Internet Diffusion: Egypt case study

Tim Kelly, International Telecommunication Union, Arab States Telecom & Internet Summit, Oman, 28-30 May 2001



The views expressed in this presentation are those of the author and do not necessarily reflect the opinions of the ITU or its membership. The author can be contacted by email at: <u>tim.kelly@itu.int</u>.



- The Context
 - ITU Internet diffusion case studies
- The Country
- Telecommunication Sector Structure
- Internet market development
 - History and development
 - ⇒ Pricing
 - Premium rate service
 - ⇒ IP Telephony
- Recommendations



• 2000

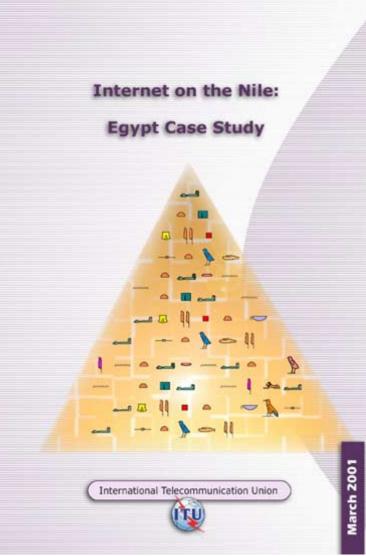
6 studies covering Bolivia, Egypt, Hungary, Nepal, Singapore, Uganda

• 2001

➡ Regional focus on ASEAN

Purpose:

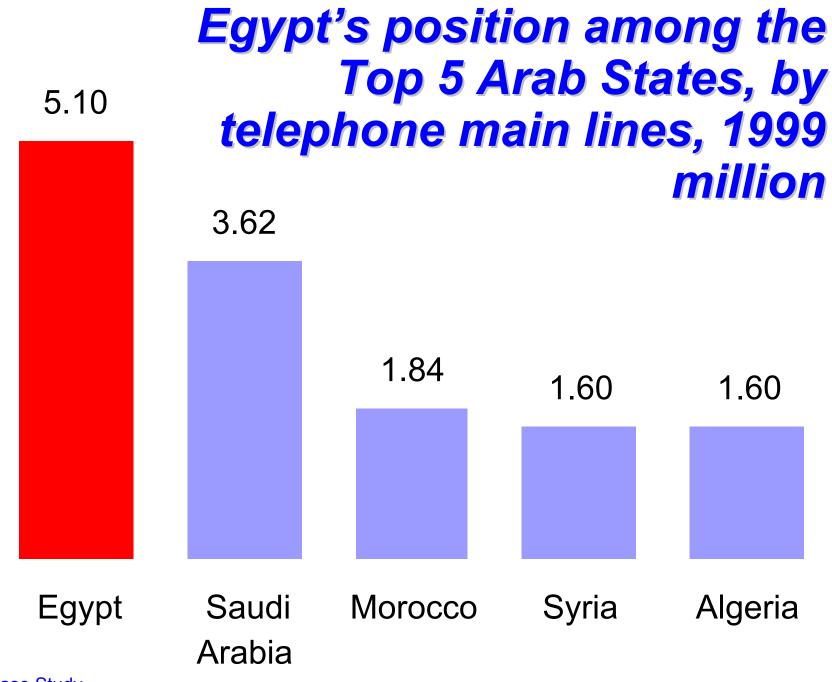
- "To understand the factors that may promote or retard the development of the Internet in different countries"
- www.itu.int/ti/casestudies





		-
Population (1999)	62 million	Mediterranean Sea Damietta Dat Seid
Life expectancy, in years (1998)	66.5	Marsá Matrūh Ţanţā <u>Suez</u> Jordan
Urban population (1999)	45 %	Al Jīzah CAIRO Sinai Sīwah Banī Suwayf, Al Minyā
GDP per capita (1999)	US\$ 1'400	LIBYA Al Sharm Ghardaqah ash Asyūt Būr Shaykh
Households with electricity	90.4 % (in 1996)	Al Khārijah Luxor
Households with a telephone	>20 %	Aswān 0 100 200 km Lake Halā'ib
Level of adult illiteracy (1999)	33.9% (male) 57.2% (fem.)	SUDAN

Sources: ITU, UNDP, World Bank.



Source: Case Study.

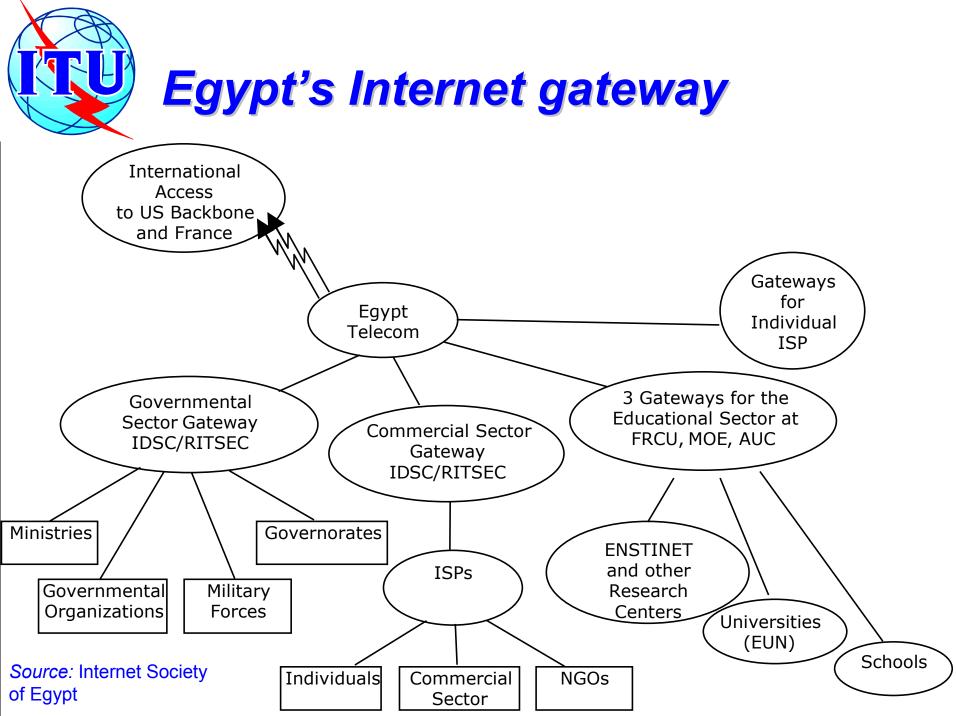
Telecom structure: key dates

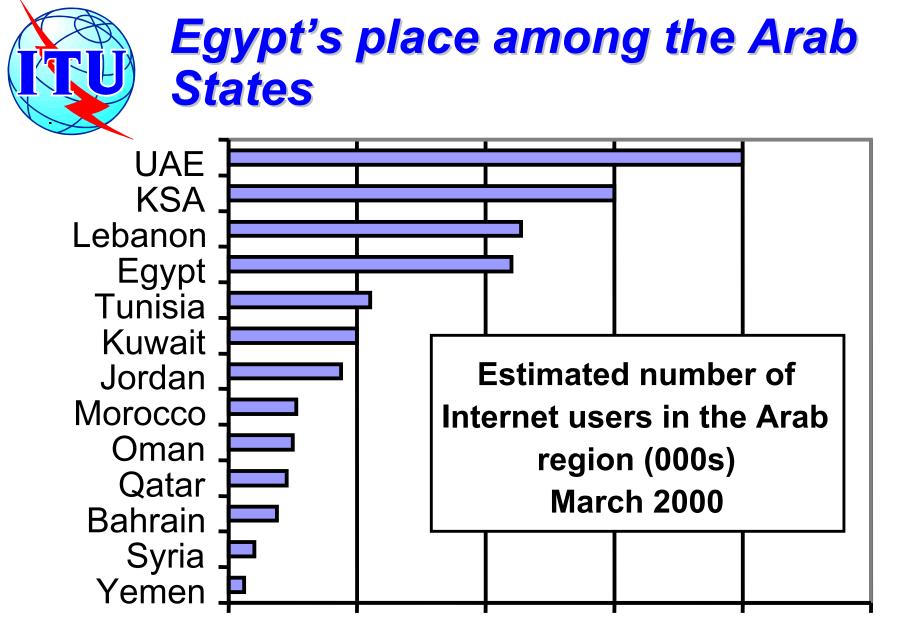
- 1854: first telegraph services, Alexandria
- 1982: Arab Republic of Egypt Telecom Organisation (ARENTO) created
- 19 March 1998: New law establishes Telecom Regulatory Authority (TRA)
- April 1998: ARENTO becomes Telecom Egypt
- 1998: Orascom (MobiNil) & Misrfone (ClickGSM) acquire digital mobilephone licences (GSM)
- 1999: Ministry of Communications and Information Technology (MCIT) created
- 2001: New Law?
- 2001: Partial Privatisation of Telecom Egypt?



Development of the Internet in Egypt

- First recorded use, October 1993, Egyptian Universities Network >> 9.6 kbit/s link
- Sept. 94, International Conference on Population and Development, >> 64 kbit/s link
- IDSC and RITSEC created to provide gateway
- Dec. 95, ISP market liberalised
- Bandwidth grows from 256 kbit/s in Oct '96 to 2 Mbit/s in April '99 to 26 Mbit/s Oct '99
- While Telecom Egypt still holds international backbone monopoly, a new market entrant, Nile Online, is providing a national backbone network
- 60 ISPs active by May 2000

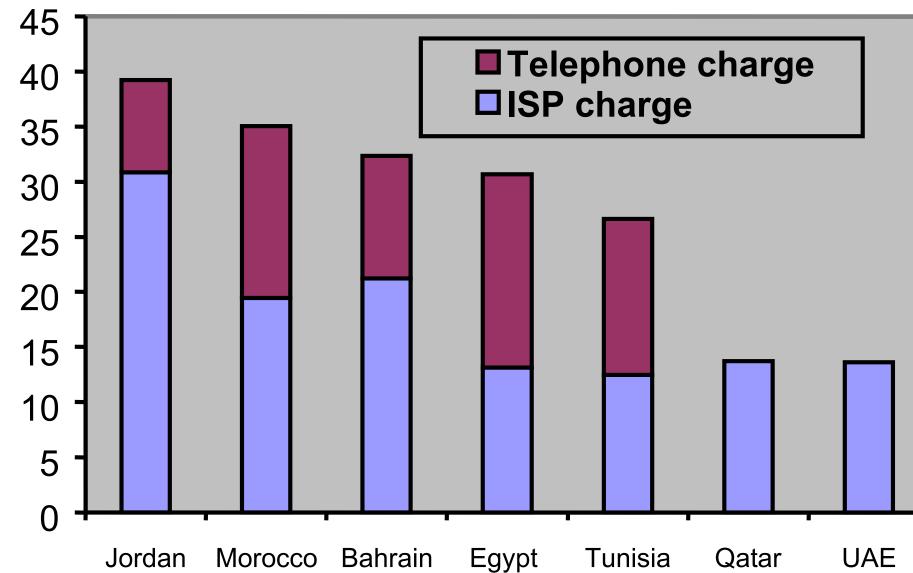




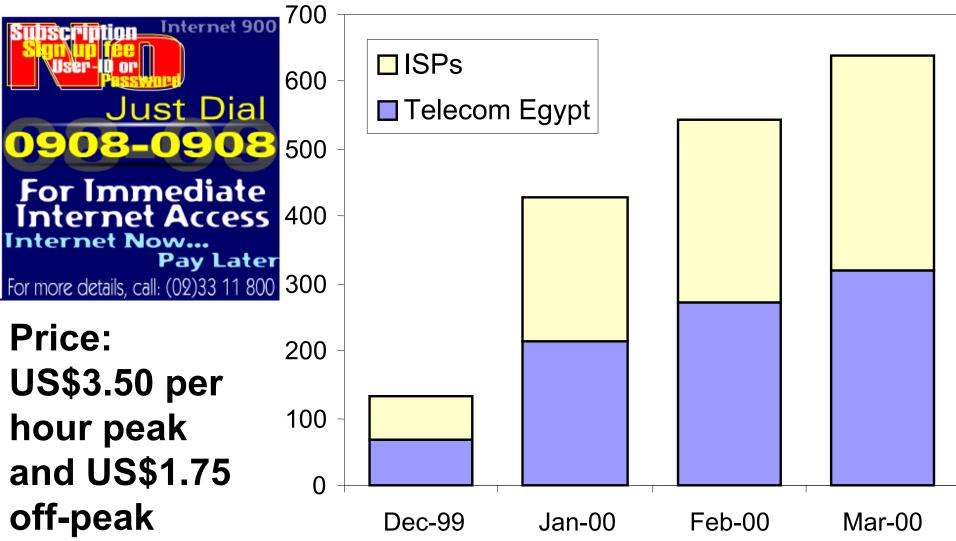
Source: Case Study.



Pricing of 10 hours Internet access (in US\$ per month)



Revenues from Egypt's "Internet-900" dial-up Internet access In US\$ 000s, since launch



Source: Revenue data from Telecom Egypt, Advert from <u>www.intouch.com</u>

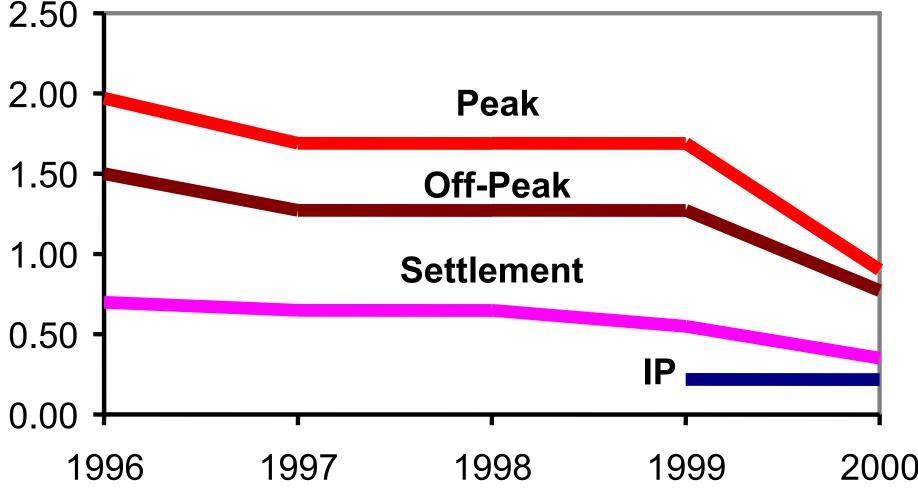
Egypt Telecom's Voice over IP service

- Alliance formed with eGlobe (US)
- Marketed through ISPs (including Egypt Telecom's own ISP); ISPs get 10% of revenues
- Marketed via prepaid cards
- Majority of calls are incoming
- Long-term plan to move whole network to IP platform

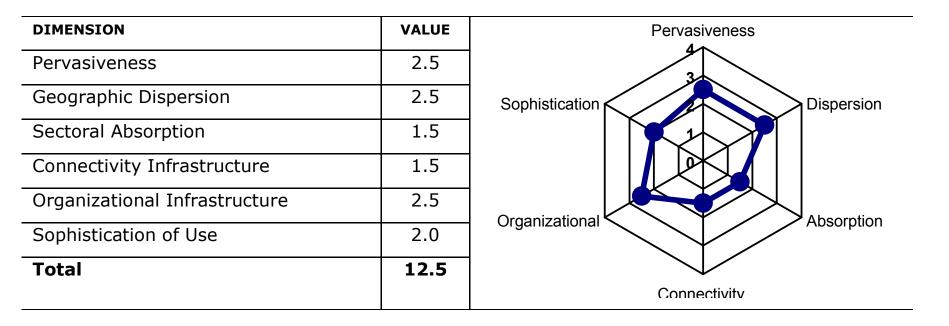
Calls to US cost US\$0.23 per minute, compared with US\$1.32 for PSTN











Note: The higher the value, the better (0 = lowest, 4 = highest).

Source: ITU adapted from Mosaic Group methodology.

Recommendations 1: Telecoms

- 1. Continue the path of progressive liberalisation
 - Full liberalisation of market for data communications
 - An accelerated liberalisation timetable for IP Telephony
 - Continuation of liberalised regime for ISPs
 - Avoid awarding exclusive licences
 - Becoming signatory to WTO agreements
- **2.** Ensure accounting separation
- **3.** Publish all licences in the public domain
- 4. Give priority to tariff rebalancing for Telecom Egypt
- 5. Separate the regulator fully from Telecom Egypt
- 6. Make Internet available nationally at local call rates
- 7. Establish a timetable for issuing 3G licences
- 8. Continue the policy dialogue



Recommendations 2: IT and Internet

- 9. Promote awareness
- **10.** Separate out commercial operations of IDSC from its government functions
- **11.** Create an e-commerce task force
- **12.** Promote public access to the Internet
- **13.** Develop an Arab regional strategy
- **14.** Invest in the next generation
- **15.** Support human resources development
- **16.** Put government online
- **17. Conduct more market research**