

RAO's NGN Services in the Arab Countries Report

TELECOMMUNICATIONS REGULATORY AUTHORITY (TRA), LEBANON
For AREGNET

2014



Table of Content

- I. Introduction**
- II. Regulatory Framework**
- III. RAO Services**
- IV. Operational aspects**
- V. Conclusion**



The purpose of this project is to benchmark among Arab Countries, the different services offered on NGN networks, their prices and terms and conditions as usually determined in the Reference Access Offer (RAO) issued by the incumbent operator



With the uptake of new technologies and the ever increasing popularity of new bandwidth hungry services, countries are facing more and more an increase in the demand for national bandwidth to deliver the requested data to end users

As a result, nations/incumbent operators have been investing large amounts to develop and install national fiber optic networks as the backbone for national transmission. Considering the sunk costs invested to cover all the country, this kind of network is not usually replicated (except for redundancy purposes) but has a national target in terms of bandwidth capacity so that other operators can rent the needed capacity at wholesale prices.

For a good and knowledgeable comparison, the benchmark has been divided in 3 main parts as listed below:

- 1- Regulatory Framework: this part tackles the main regulatory milestones along with the decision triggers. It aims at highlighting the main steps undertaken to liberalize data markets and the evolution stages of the benchmarked countries
- 2- RAO Services: this part tackles NGN services definition and differentiation parameters such as speed or other specific features
- 3-Operational Aspects: this part tackles the main components of the SLA such as time to respond, access to information, penalties, forecasts etc

TRA Lebanon has launched the benchmark request among AREGNET members and only 4 countries have responded during Year 2013: Oman, Morocco, KSA and Lebanon

Regulatory Framework: main regulatory milestones and decision triggers

Morocco:

Ministerial decision on LLU

Lebanon:

Signature of A MoU between public and private sector for partial LLU

2007

Oman:

Implementation of LLU

2012

Morocco:

Expected full LLU

2006

Morocco:

Implementation of Partial LLU

KSA:

Implementation of LLU & RAO issuance

Lebanon:

Launch of ADSL service for both public and private operators

2009

Oman:

RAO issuance

End
2013

Morocco:

In Morocco, the information provided on the Regulatory Framework is limited to the Local Loop Unbundling. It started in 2006 with a Minister's decision and a partial unbundling in 2007. The full unbundling is expected to be operational by end of 2013. Nothing was mentioned about regulating access and wholesale services on NGN networks

Oman:

As for Morocco, the initial information provided was about Local Loop Unbundling (2009) and Interconnection regulation (2007). An additional document was sent about RAO services (2012) and their tariffs mentioning services like Leased Lines, colocation and Bitstream

KSA:

For KSA, the submitted information shows that they implemented the LLU in 2007. The Reference Offer for Data Access was also issued in 2007 and relates to services like Bitstream and Line Sharing

Lebanon:

In 2006, the Ministry of Telecommunications, and the private sector signed a Memorandum of Understanding (MoU) for partial Local Loop Unbundling. ADSL services were launched on November 2007 by the private and public sectors simultaneously

Connectivity services

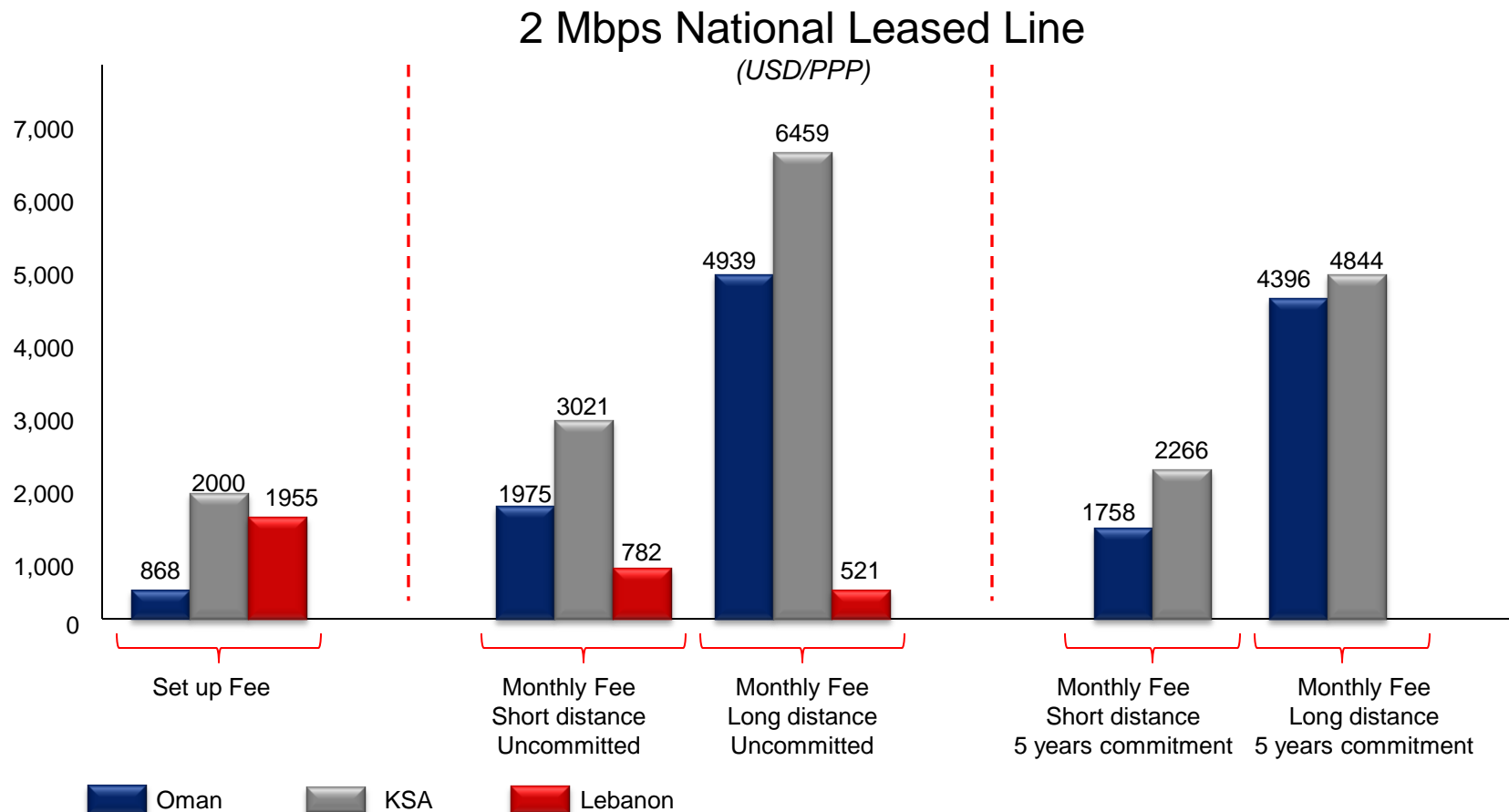
The table below displays the pricing information of submitted RAOs for bundled high capacity national connectivity:

	Set up Fee (USD/PPP)					Monthly Rental Fee (USD/PPP)									
	Within exchange premises		Outside the exchange			Uncommitted						5 years			
	Oman	KSA	Oman	KSA	Lebanon (<20Km)	Oman		KSA		Lebanon		Oman		KSA	
						Short Distance	Long Distance	Short Distance	Long Distance	Short Distance	Long Distance	Short Distance	Long Distance	Short Distance	Long Distance
64Kbps	217	-	217	-	-	564	1,410	-	-	-	-	482	1,202	-	-
512Kbps	-	-	-	-	977	-	-	-	-	391	261	-	-	-	-
1Mbps	-	-	-	-	1,303	-	-	-	-	586	391	-	-	-	-
2Mbps	260	-	868	2,000	1,955	1,975	4,939	3,021	6,459	782	521	1,758	4,396	2,266	4,844
34Mbps Access*	-	-	2,604	-	-	4,904	6,093	-	-	-	-	4,366	5,425	-	-
34Mbps Transport	-	-	2,604	-	-	3,580	10,511	-	-	-	-	3,185	9,357	-	-
155Mbps Access*	-	-	2,604	15,835	-	11,800	9,543	-	-	-	-	10,502	8,493	-	-
155Mbps Transport	-	-	2,604	15,835	-	10,233	20,901	54,278	116,508	-	-	9,105	18,601	39,297	84,352
STM-4	-	-	-	25,003	-	-	-	162,868	349,349	-	-	-	-	138,438	296,947

* Oman uses a specific pricing formula where the final price for 34Mbps and 155Mbps links can be derived by adding 2 Access fees and 1 Transport fee. The Access fee for short distance reflects a connection within the exchange premises while the Long distance reflects a connection up to 3km from the exchange

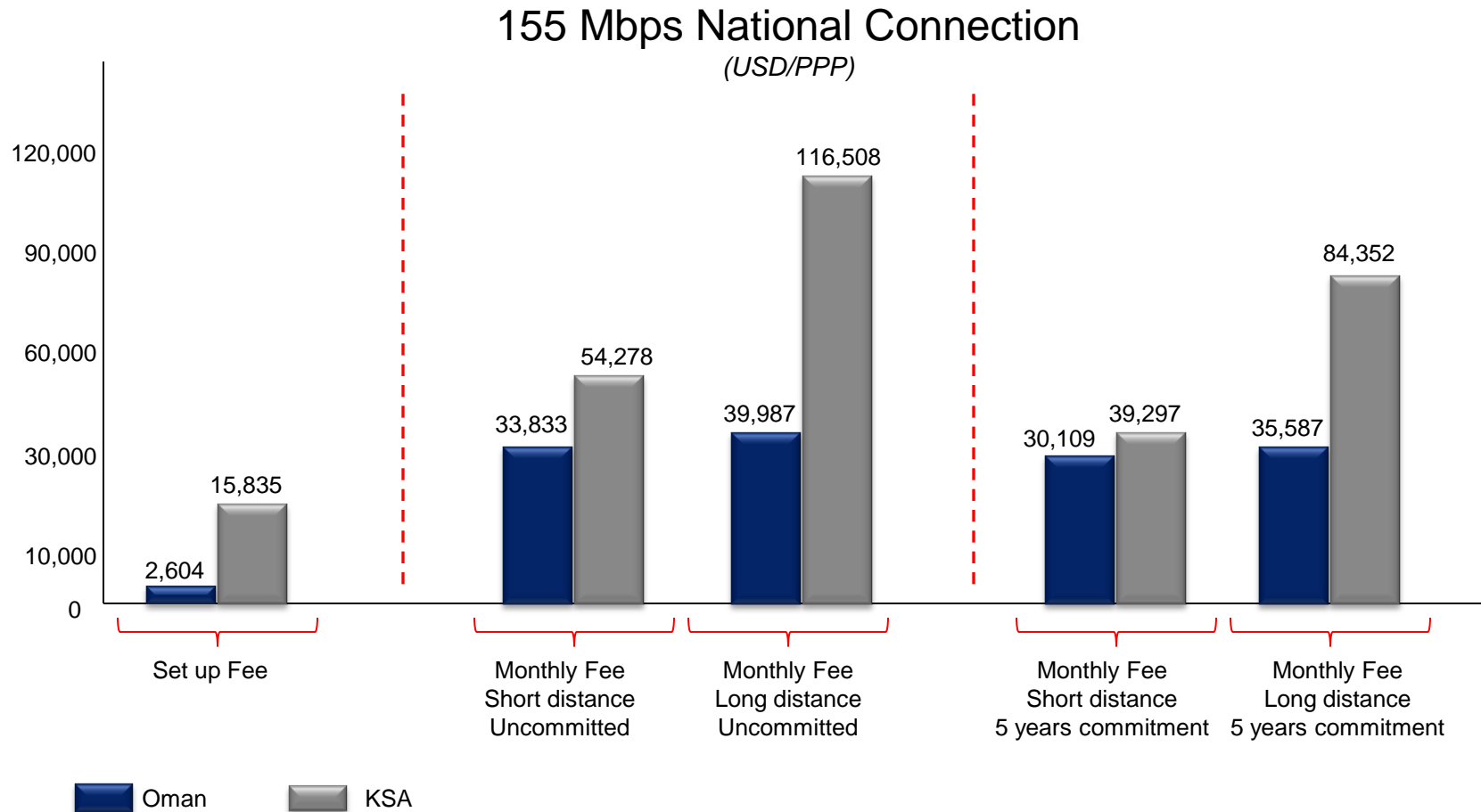
- For comparable speeds, set up fees in Oman are much lower than in KSA
- Uncommitted monthly rental fees are 31% to 191% higher in KSA than Oman. For 5 years commitment contracts KSA prices are 10% to 137% higher than in Oman
- It is worth noting that Oman offers commitment contracts of 24, 60, and 72 months while KSA proposes a minimum of 1 year, or 3 years or 5 years commitments. For KSA, the uncommitted monthly fees represented in the above table have been derived by dividing the yearly fee by 12
- For high speed connectivity, both countries offer very long distance links that can go up to 900 and 1000km
- Lebanon lacks bundled high speed offers, in fact Fiber National Transport Network implementation is in process.

Benchmarking the 2Mbps national leased line service among the respondents shows that, overall, prices in KSA are higher than in Oman and Lebanon



For uncommitted subscriptions, Lebanon's prices are very competitive when compared to KSA and Oman. For 5 years commitment contracts, prices in KSA are very close to the ones observed in Oman

Benchmarking the bundled 155Mbps national link shows that prices in KSA are, overall, higher than in Oman



For 5 years commitment contracts, prices in KSA are very close to the ones observed in Oman for short distance links

Operational Aspects: main SLA components

Oman:

1- Service Level agreement:

The service level is defined and agreed by parties in a separate Service level agreement

No details are specified on the SLA regarding the monitoring hours, the time to respond and the committed service availability levels

2- Forecasts:

Depending on the service type, three types of forecasts can be requested from the customer (knowing that for high capacity orders, only capacity forecast are requested):

1. Traffic forecast
2. Capacity forecast
3. Customer forecast

Forecasts are to be provided for a period of 4 quarters covering 1 year and delivered 10 working days before the start of the quarter

3- Penalties:

- No penalties apply to the Operators for delays in service delivery
- Cancellation of orders by customer prior to the agreed delivery date is subject to a cancellation fee of 12.5% of the value of the order which is calculated as the sum of the first 6 months payment(s)

Note: Morocco did not provide any information on RAO services' operational aspects **and KSA information** only showed DSL Terms & Conditions (No operational info on High Speed National connections).

- Overall, the number of respondents to the questionnaire is very restrained. We have missed the bulk of Arab countries that could have enriched this study by sharing their experience
- Among the 4 respondents, Morocco submitted information focused on the regulatory framework showing Implementation of unbundling access to the local loop. No high speed services, prices or SLA were submitted
- Oman and KSA have provided information on bundled high speed connectivity services showing that, overall, Oman has cheaper prices than KSA (10% to 191%)
- On the SLA level, only Oman provided answers pertaining to high speed National Connections. The related documents show that the SLA contents are not predefined, and that the penalties apply only to the service requester in case of order cancellation

Thank You

For more information please contact us through mail at
carole.hage@tra.gov.lb

