

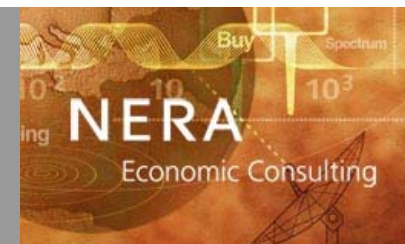
Mobile Termination Rates



Calvin S. Monson
Vice President

Antigua
10-13 September 2007

ICT Regulation Toolkit



Sponsored by ITU and World Bank's infoDev

Link to ICT Regulation Toolkit:

<http://www.ictregulationtoolkit.org>

Mobile Interconnection



- Fixed to Mobile
- Mobile to Mobile
- Mobile to Fixed

Calling Party Pays



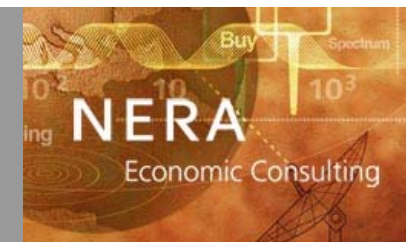
- Under Calling Party Pays (CPP) the calling party, or the calling party's network, pays for the call. The recipient of the call pays nothing.
- CPP is used in many countries to structure interconnection payments for fixed-to-mobile calls. Under the "old" CPP model, the mobile operator sets a fixed-to-mobile tariff. The fixed operator deducts specified charges from this fee (such as an origination charge, and billing and collection charges), and passes the balance of the call revenue to the mobile operator.
- In recent years, some regulators have decided to regulate fixed-to-mobile tariffs, rather than leaving this to the mobile operator to determine. This generally reflects concerns that fixed-to-mobile tariffs are too high. This concern has also led regulators to control mobile termination charges.

Viability of Calling Party Pays Model



- Calling Party Pays business model has been instrumental in the rapid expansion of mobile telephony subscribership in developing nations, particularly among lower income strata.
 - Per-minute pricing
 - Prepaid service is the dominant payment mode
 - Fixed-mobile calls far more numerous than mobile-fixed
- The trend towards capacity-based interconnection, spurred by VoIP services, towards arrangements where each network's own customers pay network costs.
 - Flat-rated packages
 - Prepaid could still be the payment mode

CPP vs RPP



Países El Que Recibe Paga	<u>ARPU</u> (USD)	<u>MOU</u>	<u>RPM</u> (USD)	<u>GDP Cap</u> (USD)
EEUU	53	822	0.06	44,315
Canadá	50	416	0.11	39,135
Singapore	32	320	0.08	30,161
Hong Kong	21	399	0.05	26,824
Países El Que Llama Paga				
México	18	115	0.14	7,594
Chile	14	106	0.14	8,570
Brazil	12	70	0.15	5,177
Alemania	22	87	0.20	35,022
España	32	156	0.18	29,266
Reino Unido	41	155	0.21	38,947
Italia	26	120	0.18	31,350
Francia	37	251	0.13	35,336
Suecia	22	155	0.13	41,945
Holanda	31	148	0.17	40,552
Australia	34	179	0.16	36,016
Japón	57	143	0.29	34,955
<i>Nomenclatura:</i>				
ARPU	Ingreso promedio por usuario/mes			
MOU	Minutos de uso por mes por usuario			
RPM	Ingreso promedio por minuto			
GDP Cap	Producto Bruto Interno por Habitante			
Fuente: Interactive Global Wireless Matrix IIIQ06, Merrill Lynch, Telecom Services Res				

Regulating Fixed-Mobile Charges



- Regulation of fixed-to-mobile rates and/or mobile termination charges is usually justified on the basis that those prices are "too high" compared to a cost-based estimate, or to prices for outgoing mobile calls.
- The premise is that mobile operators are able to sustain high fixed-to-mobile prices because they have market power in setting prices for fixed-to-mobile calls. This market power derives from that fact that the fixed subscriber who places a call to a mobile subscriber has no influence over which mobile network is used. Mobile subscribers make this decision when they decide to join a network. Under Calling Party Pays mobile subscribers do not pay for fixed-to-mobile calls, so they may not take the price of these calls into account in selecting a network.

Methods of Regulating Fixed-Mobile Charges



- Many regulators now control mobile termination charges. There are several forms of such regulation:
 - International benchmarking: In the absence of cost based data, regulators are increasingly relying on international benchmarking to set regulated mobile termination charges in their own countries.
 - Rounding: Some regulators have introduced regulations requiring mobile operators to round each call to a lower unit of charging (for example rounding to the second when the charging unit is to the minute). The effect of this requirement is to reduce revenue from mobile termination.
 - Cost-based termination charges: Regulators are increasingly pressuring operators to base mobile termination charges on long run incremental costs or fully allocated costs.

Other Forces Reducing Fixed-Mobile Charges



- Market forces are also pushing down CPP rates and mobile termination charges. For example users are increasingly substituting mobile-to-mobile calls for fixed-to-mobile calls, creating additional pressure on mobile operators to reduce fixed-to-mobile rates and mobile termination charges.
- United States international carriers, supported by the United States Government, are pressuring developing country operators to reduce international mobile termination rates. The United States is a net exporter of telephone traffic to developing countries, so a reduction in mobile termination charges would reduce their net interconnection payments to foreign operators.

Fixed-Mobile Retentions



- Under Calling Party Pays (CPP) for fixed-to-mobile calls, the fixed operator deducts specified charges from the fixed-to-mobile rate and passes the balance of the call revenue to the mobile operator.
- The fixed operator may retain charges for the following items:
 - Call origination: Call origination charges reflect the cost of the fixed network used to originate the call,
 - Billing and collection: The fixed operator may levy a contribution to the cost of collecting call revenue from its customers. This fee may be expressed as a percentage of the fixed-to-mobile tariff, or as an absolute charge per minute, per call or per bill,
 - Bad debts: The fixed operator may levy a fee for bad debts, on the basis that fixed-to-mobile calls may make up a significant proportion of customers' total bills,
 - Other fees: For instance in some countries the fixed operators charge fees for managing complaints related to fixed-to-mobile calls.

On-net and Off-net Tariffs



- Are they a sign of competition in the mobile sector?
 - Result from a competitive market
 - Long distance markets have seen them also
 - Very common in many jurisdictions
 - Avoid M-M termination charges

- Are they anticompetitive?
 - Covering fixed and common costs
 - Will promoting increased on-net usage help keep subscribership high in developing economies as CPP fades?

Contact Us



Calvin S. Monson

Vice President

Chicago

+1 312 573 2801

calvin.monson@nera.com