

# National Broadband Analysis



Case Studies in  
Consumer Experience  
Projects



# TABLE OF CONTENTS

INTRODUCTION	1
OECD	2
NEW ZEALAND COMMERCE COMMISSION	3
SINGAPORE IDA	4
BAHRAIN TELECOMMUNICATIONS REGULATORY AUTHORITY	5
BETWEEN (ITALY) ICT CONSULTANCY	6
RED.ES (SPAIN) GOVERNMENT BROADBAND ADVISORY	7
EPITIRO WORLDWIDE PROJECTS	8

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# INTRODUCTION

**For over a decade** Epiro has been empowering regulators, operators and service providers with solutions for understanding true customer experience of internet service and applications.

With broadband availability and capability linked directly to social-economic growth, never before has accurate, wide-reaching insight into national broadband performance been so crucial to the advancement of countries.

This collection of case studies highlights some of the regulators and government advisors that have sought Epiro's assistance in providing ongoing broadband performance analysis.





## About the

## OECD

OECD brings together the governments of countries committed to democracy and the market economy from around the world to:

- Support sustainable economic growth
- Boost employment
- Raise living standards
- Maintain financial stability
- Assist other countries' economic development
- Contribute to growth in world trade

The Organization provides a setting where governments compare policy experiences, seek answers to common problems, identify good practice and coordinate domestic and international policies.

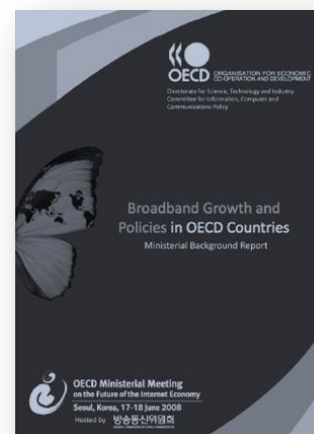
For more than 40 years, OECD has been one of the world's largest and most reliable sources of comparable statistics and economic and social data. As well as collecting data, OECD monitors trends, analyses and forecasts economic developments and researches social changes or evolving patterns in trade, environment, agriculture, technology, taxation and more.

OECD is one of the world's largest publishers in the fields of economics and public policy. OECD publications are a prime vehicle for disseminating the Organization's intellectual output, both on paper and online.

## The Project

In October 2008 the OECD (Organization for Economic Co-operation and Development) requested EpiTiro supply technical metrics for its Communications Outlook publication, released in August 2009.

EpiTiro collected information on over 30 countries using data from hardware and software (PC-based) data collection methodologies.



## More

[http://www.oecd.org/document/17/0,3343,en\\_2649\\_34225\\_38876369\\_1\\_1\\_1\\_1,00.html](http://www.oecd.org/document/17/0,3343,en_2649_34225_38876369_1_1_1_1,00.html)



## COMMERCE COMMISSION

### About the

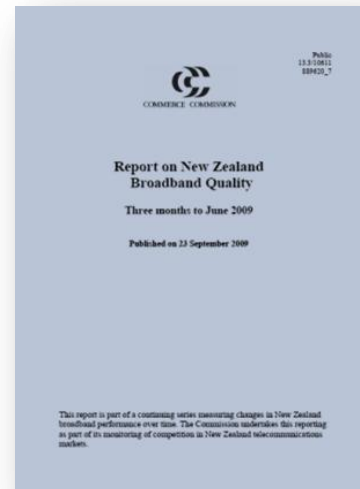
### NEW ZEALAND COMMERCE COMMISSION

The Commerce Commission is New Zealand's primary competition regulatory agency established under section 8 of the Commerce Act 1986. The Commission is an independent Crown entity and is not subject to direction from the government in carrying out its enforcement and regulatory control activities.

The Commission's purpose is to promote dynamic and responsive markets so that New Zealanders benefit from competitive prices, better quality and greater choice.

Underpinning the Commission's Purpose are three strategic goals. They are that:

- markets are dynamic and all goods and services are provided at competitive prices;
- consumers are confident of the accuracy of information they receive when making choices; and
- regulated industries are constrained from earning excess profits, face incentives to invest appropriately and share efficiency gains with consumers.



The Commission is committed to acting with integrity, responsibility and respect. It is professional, independent and has transparent processes. It respects and safeguards commercially sensitive material. It adopts a principled, but pragmatic approach in meeting its purpose and sets high standards of excellence.

### The Project

Since 2007 Epiiro has provided the New Zealand Commerce commission with a quarterly analysis of national broadband services. The project required Epiiro to design and implement a broadband monitoring solution and meet deadlines for both providing the data and authoring quarterly reports.

### More

<http://www.comcom.govt.nz/IndustryRegulation/Telecommunications/MonitoringandReporting/DecisionsList.aspx>

## About

### IDA SINGAPORE

The strategic goal of the Infocomm Development Authority of Singapore (IDA) is to cultivate a vibrant and competitive infocomm industry in Singapore - one that attracts foreign investment and sustains long-term GDP growth through innovative infocomm technology development, deployment and usage in Singapore - in order to enhance the global economic competitiveness of Singapore.

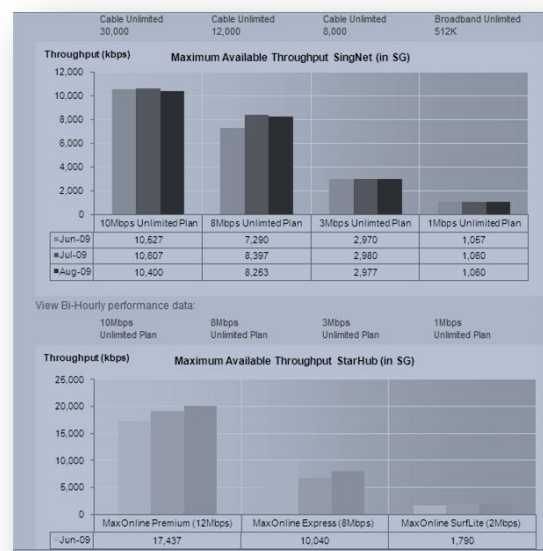
As Singapore's infocomm industry champion, the IDA spares no effort to develop a vibrant infocomm ecosystem comprising local infocomm enterprises, leading multinational corporations (MNCs), innovative infocomm technopreneurs, and start-ups. IDA actively seeks opportunities to grow the infocomm industry in both the domestic and international markets. Through bilateral agreements and partnerships with other governments, and with offices in China, India, the United States and Qatar, the IDA seeks to facilitate the venturing of Singapore infocomm companies into the global market.

## The Project

The Singapore IDA required a broadband monitoring solution for the purpose of tracking ISP performance and sharing that information with the public. The project was delivered to requirements and according to deadline. As information is published monthly Epitiro needs to ensure the system works consistently and any issues are addressed immediately. This is accomplished with ISP-I™ auto-alerts that notify Epitiro's 24-7 Network Operations Centre.

## More

<http://www.ida.gov.sg/Publications/20061213184450.aspx>





هيئة تنظيم الاتصالات  
Telecommunications Regulatory Authority

## About

### BAHRAIN TRA

The Telecommunications Regulatory Authority (TRA) was established by Legislative Decree No. 48 of 2002 promulgating the Telecommunications Law. The TRA is an independent body and its duties and powers include protecting the interests of subscribers and users, and promoting effective and fair competition among established and new licensed operators.

Its mission is to develop the Kingdom of Bahrain as the region's most modern communications hub and to facilitate the development of the market.

## The Project

The Telecommunications Regulatory Authority (TRA) contracted Epitiro to design, build and operate a permanent broadband test platform in Bahrain. The aim is to continuously monitor and report on the service quality of Internet and broadband service providers.

Fully automated testing provides both TRA and consumers with information on many factors which affect the quality of the customer experience for both domestic and international connectivity, including download and upload speed, web browsing speed and other critical parameters.



Specific retail Broadband packages from all licensed operators are tested and results will be made publically available to consumers on a quarterly basis in the form of graphical displays, thereby allowing consumers to easily compare results between license operators.

In addition, the quality achieved by the Industry in Bahrain will be benchmarked in a dynamic way compared to the quality achieved by operators in other parts of the world, including Far East, Europe and the United States of America.

## More

[http://www.tra.org.bh/en/pdf/AppointingEpitiro\\_press\\_releaseFinal\\_en.pdf](http://www.tra.org.bh/en/pdf/AppointingEpitiro_press_releaseFinal_en.pdf)



## About

Between is a leading strategic and technological consultancy firm based in Italy focusing on the information & communication technology (ICT) sector.

## BETWEEN

The company is a trusted advisor to the Italian government on national broadband performance and publishes regular reports through its Osservatorio Banda Larga portal which informs consumers, business and the ISP industry about issues pertaining to broadband services across Italy.

## The Project

Between has launched Eptiro's [www.isposure.com](http://www.isposure.com) broadband service (based on the AT50 software probe) which consumers can use to test the performance of their internet connection. Over 18,000 consumers now use the isposure application which also reports daily performance statistics to Eptiro.

With access to extensive consumer experience broadband data Between is Italy's leading advisor on last mile broadband performance.

## More

<http://www.between.it/>

The screenshot shows the Between website interface. At the top left is the Between logo. A navigation menu includes: "chi siamo", "le persone", "qualità", "sala stampa", "lavora con noi". A central section titled "la nostra offerta di consulenza" lists: "consulenza strategica", "consulenza ICT", "risk management e compliance", "assessment e formazione risorse umane". On the right, "i nostri clienti" lists: "operatori TLC / vendors", "banche e assicurazioni", "imprese", "pubblica amministrazione", "investitori". The main content area features a "NEWS" section with a headline "Misura le reali prestazioni della tua connessione broadband" dated 09/10/2009. Below this, there are several service cards: "osservatorio banda larga", "osservatorio piattaforme", "ICT monitor Business", and "ICT monitor Consumer". A central graphic reads "la banda: tra l'uovo e la gallina" with dates "8-9 ottobre". At the bottom, a footer contains the text "mercato competenza tecnologia indipendenza regole specializzazione" and logos for "between", "be tech", and "TEACH".

# red.es

## About

### RED.ES

Red.es is a public company under the Secretary of State for Telecommunications and Information Society Ministry of Industry, Tourism and Trade (MITyC) responsible for implementing certain projects for the promotion of the information society by interacting with Autonomous, County, Local Governments and the private sector on information and communication technologies (ICT).

The Red.es team consists of more than 200 employees from different professional fields: engineers, lawyers, economists, administrators, sociologists, journalists, designers and more. Collectively RED.ES provides a research and project management reference for research studies and complex projects nationwide.

## The Project

RED.ES required ongoing insight to broadband performance across the country as it was delivered to urban centres. EpiTiro established a network of probes in major cities which monitor key performance indicators 24-7. With the addition of over 3,000 isposure probes RED.ES now has access to rural vs. urban 'digital divide' information.

## More

<http://www.red.es/index.action>



## About

## Epiteiro

Epiteiro is the global leader in broadband benchmarking providing subscriber experience insight to ISPs, MNOs, media providers, multi-national corporations and government regulators. Clients such as the OECD, Ofcom, Vodafone, Orange, Virgin Media, Telecom New Zealand, Telefonica O2, Tiscali, Singapore IDA, Saudi Telecom Company, Bahrain Telecom Regulatory Authority and many others benefit from Epiteiro's coverage of fixed and wireless broadband performance.

Founded in 2000, Epiteiro has headquarters in Cardiff, Wales, UK.

Epiteiro regularly undertakes research projects into aspects of broadband performance in various countries and regions.

### UK Mobile Broadband Report

Epiteiro recently conducted an extensive study into the performance of mobile broadband services in the UK. Details can be found at:

<http://www.epiteiro.com/news/epiteiro-publishes-uk-mobile-broadband-research.html>

### European City Internet Performance Index

The European City Internet Performance Index was published in September 2008, based on data from the rollout of Epiteiro infrastructure into the preceding countries. Epiteiro confirmed a significant 'digital divide' existed between the cities included in the research.

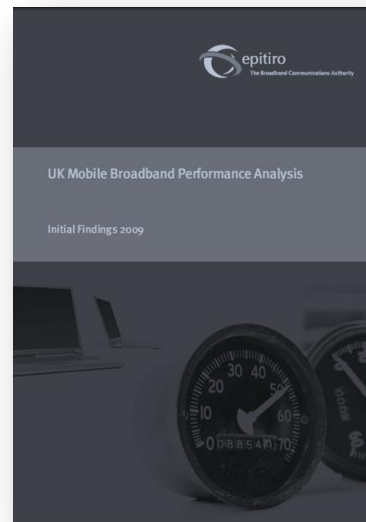
<http://www.epiteiro.com/assets/docs/EURO-IPI-Q3-2008.pdf>

### Ireland Internet Performance Index

In December 2008 Epiteiro discovered that consumers in that country achieved an average of 60% of headline speeds with Ping times being far below the acceptable level.

<http://www.epiteiro.com/assets/docs/Ireland%20Internet%20Performance%20Index%20Epiteiro.pdf>

## Projects



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#### Australian Internet Performance Index

During February 2009 Epitiro published the results of an in-depth technical study concerning the performance of Australian broadband services.

<http://www.epitiro.com/news/australian-broadband-underachieving.html>

#### UK Email Performance Index

Over 60 million emails sent daily in the UK by business and consumers making it the most popular form of communications in the country. This is the UK's first study into the reliability and general performance of ISP Email service.

[http://www.epitiro.com/assets/downloads/ukemailperformance\\_2007-08.pdf](http://www.epitiro.com/assets/downloads/ukemailperformance_2007-08.pdf)



More

With the world's leading national broadband analysis solution combined with an unparalleled pedigree in consumer experience research, Epitiro is ideally positioned to assist national regulators.

For further information or to arrange a presentation please contact Epitiro directly;

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