

Evolution in Japanese Telecommunications

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Japan : Who's who

😊 Green Iguana

So What?



😊 Marine Iguana

I can
dive, swim, and
eat seaweeds!



Galapagos, or an Advanced Labs

- **Galapagos is an isolated island: Species have purely evolved with no threats from natural enemies roaming in the continents**
- **Japan's telecom would have been eliminated by global giants if the islands were connected to the continents**
- **Advanced Labs: Japan's telecom have offered leading-edge technologies and services to leading-edge users**
- **Japan gives an advanced index of market direction for the future**
- **Japan spends tremendous resources to give global competitors market feedbacks free of charge**

Features of Japanese Mobile Phone

- A Marine Iguana ? -



- Operator's brand
- SIM lock
- Super high-end terminal

Wallet, Credit card, keys, Tags, etc.



GPS navigation



TV / Radio



Magazines, Books



Music Player, Camera



Office Documents

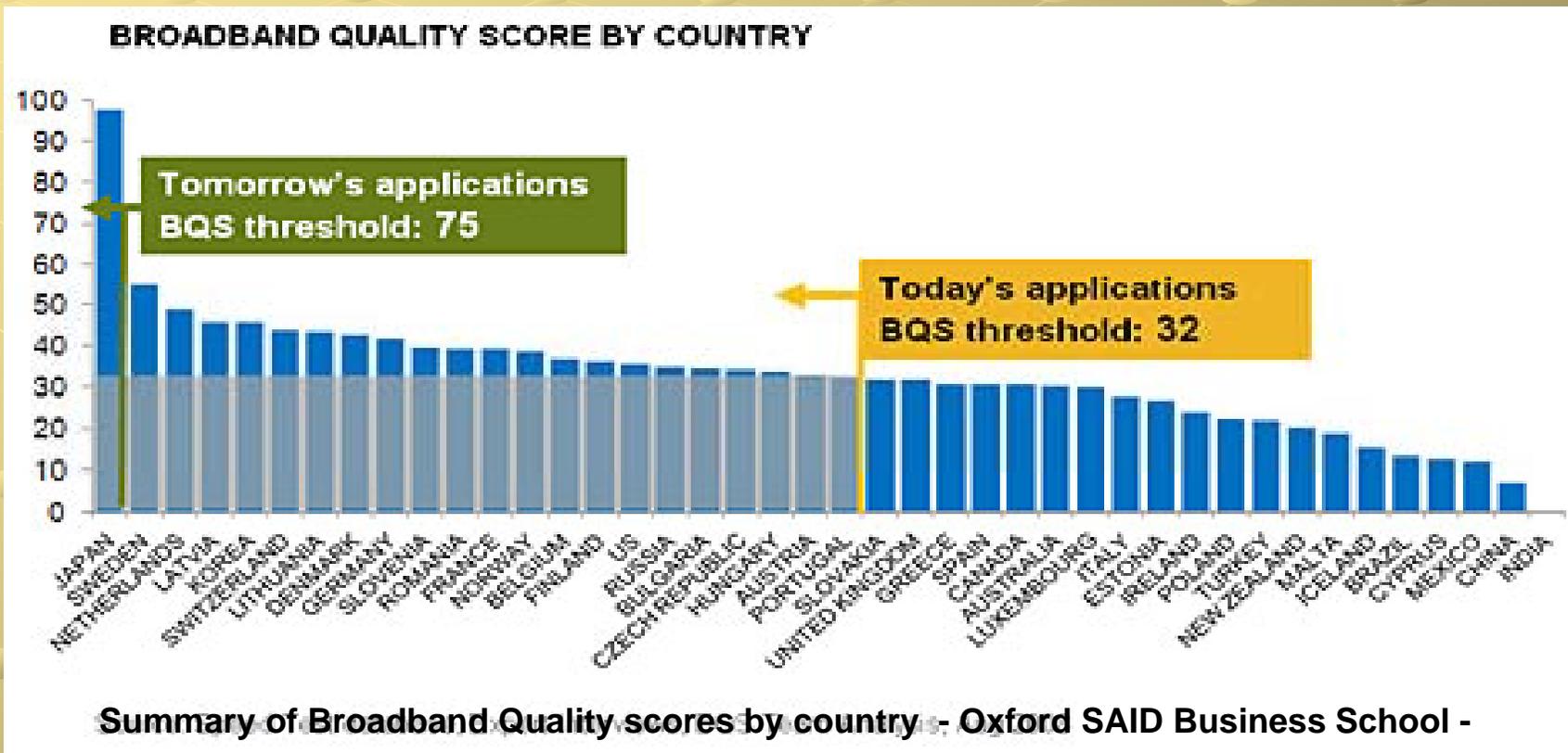


All in one



Advanced Labs for the Future

The only country to have broadband quality that was considered adequate for future internet applications,....., was JAPAN. - The Financial Times - (Sept.12, 2008)



Overtakes

● March, 2000 Mobile overtook Fixed

● Dec., 2004 BB* overtook NB *

● June, 2008 FTTH overtook ADSL

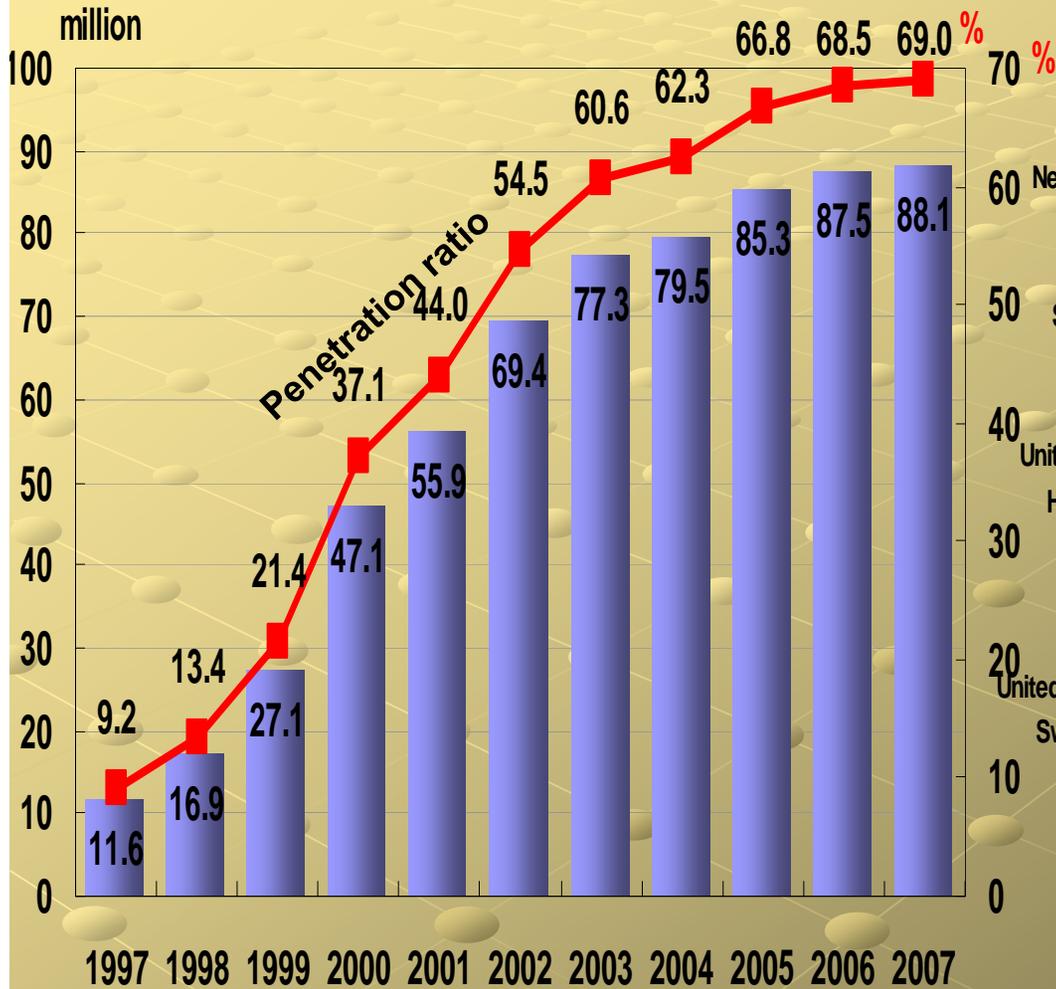
* Note:

BB = FTTH + xDSL + Cable

NB = Dial-up + ISDN

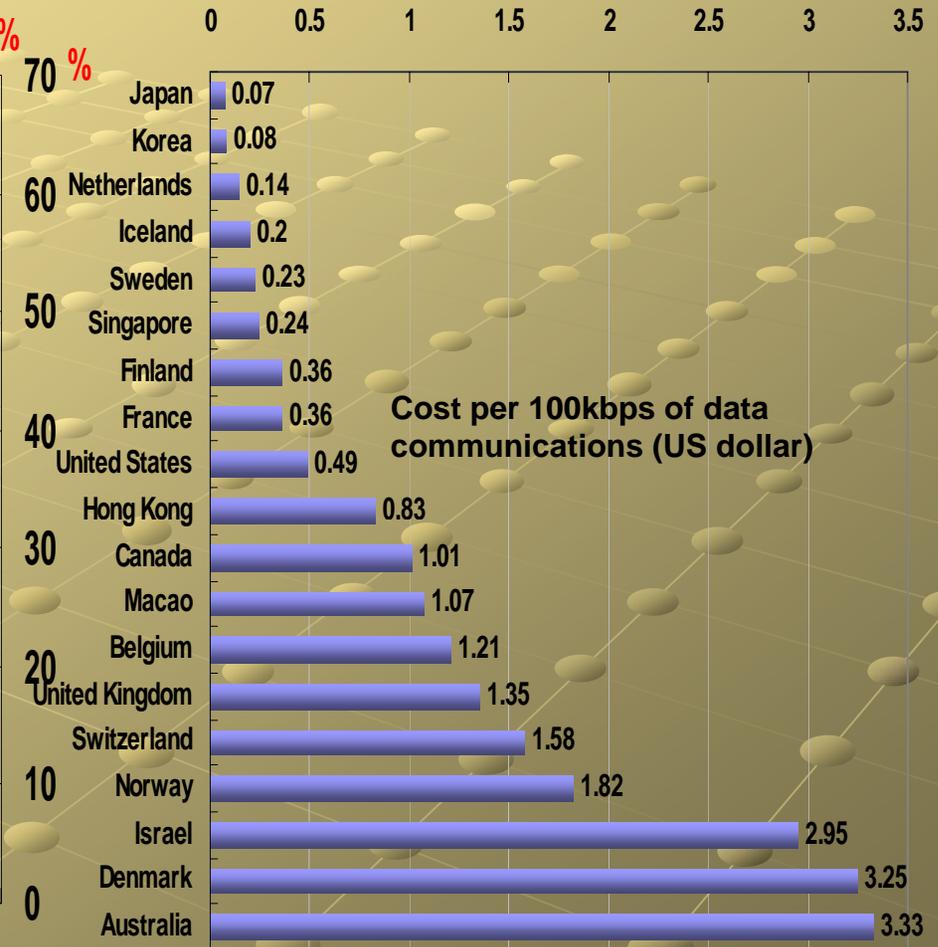
Internet Users and Penetration Ratio

Number of Internet users



Source: MIC

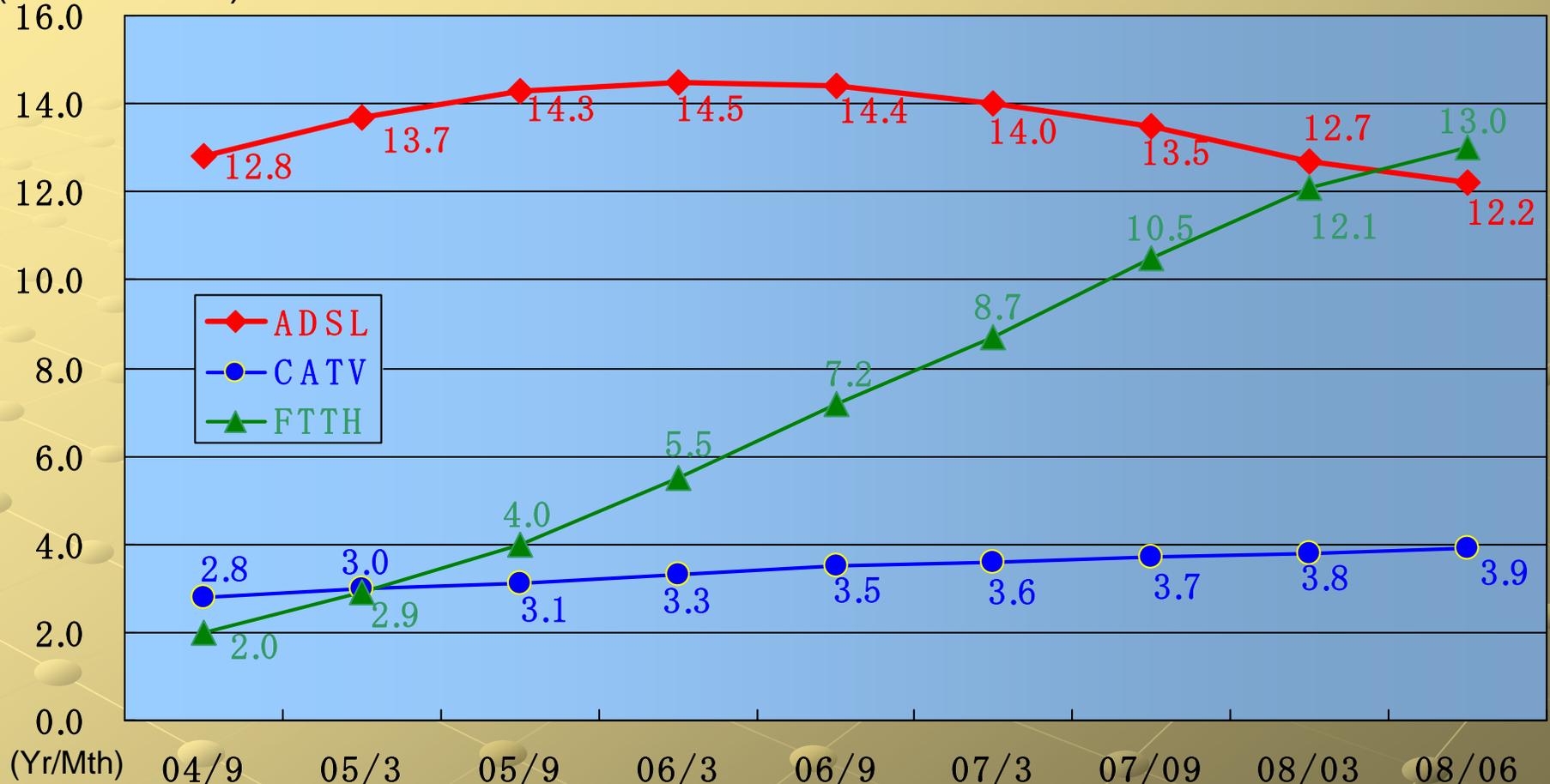
Broadband fee worldwide



Source: ITU Internet Reports 2006 (Dec. 2006)

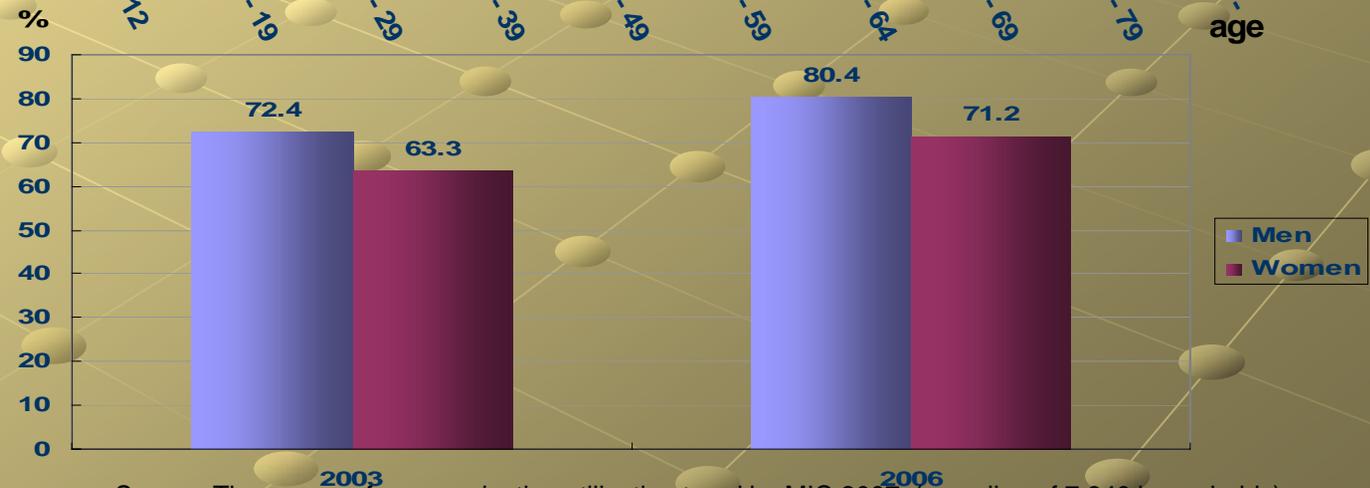
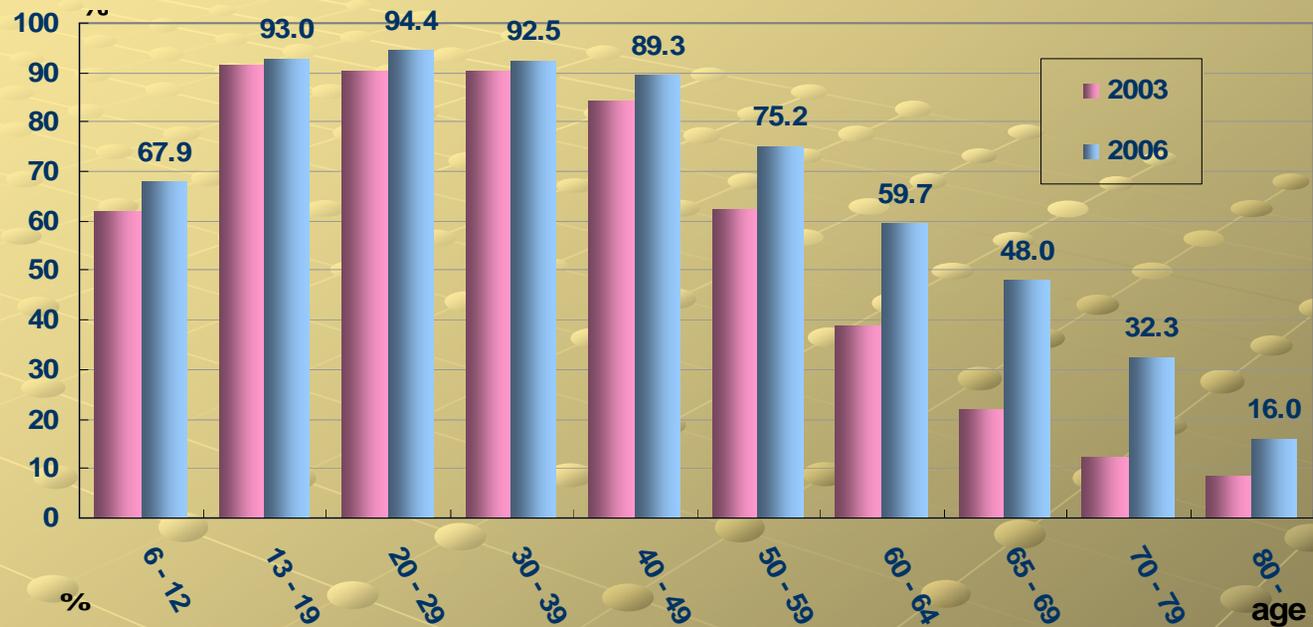
Fixed BB Service: Sub's in Japan

(Million sub's)



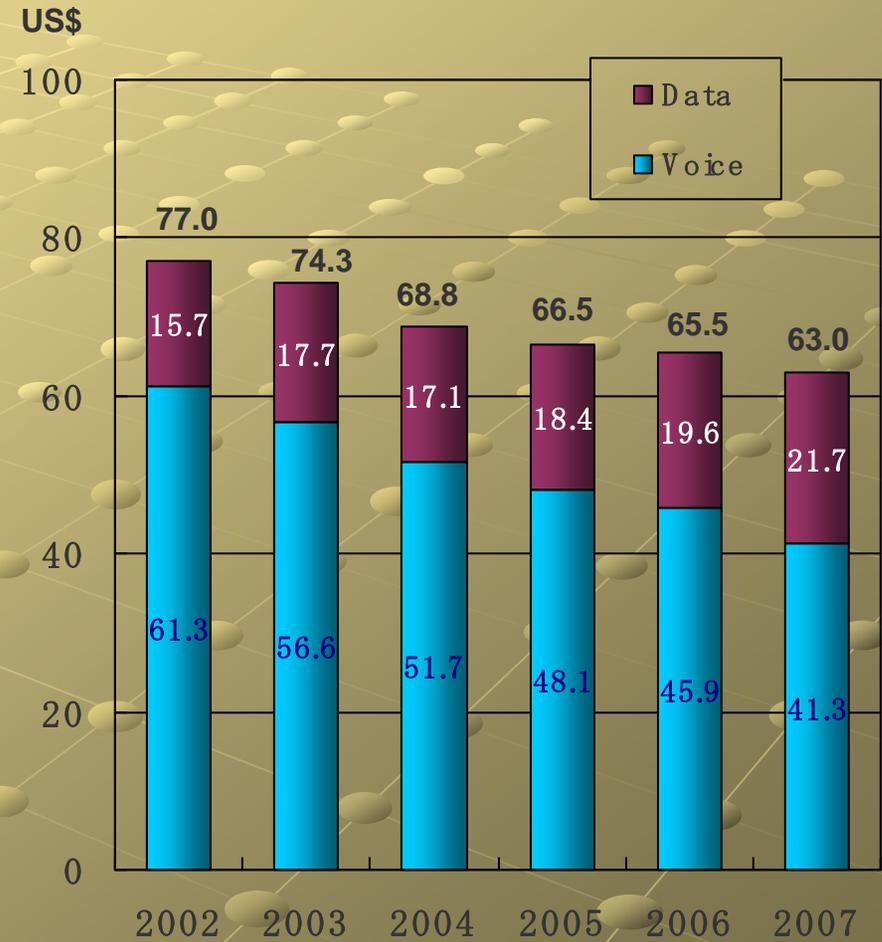
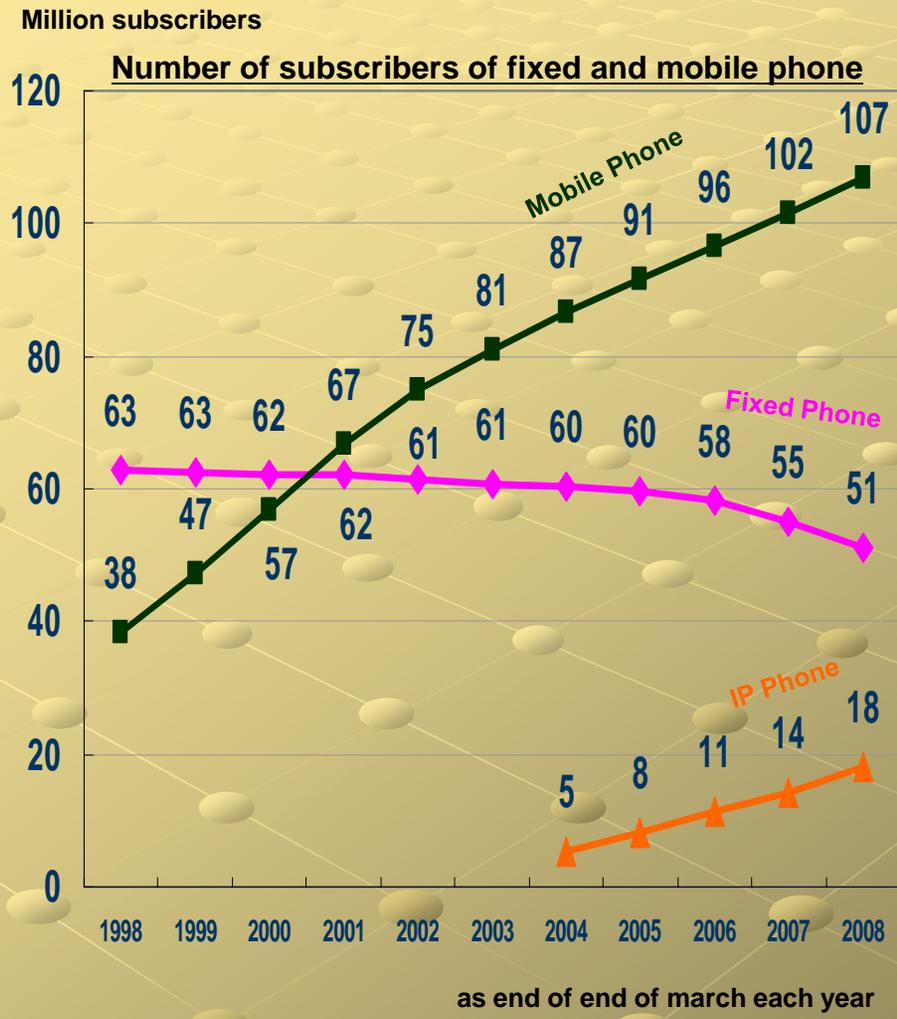
Total	17.6	19.6	21.4	23.3	25.1	26.3	27.7	28.7	29.1
Penetration ratio per household	37.4%	41.6%	45.5%	47.1%	50.7%	53.1%	55.9%	57.9%	58.7

Generation and Gender in Internet Users



Source: The survey of communication utilization trend by MIC 2007. (sampling of 7,840 households)

Trend of Subscribers of Fixed and Mobile



Source: ICT White Paper 2007 by MIC

Change of Business Model

Telecom Operators look for

a **New Business Model** :

From **'Pipe Seller'** to

'Functions Provider'

Next Generation Networks

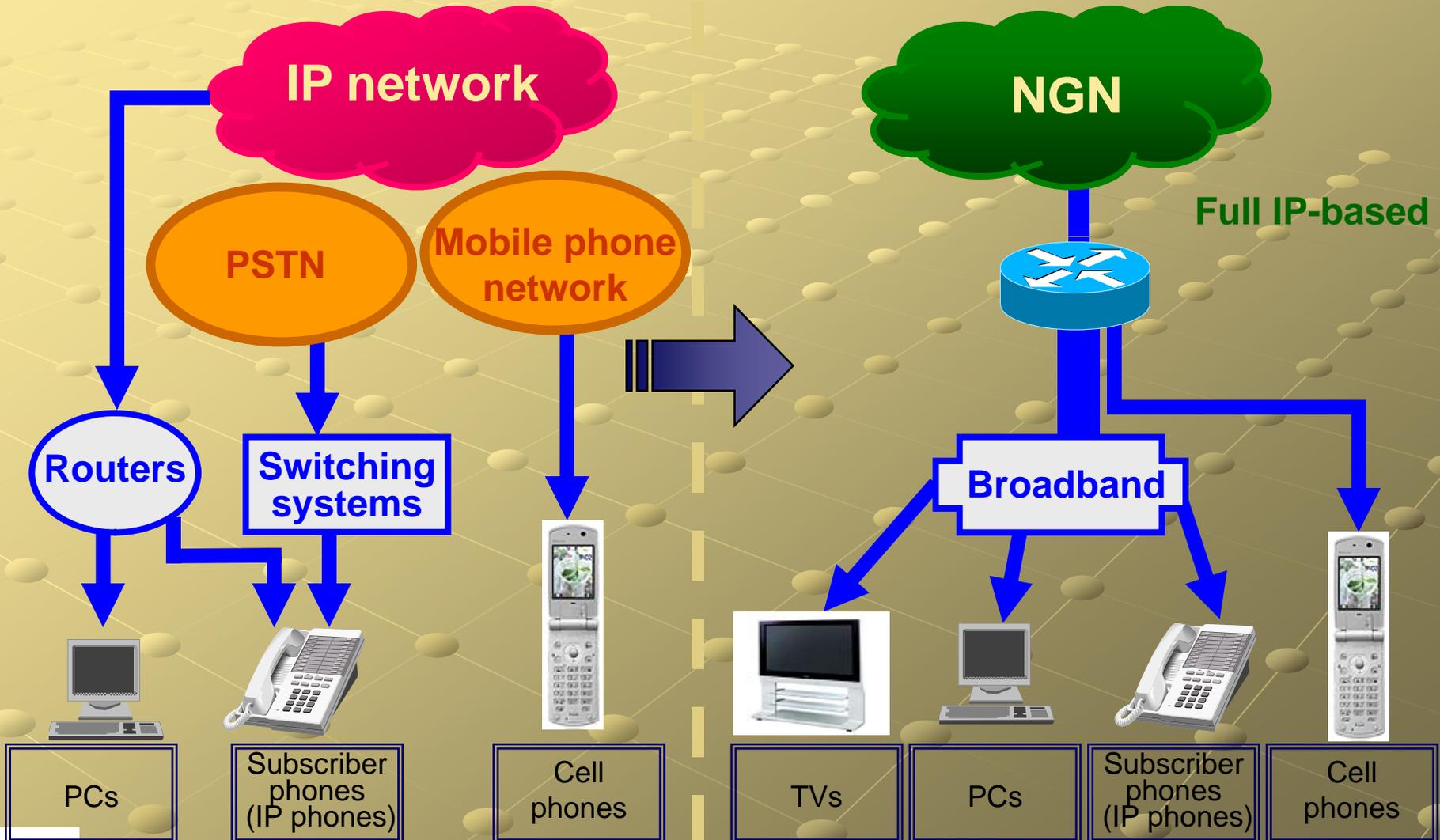
Another Galapagos?



Transition of Telecom Networks

Current networks

Next generation networks



Features of NGN Japan

IP Network (Existing)

+

- Session Association (End to End)
- Verification/Security
- Charging System

(To be provided soon)

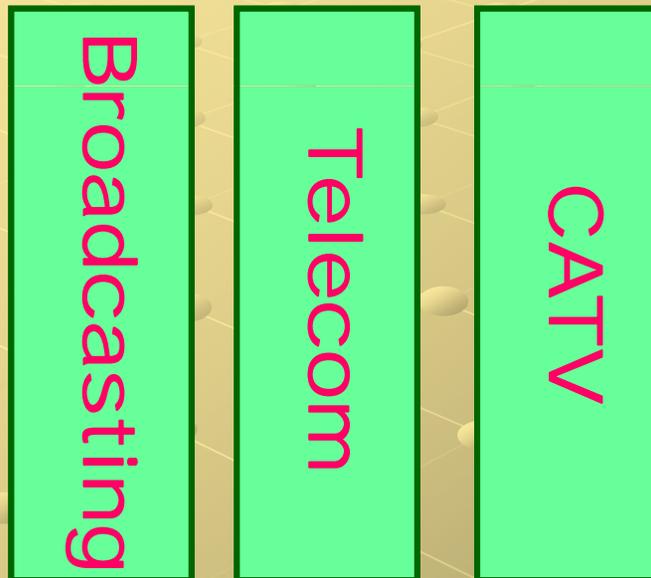


ANI/UNI/NNI
Open
Interface

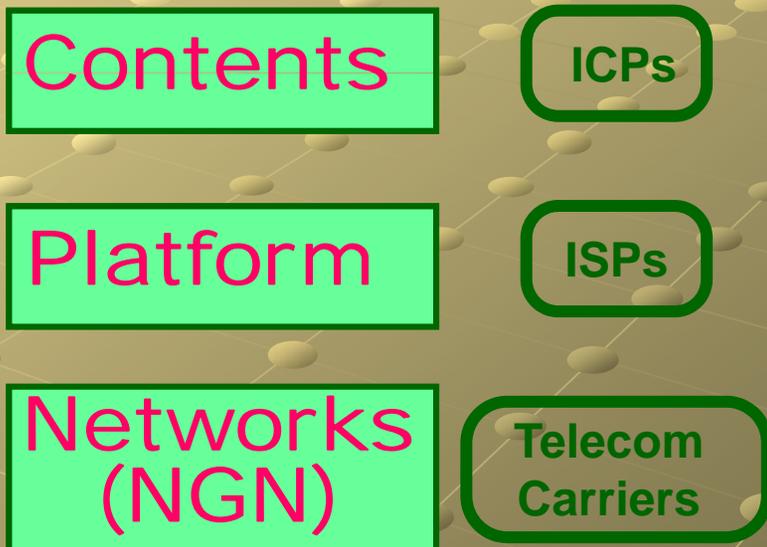
Good Opportunity for a Telecom Operator to become a Function Provider !

Changes in Business Model

Current Model (Vertical Type)

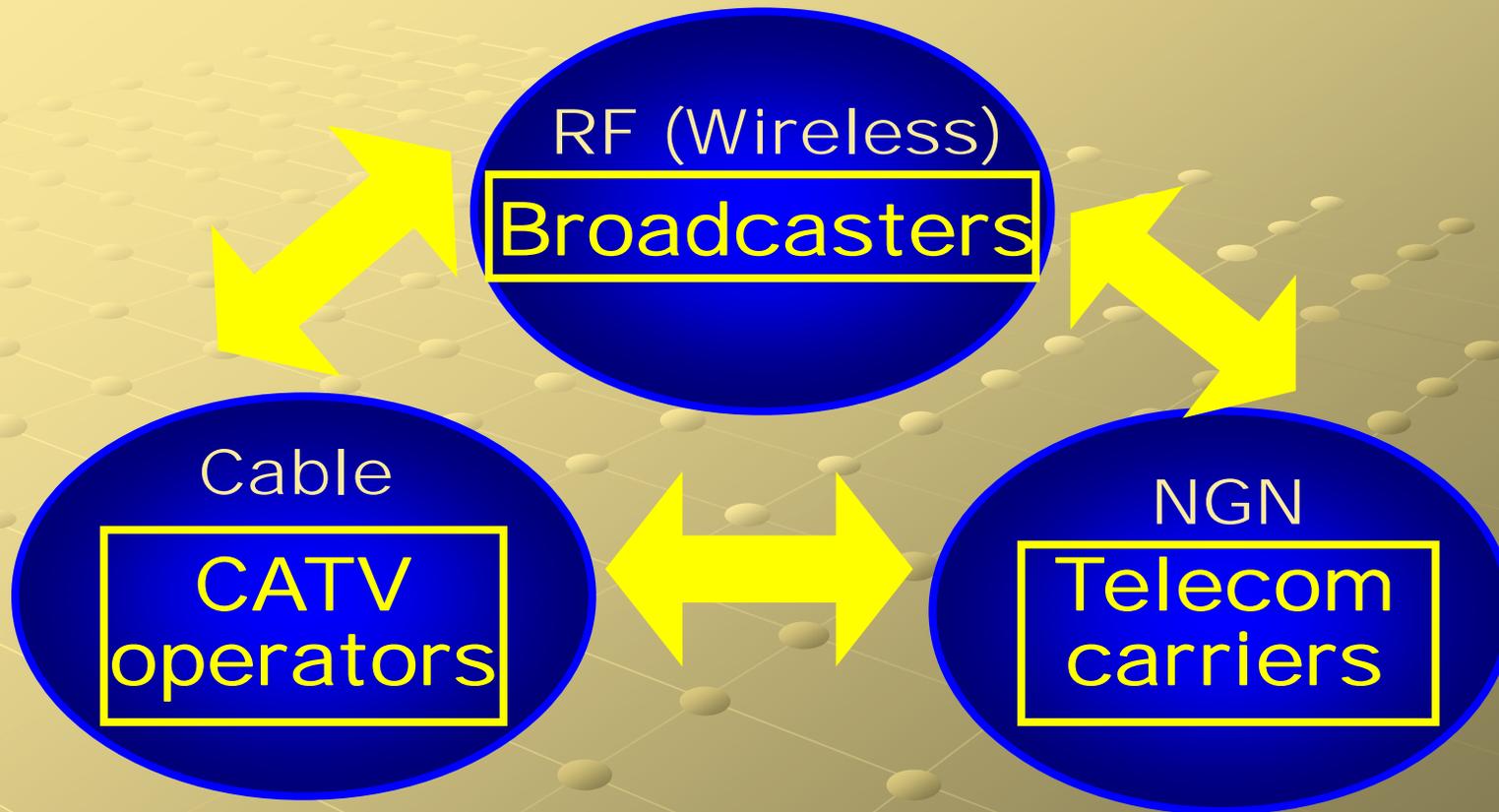


IP-based (Horizontal Type)



- Universal Service --- Expansion of Communication Media
Voice Communications → → IP Phone, Mobile Phone, BB?
- FMC --- Inside Conflict among Telecom Carriers

Convergence of Telecom & Broadcasting



- ▶ Termination of analog TV in 2011
- ▶ Different Laws for Telecom and Broadcasting
- ▶ Copyright Limitation on Network Transmission for TV Program
- ▶ Coordination among Stakeholders' Interests

Evolution toward Ultra High-productive Society

