



Multi-Utility Meter Report

Electricity, Gas, Water



Ed 8- 2010

© ABS Energy Research 2010

The ABS Energy Research logo and portfolio logo device are TM of ABS Energy Research

Published By

ABS Energy Research
8 Quarry Road
London SW18 2QJ
United Kingdom
Tel: + 44 020 8432 6378
Fax: + 44 020 8328 7117
info@absenergyresearch.com
www.absenergyresearch.com

Copyright Notice

© ABS Energy Research 2010

All rights reserved. This publication is protected by copyright. No part of it may be reproduced, stored in a retrieval system or transmitted, in any form or by any means, electronic mechanical, photocopying, recording or otherwise without the prior written permission of the publishers. The ABS Energy Research logo and renewable portfolio device are Trade Marks of ABS Energy Research 2010.

NOTES TO READERS: New Format for the 2010 Multi-Utility Meter Report

For the first time, ABS Energy Research has produced its annual Multi-Utility Meter Report in four (4) separate documents. The Multi-Utility Meter Report is now a short document consisting of a global summary of the Electricity, Gas, and Water metering industry worldwide. The individual ABS Electricity Meter Report, ABS Gas Meter Report, and the ABS Water Meter Report (all substantially updated and now in their 8th Edition 2010 versions) accompany this Multi-Utility Report and are included with its purchase.

The Multi-Utility Meter Report & Database Ed 8 2010 & The Meter Manufacturers Directory Ed 5 2010

Introduction

The world is adopting advanced metering in electricity. It has been talked about for several years and now it is happening. So far 32 countries have decided to proceed and the global metering market will increase 56% in five years, with more to follow as further decisions are announced. The gas meter market is following but is some way behind electricity. The water meter market, historically more conservative, is slower to adopt advanced metering but price increases and water scarcity are driving it in that direction.

AMR was once almost the preserve of the United States but AMI two-way fixed network metering is being taken up much more widely. National roll-outs have been announced in many European and Asian countries. The largest deployment of advanced meters has been announced in China in the electricity sector. The second largest will be in Britain, with 49 million electricity and gas meters. The Korean government has created a company to operate Homenet, comprising a national smart grid, together with a host of home communication and management services. Greenland will be one of the smallest national smart systems but it will be the most comprehensive, covering electricity, gas, water and heat consumption in every household.

The report has measured the largest ever expansion of metering, already under way and about to escalate significantly, both in quantitative and qualitative terms. The report is redesigned and greatly expanded in scope compared with previous editions. The changes and expansions have been designed to meet the need of the metering industry for information at their specific request. The metering companies have given strong support and have been generous in time and provision of information. We would like to acknowledge their generous help.

However, it is not all good news. Amidst these exciting developments there are traps for the unwary. There are immediate hurdles to be jumped and long term pitfalls to be avoided. Not every deployment will offer the same opportunities to the international meter manufacturers.

The gas meter market has been following the electricity meter trend to AMR in the US for some years and is increasingly doing the same in Europe, but at a much slower pace. With a new consciousness towards energy efficiency, driven partly by fears about the environment and partly by concern about energy security, gas utilities are now considering advanced metering, jumping from AMR to AMI. The UK is the first country to announce a national roll-out of advanced electricity and gas meters, totalling an enormous deployment of 49 million meters. We predict that gas metering will follow the trend to advanced metering more widely in the next few years.

The water meter sector is beginning to change, following in the path of the advanced metering revolution taking place in the energy sector, but at some distance behind it. In the US water utilities started to deploy AMR some years ago but it has not reached parity with the energy utilities. The emphasis is now changing for both sectors, to AMI. In a time of rising water prices there is a need to control costs but another important consideration enters the equation for water, scarcity of the resource. In recent years there have been a number of critical droughts in countries scattered over the globe. In some countries which rely on hydropower this has led to a shortage of electricity, as was the case in Brazil several years ago. In other countries it has affected both industry and the population. In Taiwan in 2008 water was rationed for industry in order to guarantee drinking water for the population. In China scarcity of water is a national priority at the highest level. In the Middle



East, Spain, the southern states of America water scarcity is a recurrent problem and water management systems have been in operation for some time. Smart water meters are being deployed

to manage the resource and this is a growth area and irrigation meters are also increasingly prominent.

The Multi Utility Meter Report includes a short review of heat metering for the first time.

In some countries metering is seen as a separate service, as a profit centre as well as a cost. Metering services are offered by specialist RBC (Read, Bill & Collect) companies. Some are individual companies, others are divisions of utilities. They offer a variety of services, among them sub-metering services.

Sub-metering is another issue which the ABS report addresses, the penetration and increasing usage of sub-metering, mostly for water and heat. Property owners have always charged their tenants for water, but mostly they include it in the rent or allocate costs by RUBs (ratio utility billing), apportioning the charge according to floor area, numbers of occupants or some such variable. Sub-meters encourage tenants to use less water and they guarantee fair charges. Sub-meters have been around for some years but their usage is growing and we predict more growth. Sub-meters are used not only to measure total consumption but to monitor individual usage points, such as taps and boilers and in the case of heat cost allocation meters to monitor energy use and allocate costs to consumers.

Report Scope

In this new edition of the Multi-Utility Meter Report we have expanded the coverage of the marketing profiles to review 51 countries in detail, an expansion from 22 countries in the previous report. The countries contained are (new countries underlined): (Europe & CIS) Austria, Belgium, Bulgaria, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Netherlands, Norway, Poland, Portugal, Romania, Russia, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey, Ukraine, UK; Asia (Pacific) Australia, China, India, Indonesia, Japan, South Korea, Malaysia, New Zealand, Philippines, Thailand, Taiwan, Vietnam; (South America) Argentina, Brazil, Chile; (North America) Canada, Mexico, USA, (Middle East) Iran: (Africa) Egypt, South Africa. The report includes:

- Number of electricity, gas and water customers
- Annual meter demand in units and \$ value (2009-2013)
- Meter type
- Market trend
- AMR deployment and development
- Market participants
- Utility background and market characteristics
- Type approval and certification, together
- Significant changes which are driving market development

A valuable addition to the water section is the inclusion of sub-meters, which we have not covered before. The report surveys electricity, gas, water metering and for the first time, heat metering. The market is now broken down in value and volume by user segment, C&I and residential. In the electricity sector markets are analysed by technology; electromechanical, basic electronic, AMR (one way communication), AMI (two-way communication), prepayment, C&I and grid meters. The report also contains a table of population, numbers of households and the installed base of utility electricity, water and gas meters in all countries. The metering services, RBC industry is surveyed for the first time.



The report includes a discussion of the market drivers. Types of electricity, water and gas meter and country practices for type approval are outlined. The electricity, gas and water utility sectors are outlined. Advanced metering is discussed, with reference to the overlap of AMR and AMI.

Market analysis and meter types

- Meter demand in units and \$ value, forecast annually from 2009 to 2013
- Regional and country analysis of demand (179 countries)

Market participants

- The major companies globally and within region are identified with market shares by value and volume
- Company mergers and consolidations

- Market leaders identified in each major market

Advanced Metering, AMR and AMI

- Survey of global AMR and deployment
- Major AMR suppliers identified with market share for leader

Tables and spreadsheets containing:

- Global analysis and forecasts (2009-2013) for every market, for each of 179 countries
- Electricity, Gas and water consumers and annual demand (2009-2013)
- Market analysis by stock/balance, imports, exports and demand, for every country
- Market size and forecast for each year from 2009 to 2013 for every country, units and \$ value
- Analysis of demand by end user segment, C&I and residential in volume and value.
- Historical export data from 1997 to 2008/09 in units, \$ value and unit prices
- A separate Excel file is available containing all of these tables plus an analysis of unit exports by country of origin and destination, for each year from 2003 to 2008/9

Meter Manufacturing Companies

- Major meter companies identified and consolidations and mergers outlined
- Directory of 989 meter manufacturers, including 288 producing water meters

Methodology

The methodology of the study has been reviewed comprehensively by the ABS Intelligence Unit and new metrics have been introduced to reflect market evolution.

Each of the three main drivers was assessed separately (new building, replacement and refurbishment of meters, and up-grading of meters) and relevant metrics were considered, introduced or rejected. This is a more complex exercise than it at first appears and some obvious candidates were rejected after piloting calculations showed them to be false discriminators.

The dynamics of the market are changing and issues such as the conversion from electromechanical to solid state meters and the effect on replacement rates in the C&I and residential sectors have been reviewed. The growth of new housing, the demographic trends of household size, and electrification ratios have been researched and their implications assessed.

The most critical of all determinants at present is the move to advanced metering. This lies outside the traditional pattern of drivers based on metrics and single decisions or government legislation are decisive.

The Database

- The tables from the report
- Current demand in units and value



- Forecasts annually to 2013 in units and value
- Export analysis annually from 1997 to 2008/9 in units, total \$ value and unit price
- Spreadsheet of exports by country of origin and importing country from 2003 to 2008/9

The Directory

A directory of meter manufacturers with (where available) the address, tel, fax and generic email.

Price of report - £4,305
Price of Directory - £630
Price of report & excel database - £5,145
Price of report & excel database and directory - £5,900
<i>*For US Dollar and Euro prices please refer to www.absenergyresearch.com</i>

***To purchase this report please complete the order form or for more information please contact:
info@absenergyresearch.com or call +44(0) 20 8432 6378**

NOTES TO READERS: New Format for the 2010 Multi-Utility Meter Report

For the first time, ABS Energy Research has produced its annual Multi-Utility Meter Report in four (4) separate documents. The Multi-Utility Meter Report is now a short document consisting of a global summary of the Electricity, Gas, and Water metering industry world-wide. The individual ABS Electricity Meter Report, ABS Gas Meter Report, and the ABS Water Meter Report (all substantially updated and now in their 8th Edition 2010 versions) accompany this Multi-Utility Report and are included with its purchase.



ORDER FORM

Name of Report	Quantity	Price
*Add hard copy costs		
*Add hard copy and PDF costs		
Total		

PLEASE CONFIRM THE FOLLOWING DETAILS:

Name.....Title Mr/Mrs/Miss/Ms/Dr/Other (Please circle)

Job Title.....Department.....

Company.....

Address.....

Postcode.....City.....County/State.....

Country..... Email.....

Tel..... Fax.....

Your preferred method of delivery:

Hard copy PDF (via email – 1-3 users only) PDF & Hard copy

***Additional charges:**

PDF (1-3 users only): No extra costs

Hardcopy: UK - £40, Europe - £60/€100, Rest of world - £75/\$150

Hardcopy and PDF(1-3 users only): UK - £85, Europe - £105/€175, Rest of world - £120/\$240

Courier costs are inclusive

For multiple users of PDF files and multiple hard copies please contact info@absenergyresearch.com

Please note UK VAT is added where applicable.

Payment method:

Credit Card Bank Transfer Cheque Invoice

I enclose a cheque payable to ABS Energy Research for the sum of

Please debit my credit card (please tick choice) AMEX Mastercard Visa

Card NoExpiry Date.....

Card Verification Number (last 3 numbers on back of card).....

Signature

VAT/TVA Number.....

Please send me details of other ABS products and services

Are you responsible for ad hoc market research? If not please confirm details of the person responsible:

Name..... Tel.....

Fax..... Email.....

How did you hear about us? Website Advert Email Press release Direct mail Other – please specify

ABS and/or carefully selected companies would like to contact you in the future with news and special offers. If you prefer not to be contacted please tick this box

Our usual terms and conditions apply please consult www.absenergyresearch.com

Please return your order to: **ABS Energy Research,**
8 Quarry Rd, London SW18 2QJ, UK
Tel: +44 (0)20 8432 6378 Fax: +44 (0)20 8328 7117
Email: info@absenergyresearch.com
www.absenergyresearch.com