competitiveness.
- 7- Each contract has to be approved by the Council of Ministers.

The above indicates to good degree of opines and transparency of the process. However, two important aspects could undermine such transparency:

- 1- The actual signed contracts are not yet available for public disclosure, and this has generated doubt and suspicion that the model contracts have been amended behind closed doors in favor of the IOCs. Example of West Qurna 1 contract was cited by which the plateau target and remuneration fee were adjusted upward beyond what was announced during the time of awarding the contract to ExxonMobil/Shell.
- 2- All these signed contracts became effective without the approval of the parliament, and this could generate serious legality issue especially in the absence of the oil and gas law. However, the minister of oil made frequent submissions before the parliament pertaining to the bid rounds, the nature of the signed contracts and the premises, which the Ministry uses to justify the legality of its actions.

KRG PSCs

Unlike the service contracts of the federal ministry of oil, all KRG PSCs were concluded behind closed doors on bilateral levels, without any competition, prior announcements, and in a complete secrecy. In this respect consideration of opines and transparency is almost absent. However, KRG disclosed all signed PSCs in two phases:

- 1- Disclosed two contracts due to two events: the known “Oslo bourse case”, which indicates to serious financial irregularities involving DNO and KRG minister that led to economic crime investigation in Norway, and the London arbitration involving DNO contract with KRG;
- 2- The remaining contracts were posted on the public domain in October 2011.

BGC- Lack of transparency and competitiveness

Shell has originated the proposal for this agreement and submitted it to the Ministry of Oil on 22 January 2008. The Head of Agreement- HoA was signed and entered into force on 22 September that year, has one-year duration extendable automatically by additional six months to complete the requirement for the Joint Venture envisaged by the agreement, and it constitutes the basis governing future cooperation between them.

After the HoA was leaked and became known many oil experts examined it thoroughly and identified its flaws and weaknesses through many publications and commentaries. .

Lack of competitiveness and transparency was highlighted strongly. Though the Ministry claimed it had invited few international companies but they declined, leaving the ministry with no option but to conclude this HoA with shell. However, the views raised against HoA had contributed to improve its terms for the benefit of Iraq.

The negotiations on the final agreements establishing the joint venture-BGC had lasted more than three years until the BGC was finally signed in November 2011 and later approved by the Cabinet.

The Revenue issues in the Constitution

The Iraqi constitution makes specific three references to the issue of revenues. Article 106 calls to establish, by law, public commission to “audit and appropriate federal revenues”. Also Article 112 obliges the distribution of oil and gas revenues “in a fair manner in proportion to the population distribution in all parts of the country, specifying an allotment for a specified period for the damaged regions which were unjustly deprived of them by the former regime, and the regions that were damaged afterwards in a way that ensures balanced development in different areas of the country, and this shall be regulated by a law.” Finally, Article 121: asserts that “Regions and governorates shall be allocated an equitable share of the national revenues sufficient to discharge their responsibilities and duties, but having regard to their resources, needs, and the percentage of their population.”

The above provisions have created strong linkage between oil and gas law and revenue sharing law, and this in turn extend the linkage to three other laws, namely the Ministry of Oil law, INOC law and the Federal Revenues Public Commission law.

This package of “five laws” has created complex situation that had prevented the enactment of any of them.

The Provincial Law 21 of 2008

This law empowers the Province Council with some authority that could have implications on revenues.

According to “Powers of the Province Council” outlined in Article 7 (three) the Council has the power to enact local legislations, ordinances, directives needed to organize the administrative and fiscal affairs to facilitate the Council performing its functions in accordance with the principle of de-centralized administration provided this does not violate the Constitution and Federal laws.

However, many Provincial Councils complained about the delay and bureaucratic procedures in providing them with the funds from the central government, and this had impacted the performance of their functions. Accordingly, there could be new directives that might introduce changes in allocation of funding from some sectoral ministries to local councils. But this might be linked to the resolution of the current domestic political impasse of the coalition government.

V-The Challenges of Managing the Plenty: Annual budget, national development requirements and revenues allocation

During the last three years 2009-2011 Iraq exported 2177 million barrels of oil generating a total of more than 176.6 billion dollars in oil export revenues. The increase in oil revenues

was mainly due to the increase in international oil prices more than increase in the volume of oil exports. (See table 5)

Average oil prices increased from 58.9\$/b in 2009, to 75.6\$/b in 2010 then to 105\$/b in 2011. On the other hand average daily oil export was at 1913 b/d in 2009 that went down to 1891 b/d in 2010 before it increase to reach 2166b/d in 2011.

The increase in oil prices in 2011 had generated enough revenues to offset the deficit anticipated in the annual state budget for that year.

2011 budget was \$82.6 billion, with deficit \$13 billion, based on an average oil price of \$76.50/b and 2.2 million bpd in crude exports. In reality oil export alone has generated in the same year a total of \$82.988 billion, due mainly to higher oil prices of 105\$/b.

The increase in oil revenues, due to higher oil prices and increase in the quantity of total oil export or both, is bound to have its effect on the funding of the national development plan. The national development plan 2010/14 expects total revenues to rang between \$334 billions (option 1) and \$382 billions (option2) over the plan's 5 years period. On average, and as expected, oil export revenues contribute to more than 92% of total planed revenues. From the plan data it appears that the two options were based on different estimations of oil price. Option 1 assumes \$60/b for 2010, \$63/b for 2011 and \$68/b for years 2012 to 2014. Option 2 assumes increasing oil prices of \$60/b, \$63/b, \$77/b, \$ 83/b and \$90/b for the years 2010 to 2014 respectively. NDP calculations of annual oil production and export revenues were based on 365 days a year.

The NDP allocates 30 % of total annual budgets revenues for investment purposes while the rest would be devoted for ordinary/consumption purposes. Total investment requirement was estimated to range between \$230.2 billion (option 1), of which \$130.2 billion would come from private sector investors including FDIs, and \$186.1 billion (option 2 applicable from 2012 only, implying the allocations for 2010and 2011 be added to the amount of this option), of which \$71.5 billion comes from local and foreign private investors.

The NDP allocates investment as follows:

70.5% for all economic sectors (agriculture; industry (including oil, energy and manufacturing industries; transport and communication; housing, construction and services; education);
12.5% for Regions and Provinces Development Program;
17.0% for KRG.

NDP assumes oil production to reach 4.5 mbd in 2014, oil exports are expected to increase from 2.15 mbd in 2010 to 3.1 mbd in 2014, and the remaining would be allocated for refining and other domestic needs.

Accepting NDP estimations at their face value with Iraq total production of ca. 2.5 mbd at end 2009 then the incremental in production capacity from all Iraqi oilfields, including those in the KRG, by 2014 would be 2 mbd.

But year 2014 is significant landmark in the development of the oilfields under the 12 contracts. Total production, at 2014, from these oilfields alone would be 7.82 mbd, meaning an incremental production capacity of 6.18 mbd if the development of these oilfields goes according to the contracts.

Two different implications should be considered from the discrepancy between the NDP assumed oil production and revenue requirements on one side and the expected results from contracts' fulfilment on the other. NDP figures would enforce and give credence to the majority of opinion doubting the production targets of these contracts, as mentioned earlier.

But on the other hand, if the contracts were fully through delivering an incremental production capacity of 6.18 mbd, with 4.18 mbd over and above the incremental capacity assumed by the NDP. Such a divergence between what was adopted in the NDP and what was envisaged under the concluded contracts would undoubtedly have significant effects. **Over the period 2010/14, gross oil export revenues from these 12 contracts could range between \$425 billion and \$849 billion with \$50 and \$100 a barrel respectively.**

Comparing these periodic expected gross revenues from the 12 oil contracts with the NDP revenue requirements would result into significant financial surpluses even at this interim phase of development before reaching the plateau production levels.

As mentioned earlier each contract has duration of 20 years with a possibility of 5 years extension. The total additional/ incremental production capacity at plateau production would be 10.2 mbd, and production from other fields and Kurdistan would make total production reach 13.0mbd.

When attained, this production level is significant and has very serious ramifications whether it is fully or partially utilised. In this regards, Dr Shahrastani asserts, Iraq's oil policy would aim to '[p]ut in place a production ceiling aimed at maximizing revenues.' However, what is needed is to move from the generalities to the specifics by deciding what level of production ceiling to maintain what level of revenues under which situation, at which oil price and when such decision would be taken, by whom and under which authority and mandate.

VI- Concluding remarks

The fiscal regime of the model contracts has its advantages for both Iraq and the N/IOCs, and also disadvantages especially for Iraq.

Iraq, through the MoO, managed to pay reasonable "remuneration fee" as service cost for the fields offered under the three bid rounds. However, this should not cause complacency. IOCs through various means, such as "transfer pricing", "factoring-in", "cost inflating" and "gold-plating" modalities could take in the right hand what they gave in the left one. Probably this is behind the insertion of some sort of linkage between cost and revenues in the model contract for the forthcoming fourth bid round.

Even with these remuneration fees, originally considered by IOCs as very low and unacceptable, the IOCs admitted they are expecting rate of return on investment ranges from 15% to 20%.

Six important factors could contribute to this very good rate of return on investment: first, is the early recovery of invested capital and remuneration fees; second is the economies of scale due to the size of the oilfields, many of which are considered as super-giant; third is related to the low production cost and location advantages; fourth is the long term contractual relationship lasting for more than 20 years; fifth, secure strategic access and security of supplies, which has even more strategic significance for the integrated IOCs and for the states-supported NOCs, and finally, the presence of the conditional exclusive/first rights provides further business opportunities.

There are indications that production plateau targets envisaged under the concluded contracts might not be achievable at the stated pace and time frame. As this is very possible eventuality,

thus has to be addressed seriously, and negotiated solution is needed to protect the interest of the Iraqi side.

Iraqi decision makers have to start from now to expedite the institutional capacity development regarding the fiscal regime to insure good management and oversights of accounting, auditing and verification procedures and to protect the interest of Iraq in all phases of the contractual relationships over the contracts durations. Prompt, effective and efficient utilization of TTSF for the needed institutional capacity development is recommended.

On the other hand the increase in production and export capacities associated with improved international oil prices are bound to have their effects on the financial position pertaining to both annual budget and the national development plan. And considering the volatility of oil prices and the cyclicity of world economy, Iraq has to start formulating policies, institutional and legal frameworks to address the management of flow of revenues to ensure the sustainable development of the country and protect the interest of future generations.

Annex 1

Table (1)

Bid and Final Remuneration Fees for Iraq’s Oil and gas Fields

| Filed | RF Bid by IOCs (\$/b) (\$/boe for gas fields) | Final RF (\$/b) (\$/boe) |
|---------|---|--------------------------|
| Rumaila | BP/CNPC: \$3.99; ExxonMobil/Petronas: \$4.8 | BP/CNPC: \$2.00 |
| West | ExxonMobl/Shell: \$4; CNPC/Petronas/Japex: \$2.6; | ExxonMobl/Shell: |

| | | |
|--------------|---|-------------------------------------|
| Qurna 1 | Total: \$7.5; Lukoil/ConocoPhillips: \$6.49; Repsol/Statoil/Maersk: \$19.3 | \$1.90 |
| Zubair | ENI/Sinopec/Oxy/Kogas: \$4.8; ExxonMobil/Shell/Petronas: \$4.8; CNPC/BP: \$4.09; ONGC/Gazprom/TPAO: \$9.9 | ENI/Oxy/Kogas: \$2.00* |
| Missan | CNOOC/Sinochem: \$21.4 | CNOOC/Sinochem: \$2.30 |
| West Qurna 2 | Petronas/Pertamina/Petrovietnam: \$1.25; Total: \$1.72; BP/CNPC: \$1.65; Lukoil/Statoil: \$1.15 | Lukoil/Statoil: \$1.15 |
| Garraf | TPAO/ONGC: \$2.76; Pertamina: \$7.5 KAZMUNAIGAZ/Kogas/Edison: \$2.55 Petronas/Japex: \$1.49; | Petronas/Japex: \$1.49 |
| Badra | Gazprom/TPAO/Kogas/Petronas: 6 | Gazprom/TPAO/Kogas/Petronas: \$5.00 |
| Najma | Sonangol: \$8.5 | Sonangol: \$6.00 |
| Majnoon | Shell/Petronas: \$1.39; Total/CNPC: \$1.75 | Shell/Petronas: \$1.39 |
| Halfaya | CNPC/Petronas: \$1.40; Statoil/Lukoil: \$1.53; ONGC/TPAO/Oil India: \$1.76; Eni/Sonangol/CNOOC/Kogas/Oxy: \$12.90 | CNPC/Petronas: \$1.40 |
| Qaiyara | Sonangol: \$12.5 | Sonangol: \$5.00 |
| Siba | Kuwait Energy/TPAO: \$7.50; Kazmunaigas: \$16 | Kuwait Energy/TPAO: \$7.50 |
| Mansuriya# | TPAO /Kuwait Energy/Kogas: \$10.00 | TPAO /Kuwait/Kogas Energy: \$7.00 |
| Akkas | Kogas/Kazmunaigas: \$5.50; Total/TPAO: \$19. Edison/Petronas/CNPC/Kogas/TAPO: \$38 (\$8.5)# | Kogas/Kazmunaigas: \$5.50 |

Source and Notes for Table (1): Author's compilation. *: Sinopec was excluded after it was blacklisted by MoO due to its involvement in KRG PSC. #: Both Mansuriya and Akkas gas fields were offered in BR1 of June 2009, the first received no bid while the second had one bid with \$38 against \$8.5 offered by MoO.

Table (2)
R-factor and Remuneration Fees for Bid Round 1

| | | | | | |
|-----------------|--------|----------|------------|---------|-------|
| R-factor | 0<R<1 | 1<R<1.25 | 1.25<R<1.5 | 1.5<R<2 | 2<R |
| RF % | 100%RF | 80%RF | 60%RF | 50%RF | 30%RF |

| | | | | | |
|--|---------|--------|---------|----------|----------|
| Rumaila Oilfield, RF=\$/b | 2.00 | 1.60 | 1.20 | 1.00 | 0.60 |
| N/IOCs share of RF (48.75%) (\$/b) | 0.975 | 0.78 | 0.585 | 0.4875 | 0.2925 |
| BP (50.666%) (\$/b) | 0.494 | 0.3952 | 0.2964 | 0.247 | 0.1482 |
| CNPC (49.333%) (\$/b) | 0.481 | 0.3848 | 0.2886 | 0.2405 | 0.1443 |
| West Qurna1, RF=\$/b | 1.9 | 1.52 | 1.14 | 0.95 | 0.57 |
| IOCs share of RF (48.75%) (\$/b) | 0.92625 | 0.741 | 0.55575 | 0.463125 | 0.277875 |
| ExxonMobil (80%) (\$/b) | 0.741 | 0.5928 | 0.4446 | 0.3705 | 0.2223 |
| Shell (20%) (\$/b) | 0.18525 | 0.1482 | 0.11115 | 0.092625 | 0.055575 |
| Zubair Oilfield, RF=\$/b | 2.00 | 1.60 | 1.20 | 1.00 | 0.60 |
| N/IOCs share of RF (48.75%) (\$/b) | 0.975 | 0.78 | 0.585 | 0.4875 | 0.2925 |
| ENI (43.747%) (\$/b)* | 0.427 | 0.341 | 0.256 | 0.2132 | 0.1280 |
| Oxy (31.253%) (\$/b)* | 0.305 | 0.244 | 0.183 | 0.1524 | 0.0914 |
| Kogas (25%) (\$/b)* | 0.243 | 0.195 | 0.146 | 0.1219 | 0.0731 |
| Missa Oilfields^a RF=\$/b | 2.3 | 1.84 | 1.38 | 1.15 | 0.69 |
| N/IOCs share of RF (48.75%) (\$/b) | 1.121 | 0.897 | 0.673 | 0.561 | 0.336 |
| CNOOC (85%) (\$/b) | 0.953 | 0.762 | 0.572 | 0.477 | 0.286 |
| TAPO (15%) (\$/b) | 0.168 | 0.135 | 0.101 | 0.084 | 0.050 |

Notes on Table (2): Author's compilation and calculation. * : Originally, the composition of the consortium was ENI 35%, Sinopec 20%, Oxy 25% and Kogas 20%. The 20% share of the disqualified Sinopec, due to its involvement in the KRG oil contracts, was distributed among the remaining three partners. a: China's Sinochem was originally partnered with CNOOC in an unsuccessful bid for the three oilfields in June 2009 first bid round, requesting \$21.4 remuneration fee. The contract was signed on 17 May 2010 after CNOOC and TAPO accepted MoO terms.

Table (3)
R-factor and Remuneration Fees for Bid Round 2

| | | | | | |
|-----------------|--------|----------|------------|---------|-------|
| R-Factor | 0<R<1 | 1<R<1.25 | 1.25<R<1.5 | 1.5<R<2 | 2<R |
| RF % | 100%RF | 80%RF | 60%RF | 40%RF | 20%RF |

| | | | | | | |
|------------------------------------|---------|--------|--------|--------|--------|--------|
| West Qurna2 | RF \$/b | 1.15 | 0.92 | 0.69 | 0.46 | 0.23 |
| N/IOCs share of RF (48.75%)(\$/b) | | 0.56 | 0.4485 | 0.3364 | 0.2243 | 0.1121 |
| Lukoil (75%) (\$/b) | | 0.42 | 0.3364 | 0.2523 | 0.1682 | 0.0841 |
| Statoil (25 %) (\$/b)* | | 0.14 | 0.1121 | 0.0841 | 0.0561 | 0.0280 |
| Majnoon | RF \$/b | 1.39 | 1.112 | 0.834 | 0.556 | 0.278 |
| N/IOCs share of RF (48.75%) (\$/b) | | 0.6776 | 0.5421 | 0.4066 | 0.2711 | 0.1355 |
| Shell (60%) (\$/b) | | 0.4066 | 0.3253 | 0.2440 | 0.1627 | 0.0813 |
| PETRONAS (40%) (\$/b) | | 0.2710 | 0.2168 | 0.1626 | 0.1084 | 0.0542 |
| Halfaya | RF \$/b | 1.40 | 1.12 | 0.84 | 0.56 | 0.28 |
| N/IOCs share of RF (48.75%) (\$/b) | | 0.6825 | 0.546 | 0.4095 | 0.273 | 0.1365 |
| CNPC (50%) (\$/b) | | 0.3413 | 0.273 | 0.2048 | 0.1365 | 0.0683 |
| PETRONAS (25%) (\$/b) | | 0.1706 | 0.1365 | 0.1024 | 0.069 | 0.0341 |
| Total (25%) (\$/b) | | 0.1706 | 0.1365 | 0.1024 | 0.069 | 0.0341 |
| Garraf | RF \$/b | 1.49 | 1.192 | 0.894 | 0.596 | 0.298 |
| N/IOCs share of RF (48.75%) (\$/b) | | 0.7264 | 0.5811 | 0.4358 | 0.2906 | 0.1453 |
| PETRONAS (60%) (\$/b) | | 0.4358 | 0.3487 | 0.2615 | 0.1744 | 0.0872 |
| Japex (40%) (\$/b) | | 0.2906 | 0.2324 | 0.1743 | 0.1162 | 0.0581 |
| Badra | RF \$/b | 5.50 | 4.4 | 3.3 | 2.2 | 1.1 |
| N/IOCs share of RF (48.75%) (\$/b) | | 2.2813 | 2.145 | 1.6088 | 1.0725 | 0.5363 |
| Gazprom (40%) (\$/b) | | 0.9125 | 0.858 | 0.6435 | 0.429 | 0.2145 |
| Kogas (30%) (\$/b) | | 0.6844 | 0.6435 | 0.4826 | 0.3218 | 0.1609 |
| Petronas (20%) (\$/b) | | 0.4563 | 0.429 | 0.3218 | 0.2145 | 0.1073 |
| TPAO (10%) (\$/b) | | 0.2281 | 0.2145 | 0.1609 | 0.1073 | 0.0536 |
| Qaiyara | RF \$/b | 5.0 | 4.0 | 3.0 | 2.0 | 1.0 |
| N/IOCs share of RF (48.75%) (\$/b) | | 2.4375 | 1.95 | 1.4625 | 0.975 | 0.4875 |
| Sonangol (100%) (\$/b) | | 2.4375 | 1.95 | 1.4625 | 0.975 | 0.4875 |
| Najma | RF \$/b | 6.0 | 4.8 | 3.6 | 2.4 | 1.2 |
| N/IOCs share of RF (48.75%) (\$/b) | | 2.925 | 2.34 | 1.755 | 1.17 | 0.585 |
| Sonangol (100%) (\$/b) | | 2.925 | 2.34 | 1.755 | 1.17 | 0.585 |

Notes on Table (3): Author' compilation and calculation. *: Information indicates that, upon initial signing of the contract, the respective shares of the two IOCs have changed from their original respective shares 85%- 15%. <http://www.upstreamonline.com/live/article202399.ece> Accessed 29 Dec 2009.

Table (4)
R-factor and Remuneration Fees for Alahdab Oilfield

| | | | | |
|----------------|--------|---------|---------|-------|
| R-Factor value | 0<R<1 | 1<R<1.5 | 1.5<R<2 | 2<R |
| RF \$/b | 6 | 5.6 | 5 | 3 |
| RF % | 100%RF | 93.3%RF | 83%RF | 50%RF |

| | | | | |
|-----------------------|-------|------|--------|--------|
| Alahdab | | | | |
| CNPC (75% RF taxable) | 4.5 | 4.2 | 3.75 | 2.25 |
| - RF post 15% CIT | 3.825 | 3.57 | 3.1275 | 1.9125 |
| -RF post 35% CIT | 2.925 | 2.73 | 2.4375 | 1.4625 |

Source for table (4): Author' compilation and calculation based on the contract.

Table 5
Oil Exports and Revenues (total and average)

| | Basrah mb | Basrah \$m | Kirkuk mb | Kirkuk \$m | Total mb | Total \$m | Average \$/B | Average mbd |
|------|--------------|---------------|--------------|---------------|-------------|--------------|-----------------|----------------|
| 2009 | 526 | 31275 | 170 | 10143 | 697 | 41418 | 58,9 | 1,913 |
| 2010 | 539 | 40681 | 150 | 11521 | 690 | 52212 | 75,6 | 1,891 |
| 2011 | 624 | 65330 | 166 | 17658 | 791 | 82988 | 105,0 | 2,166 |

Source for table (5): Author' compilation and calculation based on data from MoO.

Annex 2

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Federal Oil and Gas Law: Viability, Coherence and Functioning Perspectives. Published on MEES, v54, n51, 19 Dec 2011, <http://www.mees.com/en/articles/3496-federal-oil-and-gas-law-viability-coherence-and-functioning-perspectives> Also posted on Iraq Business News <http://www.iraq-businessnews.com/2011/12/20/federal-oil-and-gas-law-viability-coherence-and-functioning-perspectives/>

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http://core.theenergyexchange.co.uk/agile_assets/1516/1620_-_AHMED.pdf ; and MENA 2011 Oil & Gas Conference, organized by Target Exploration, Imperial College, London, UK, 19 & 20 September 2011.

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http://www.europesworld.org/NewEnglish/Home_old/CommunityPosts/tabid/809/PostID/2304/language/en-US/Default.aspx The (pdf) version, recommended, on

<http://www.europesworld.org/Portals/0/Community/AhmedJiyad-IraqsPetroleumContributiontoEuropeanEnergySecurity.pdf>

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