The Renewables Obligation

Ofgem's first annual report

February 2004

Summary

This document describes the administration of the Renewables Obligation in England and Wales and in Scotland in the first year of its operation. It includes information on the generating stations accredited under the schemes, details of the Renewables Obligation Certificates ("ROCs") issued under both schemes and details of compliance by generators and by licensed suppliers in the first obligation period. It also describes some of the operational issues that have arisen during the first obligation period.

The Renewables Obligation, which came into force in April 2002, requires licensed electricity suppliers to source at least part of their electricity from renewable generation. The amount of the Renewables Obligation starts at 3% of total electricity supplied to customers in Great Britain in 2002/2003 and reaches 10.4% in 2010/2011. A licensed supplier can meet its Renewables Obligation by producing ROCs to Ofgem or making a buy-out payment or a combination of both.

The Government's recent Energy White Paper endorsed the importance of the Renewables Obligation as the Government's main policy measure to encourage the development of renewable forms of energy in the United Kingdom. The Government has reinforced its commitment to the scheme by announcing in December 2003 an intention to consult on an increase in the level of the Renewables Obligation for the years between 2010/2011 and 2015/2016.

The Renewables Obligation is complex and its administration has involved considerable resource within Ofgem. Ofgem has administered the scheme as efficiently and effectively as possible.

By and large, most operators of accredited generating stations have developed and improved their understanding of the requirements on them during the first obligation period. 431 stations were accredited at the start of the first obligation period and 505 by the end of the period. Ofgem has rejected 9 applications for accreditation and withdrawn one accreditation during the first obligation period.

5,562,669 ROCs were issued under the scheme in the period in question and 2,428 were revoked with 2,604 replacement ROCs being issued. Almost 50% of the ROCs issued were in respect of electricity from landfill gas generation with on-shore wind generation contributing around 20% of ROCs issued.

The total Renewables Obligation across Great Britain was 9,261,568 MWh for the first obligation period.

Suppliers' performance in terms of the correct production of ROCs and/or the payment of buy-out varied. Out of 71 supply licensees in England and Wales, 38 had a Renewables Obligation and 12 of those met their obligation wholly through producing ROCs. Nine suppliers made buy-out payments for 100% of their obligation. The equivalent figures for Scotland were that 28 out of 66 supply licensees had a Renewables Obligation and 16 of those met their obligation wholly through producing ROCs. Four suppliers paid 100% buy-out.

Seven supply licensees failed to produce the required number of ROCs or make the full alternative payment to the buy-out fund prior to 1 October 2003.

23 suppliers received buy-out recycling totalling £79,251,930 under the Renewables Obligation in England and Wales and 19 received buy-out redistribution of £11,267,124 in Scotland.

The document also highlights some of the issues that have arisen in operating the scheme and discusses briefly some of the amendments that have been proposed in the recent review.

Table of contents

1. Introduction

1.1 The Government's aim for renewable energy is that it should make an increasing contribution to UK energy supplies in the years to 2010 and beyond. The intention is that renewables will have a key role to play in the Government's wider Climate Change programme as sourcing 10% of electricity from renewable sources could result in an annual saving of around 2.5 million tonnes of carbon emissions in 2010[1]. The Government's renewable energy policy has five key aims, one of which is to assist the UK to meet national and international targets for the reduction of emissions including greenhouse gases. (The other aims can be found in DTI's Statutory Consultation on the Renewables Obligation[2].)

1.2 Section 32 of the Electricity Act 1989 provides that the Secretary of State may by order impose an obligation on suppliers falling within a specified description ("the Renewables Obligation"). This power has been devolved to the Scottish Executive in respect of suppliers in Scotland. The Gas and Electricity Markets Authority ("the Authority") is responsible for the implementation and administration of the provisions of all such orders. The Renewables Obligation Order 2002 ("RO") and the Renewables Obligation (Scotland) Order 2002 ("ROS") have been made under section 32 of the Electricity Act 1989.

1.3 The Renewables Obligation for England and Wales and the equivalent Renewables Obligation for Scotland place a legal obligation on all licensed electricity suppliers to produce evidence that either they have supplied a specified proportion of their electricity supplies from renewable energy sources to customers in Great Britain, or that other electricity suppliers have done so, or, that between them, they have done so.

1.4 Section 32B of the Electricity Act 1989 sets out the enabling provisions for green certificates that may be issued under the orders made under section 32 of the Act. Such certificates certify that a generating station has generated from

[1] Department for the Environment , Transport and the Regions (2000). Climate Change: The UK Programme
[2] Available at http://www2.dti.gov.uk/energy/renewables/policy/key_stages.shtml

renewable sources an amount of electricity **and** that it has been supplied to customers in Great Britain. These are known as Renewables Obligation Certificates ("ROCs") (issued under the RO) or Scottish Renewables Obligation Certificates ("SROCs") (issued under the ROS). These certificates can be purchased separately from the electricity.

1.5 Suppliers are required to produce evidence of compliance with their Renewables Obligation to the Authority before a specified day each year. This statutory deadline is 1 October each year. Evidence or part of the evidence can be via ROCs or SROCs. Alternatively, a supplier can discharge its Renewables Obligation, in whole or in part, by paying the buy-out price. The RO and the ROS came into effect on 1 April 2002 and are scheduled to stay in place until 31 March 2027. Each obligation period runs from 1 April to 31 March each year.

1.6 The Renewables Obligation is a significant part of the Government's Climate Change Programme and the recent Energy White Paper endorsed the importance of the scheme as the Government's main policy measure to encourage the development of renewable forms of energy in the United Kingdom. The Government has reinforced its commitment to the scheme by announcing in December 2003 an increase in the level of the Renewables Obligation for the years between 2010/2011 and 2015/2016. This proposal will require consultation with Ofgem, energywatch, licensed electricity suppliers and generators of electricity from renewable sources as statutory consultees.

Ofgem's role under the RO and the ROS

1.7 The Renewables Obligation Order 2002 and the Renewables Obligation (Scotland) Order 2002 ("the Orders") set out Ofgem's remit to administer the Renewables Obligation. Ofgem's functions under the Orders include:

- accrediting generating stations as being capable of generating electricity from eligible renewable sources

- issuing ROCs and SROCs and revoking these as necessary

- establishing and maintaining a Register of ROCs and SROCs and registering the transfer of ownership of ROCs and SROCs

- monitoring compliance with the RO and ROS

- adjusting the buy-out price by the RPI each year

- receiving buy-out payments and redistributing the buy-out fund, and

- reporting annually on the operation of and compliance with the RO and the ROS.

1.8 Ofgem carries out these functions according to the provisions of the Orders and as efficiently and effectively as possible. Ofgem has no remit to go outside of these functions set out in the Orders in its administration of the scheme. Similarly, while the Renewables Obligation is a market-driven mechanism for the promotion of renewable energy, Ofgem has no remit over the operation or regulation of the ROC market itself. Amendment of the Electricity Act 1989 or the Orders is a matter for DTI and the Scottish Executive.

1.9 Ofgem's costs in running the scheme are detailed as follows. Start-up costs were approximately £536,500 for Ofgem's two systems, the Renewables Trading Information Management System (RTIMS) and the ROC Register. The current estimated annual ongoing costs are approximately £518,800. This includes staffing; technical, legal and IT support; audits of generating stations; systems support; and maintenance of the bank accounts.

Key features of the Renewables Obligation

1.10 All licensed suppliers have to produce evidence that they have supplied a specified proportion of their electricity supplies to customers in Great Britain from eligible renewable sources. The relevant percentages are set out in Schedule 1 to the Orders. These begin with 3% of total supplies in 2002/2003

rising to 10.4% in 2010/2011 and thereafter remaining steady at 10.4% until the last period ending on 31 March 2027. The Government has recently announced that it will be consulting on increasing the targets each year from 10.4% in 2010/2011 to 15.4% in 2015/2016.

1.11 In order for ROCs to be issued, the generating station that generates the electricity must be accredited by Ofgem as capable of generating electricity from eligible renewable sources. The participation of a generating station in the scheme is voluntary and there are certain criteria that need to be met before a station can be accredited.

1.12 The Orders set out what sources of electricity are eligible renewable sources and also specify the exclusion of certain types of generating stations, eg stations incinerating waste. Time limits for eligibility are placed on stations co-firing, ie burning biomass and fossil fuel to generate electricity. Article 8 of the Orders provides the detail of what is eligible for accreditation by Ofgem.

1.13 On what basis and how ROCs are to be issued are two key, related features of the scheme. Again, the criteria and rules for these features that need to be met and complied with by generating stations are set out in the Orders. Certain measurements, eg of biomass fuel, and calculations are required to be undertaken. Article 9 of the Orders sets out the calculation requirements.

1.14 Article 5 details when and how Ofgem must revoke ROCs and when Ofgem has some discretion about revocation. It also sets out when and how Ofgem may issue replacement ROCs.

1.15 The Orders also set out the criteria for compliance by suppliers, eg how a supplier's total sales in England and Wales are to be calculated, the limits on certain types of ROCs that can be produced, eg co-firing ROCs and how many ROCs can be carried forward from the previous obligation period. The relevant articles in the Orders are articles 3 and 6.

1.16 How the buy-out payments are to be submitted to Ofgem and redistributed back to ROCs-compliant suppliers is also set out in the Orders. Article 7 sets out the arrangements for a supplier who chooses to make buy-out payments instead of

producing ROCs for all or part of its obligation. Article 12 provides for the total buy-out payments received by Ofgem together with any interest earned, known as the buy-out fund, to be distributed back to suppliers who have correctly produced ROCs in proportion to the total number of correctly produced ROCs for the obligation period.

1.17 The calculation of the buy-out price is detailed in article 7 and requires Ofgem to take into account the annual retail prices index for each calendar year. The buy-out price was set at £30 per MWh for the first obligation period (April 2002 to March 2003) and has been calculated at £30.51 per MWh for the second period (April 2003 to March 2004).

1.18 The buy-out price is intended to act as a cap on the costs to be charged to consumers. In 2002/2003, the total Renewables Obligation across Great Britain was 9,261,566 MWh. Multiplying this by £30 gives a total cost to consumers of £277,846,980.

Administration of the Renewables Obligation

1.19 As administrator of the scheme, Ofgem has put in place a number of procedures and systems, including those to assess whether a generating station is eligible for accreditation or whether accreditation should be withdrawn, to assess whether ROCs should be issued or revoked and to assess a supplier's compliance with its Renewables Obligation.

1.20 The accreditation of a generating station involves an assessment of the accreditation application form and accompanying diagrams and declarations as well as any other evidence or information provided by the applicant, eg fuel supply and metering arrangements. When a generating station is accredited as being capable of generating from eligible renewable sources, Ofgem records the details in its Renewables Trading Information Management System (RTIMS) and notifies the generating station of its unique accreditation number. Accreditation does not guarantee the issue of ROCs although accreditation is required before any ROCs can be issued.

1.21 Ofgem may request certain information from accredited generating stations and may request the operator of a generating station to grant access to the premises to any person authorised by Ofgem and provide reasonable assistance to that person, including allowing that person to perform random checks. Such information requirements are set out in more detail in Ofgem's procedures for the Renewables Obligation published in February 2002 on Ofgem's website, www.ofgem.gov.uk.

1.22 In order to assess whether ROCs should be issued, certain information, ie the gross output and any electricity used by the accredited generating station, has to be provided to Ofgem for each month of generation within the two month timetable set out in the Orders. Other information also needs to be provided, eg sampling information, the energy contents of the fuels being used and the monthly supply declaration. The onus is on the accredited generating station to ensure that this information is provided on time. Once Ofgem has checked the information and calculations provided by the generating station and carried out some sample checks, the information is used to issue ROCs via RTIMS into the ROC Register[3], Ofgem's web-based system for issuing and transferring ownership of ROCs. ROCs do not exist until they have been issued by Ofgem into the ROC Register.

1.23 As well as operating routine checks and controls, Ofgem carries out audits each year on a sample of generating stations. The sample is chosen partly at random but also taking account of particular factors which could include those generating stations with the most complexity or which attract the most ROCs. Ofgem normally authorises independent consultants to carry out these audits on its behalf but may request any station to provide access to Ofgem's own staff. The auditor is required to audit a sample of stations to check on whether:

- information that has been provided for accreditation is correct and the station has been properly accredited, and
- metering arrangements and meter readings/output volumes notified to Ofgem are such that the correct number of ROCs are being issued each month.

[3] Registration and Operational Procedures for the ROC Register are available on Ofgem's website, www.ofgem.gov.uk.

1.24 The Orders detail the procedure for revoking ROCs in specified circumstances such as fraud on behalf of a generator, the electricity not being supplied to customers in Great Britain or the ROC being inaccurate. Ofgem has discretion about whether it revokes ROCs in other circumstances, eg where Ofgem considers that the ROC should not have been issued or Ofgem has reasonable doubts as to the accuracy or reliability of the information relied upon for the issue of the ROC. Ofgem must revoke the appropriate number of ROCs from those issued to the generating station in the particular month, revoking the highest sequence numbers first. Ofgem may issue replacement ROCs in certain circumstances which are, again, set out in the Orders. Ofgem uses RTIMS and the ROC Register in carrying out these functions.

1.25 The ROC Register is also used by suppliers to produce ROCs to Ofgem before the specified day as part of their compliance report. A compliance report has to be completed for the RO and the ROS respectively and suppliers can only produce ROCs that are in their accounts on the ROC Register. Each compliance report allows suppliers to record what their Renewables Obligation is and the amount of any buy-out payments being made. Ofgem set up bank accounts for the receipt of buy-out payments from suppliers and the redistribution of the buy-out fund, including any interest, to ROCs-compliant suppliers. The buy-out fund is redistributed to suppliers according to the number of ROCs that each supplier correctly produces to discharge their obligation compared to the total amount of eligible electricity supplied represented by the total number of ROCs correctly produced to the Authority for the obligation period.

1.26 Ofgem calculates each supplier's obligation based upon the amount of electricity it supplied to customers in Great Britain during the obligation period, as set out in article 6 of the Orders. Suppliers are required to provide such information to Ofgem before 7 August after the end of each obligation period.

Interactions with other policy instruments

1.27 Many of the generating stations accredited are also accredited under the Climate Change Levy exemption for renewables. As the eligibility criteria and basis for

calculations for Renewables Levy Exemption Certificates ("LECs") are different to those for ROCs, Ofgem issues ROCs first of all in the majority of cases where stations are accredited for both schemes and then the Renewables LECs.

1.28 The main interaction to date has been in regard to the Non-Fossil Fuel Obligation Orders ("NFFO") and the Scottish equivalent, the Scottish Renewable Obligation Orders ("SRO"). These were Orders imposed by the Secretary of State under the Electricity Act 1989 and were the primary means used by the Government to implement its renewable energy policy prior to the introduction of the Renewables Obligation. Five NFFO Orders were made in England and Wales and three SRO Orders were made in Scotland. These required the Public Electricity Suppliers ("PESs") to purchase electricity from renewable generators and provided for this electricity to be purchased at fixed prices for long term contract periods (typically 15 years). The last contracts are due to terminate in 2018. 581 NFFO contracts were issued under the last three NFFO Orders with 236 stations currently commissioned. 109 SRO contracts were awarded under the SRO Orders with 37 stations currently commissioned.

1.29 The power purchaser under each NFFO contract is the Non Fossil Purchasing Agency Limited ("NFPA"). The PESs established NFPA in England and Wales to enable them to carry out their obligations to collectively contract with renewable generators and so comply with the NFFO Orders. By entering into power purchase agreements at fixed prices with renewable generators, the PESs became eligible to be compensated for the differences between the Pool price (the reference price) and the contract prices through a levy, the "Fossil Fuel Levy", on electricity sales. This levy is paid by all electricity consumers.

1.30 With the implementation of the New Electricity Trading Arrangements and the Renewables Obligation, arrangements were put in place by Government to maintain the existing NFFO and SRO contracts. These arrangements include NFPA (now acting on behalf of the PES supply successor companies) carrying out an auction that is open to all licensed electricity suppliers in Great Britain for the NFFO electricity and accompanying ROCs (and Renewables LECs). A subsidiary of NFPA carries out a similar auction for SROCs only from SRO projects which the Scottish PES supply successor companies ("SSSCs") administer. Once the premium prices under the contracts have been paid to generators and

administration costs for the auctions have been met, the Fossil Fuel Levy account receives the additional proceeds from these auctions. This has enabled Ofgem to set the Fossil Fuel Levy rate at zero per cent following the introduction of the Renewables Obligation.

1.31 Provisions in the Orders, referred to as the 'site sterilisation' provisions, mean that any station at the location of an existing NFFO or SRO contract is excluded until the NFFO or SRO project is commissioned and selling electricity under that contract. These restrictions also apply where NFFO or SRO contract holders have defaulted on their contract obligations. These provisions mean that any other station at the location of the NFFO or SRO contract will not qualify for ROCs unless the NFFO or SRO station is generating and selling electricity under the contract. Paragraphs 5.15 to 5.19 provide more detail on issues that have arisen as a result of these interactions.

The annual report

1.32 This report fulfils the requirement on the Authority to produce an annual report in relation to the first obligation period (1 April 2002 to 31 March 2003) under both the RO and the ROS. This report incorporates information on both the RO and ROS and uses the term RO to denote both the RO and the ROS and the terms ROCs to denote both ROCs and SROCs unless otherwise indicated.

1.33 Chapters 2, 3, 4 and 5 fulfil the reporting requirements of providing details on:

- the total number of ROCs issued by Ofgem during the first obligation period
- that number broken down by the technologies of the different types of eligible generating stations
- the total number of ROCs correctly produced to Ofgem during the first obligation period
- the total number of ROCs remaining on the ROC Register for use in the next period
- the extent of compliance by each individual licensed supplier

- how each individual licensed supplier has complied with their obligation (produced ROCs, made buy-out payments or a combination of both)
- the amount of redistributed buy-out fund each licensed supplier has received
- summaries of the outcomes of any enquiries or investigations regarding implementation of the RO and compliance by suppliers and operators of generating stations, and
- any other matters which Ofgem considers relevant to the implementation of the Orders.

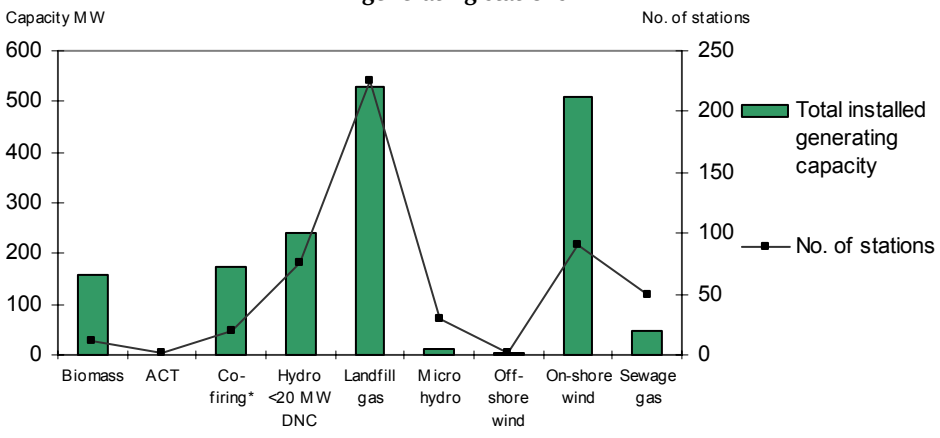
1.34 Chapter 6 focuses on the recent review of the RO and the ROS consulted on by DTI and the Scottish Executive respectively.

2. Compliance by operators of generating stations

Accreditation of generating stations

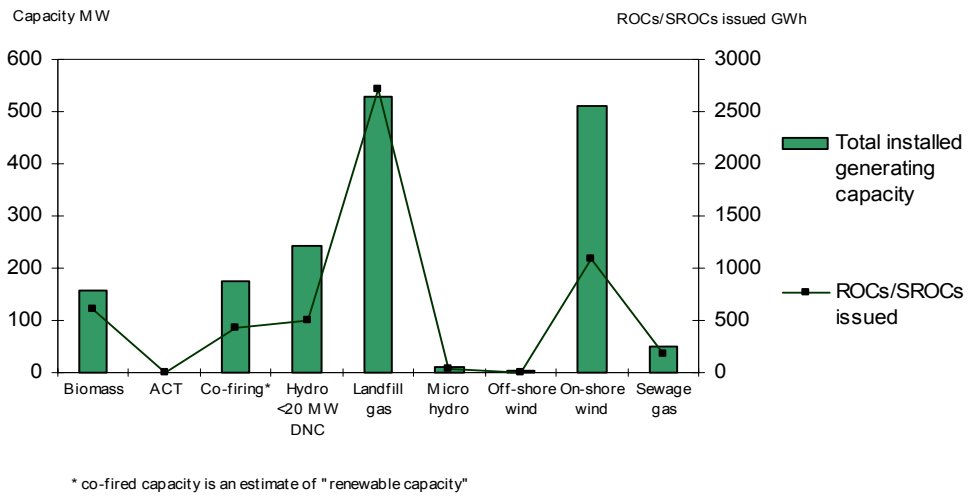
2.1 Ofgem accredited 431 generating stations when the RO took effect on 1 April 2002. 74 more were accredited during the first obligation period with 57 of these being newly commissioned stations. Table A1 in Appendix 1 shows the breakdown of these stations by technology and country as of 31 March 2003 with the majority being landfill gas stations located in England. Table A2 details the total installed generating capacity with the English stations providing over two thirds of that capacity[4]. Figure 1 provides a comparison of the number of accredited stations and their capacity by technology while Figure 2 compares this to the ROCs issued.

Figure1:A comparison of the capacity and number of accredited generating stations



[4] This includes an estimate of the renewable capacity for the co-firing stations.

Figure 2:A comparison of the capacity and ROCs and SROCs issued for accredited generating stations



* co-fired capacity is an estimate of "renewable capacity"

2.2 The pie charts in Figures 3 and 4 compare the number and capacity by percentage of the accredited stations by country. The Scottish stations' total capacity is higher in comparison to the total number of Scottish stations (as is that for stations located in Wales) than for English stations.

Figure 3:A comparison of the number of accredited generating stations by location

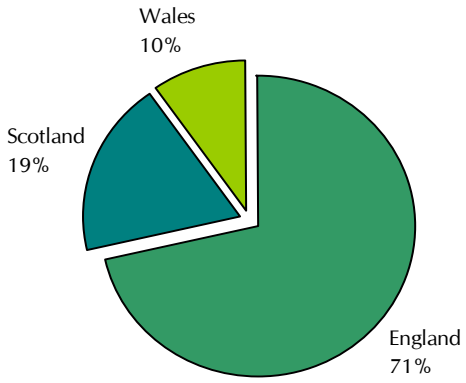
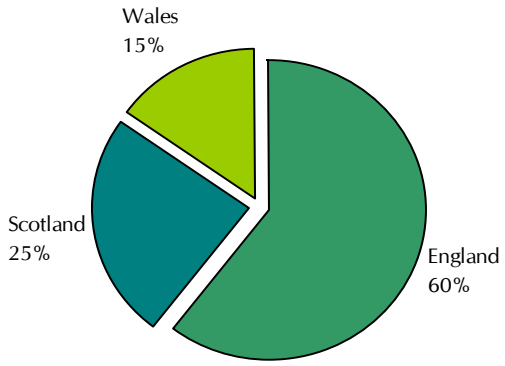


Figure 4:A comparision of the capacity of accredited generating stations by location*



*co-fired capacity is an estimate of "renewable capacity"

2.3 216 NFFO and 34 SRO stations were accredited in the first obligation period as shown in Table A3 in Appendix 1. This compares to 193 non-NFFO and 62 non-SRO stations. The capacities are very similar however as Table A4 demonstrates. Although fewer non-SRO stations were accredited in the year compared to non-NFFO, the capacity was just under three times as much. This demonstrates that stations being built in Scotland were usually larger during the first obligation period.

2.4 Tables A5 to A8 in Appendix 1 provide detailed information on the technology, capacity and commissioning of accredited stations. Figures 5 and 6 represent some of this information. Figure 5 shows the percentages of the technologies of the stations accredited at 1 April 2002 compared to the technologies of those accredited after that date and before 1 April 2003. Figure 6 provides detail on the percentages of capacity for those stations, again comparing this to the technology types.

Figure 5:A comparison of the number of generating stations accredited at or after the start of the Renewables Obligation in the first period

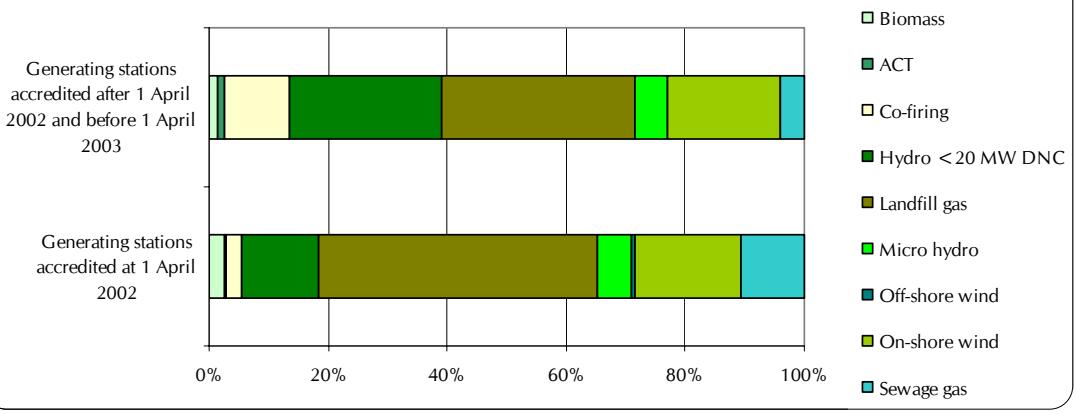
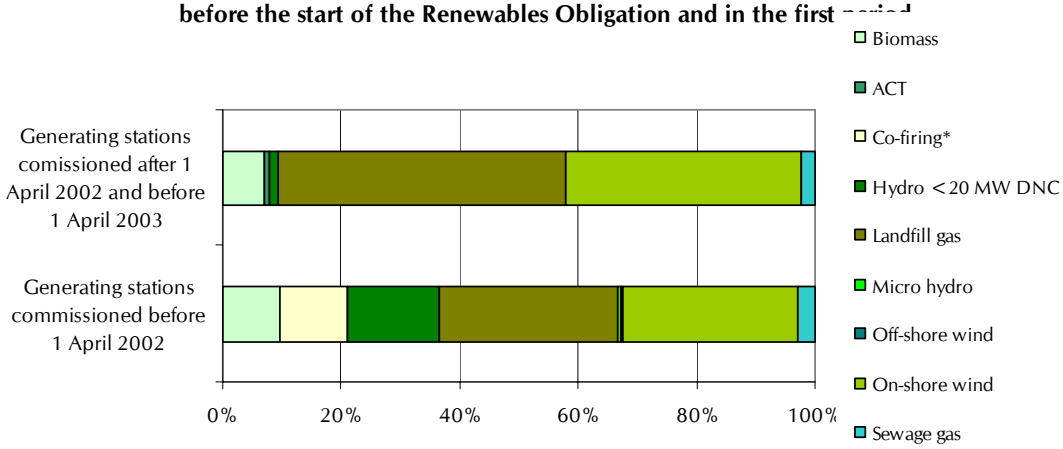


Figure 6:A comparison of the capacities of generating stations commissioned before the start of the Renewables Obligation and in the first period



* co-firing is an estimate of "renewable capacity"

2.5 Table A9 in Appendix 1 provides some detail on those stations classified as "co-firing biomass with fossil fuel". It shows the maximum renewable qualifying percentage achieved in any month during the first obligation period and an estimate of "renewable" capacity for each co-fired station. Small amounts of biomass have been burned by the originally coal-fired stations while they were testing the use of biomass in the stations.

Compliance by generating stations

2.6 Ofgem carried out 20 audits of accredited generating stations throughout the first obligation period. While most of the outcomes were satisfactory, some recurring

issues did arise. The main issues have been picked out and are described in more detail in chapter 5.

2.7 Given the complexities of the Orders, it might be expected that generators, especially the smaller and independent ones, would have experienced some confusion and misunderstanding at the start of the scheme and the audits seem to bear this out. As more queries are dealt with and further clarification is given, Ofgem would expect the scope for such misunderstanding and confusion to reduce.

2.8 As a result of the audits, Ofgem has issued further clarification to generators and has entered into detailed correspondence with many generators to ensure that electricity is being classified and measured correctly as either "input electricity" or 'eligible own use'.

2.9 The audits highlighted that generators were not always completing application forms correctly and so Ofgem has revised the form and the accompanying guidance notes with the aim of reducing the occurrence of common mistakes.

2.10 Some of the generating stations audited had not been advising Ofgem of certain information of relevance to the issue of ROCs, eg that metering data was in fact estimated, that they had diesel standby generators or that biomass sampling was not carried out in the particular month of electricity generation for which the ROCs were to be issued. Ofgem will accept estimated output data in certain cases but only where it is notified and agreed in advance. However, the sampling and measurement of biomass and other fuels must always be carried out in respect of the fuel burned in the month in question. Ofgem's Procedures on the Renewables Obligation and its guidance on fuel sampling and measurement, both available on Ofgem's website, www.ofgem.gov.uk, provide more detail.

2.11 Ofgem expects generators to provide accurate and complete information and to notify Ofgem of any changes to the information originally provided. This is so that Ofgem can properly assess the accreditation, including where reassessment might be required, and properly issue the correct number of ROCs each month. While the majority of generators have been forthcoming with such information,

this has not always been the case. Indeed, certain information has only come to light as a result of the audits with Ofgem refusing to issue ROCs until satisfied of the reliability and accuracy of the information being presented to it.

2.12 Ofgem has increased the percentage size of the sample for audits in the second obligation period and will continue to review what size of sample it considers necessary to ensure the integrity of the scheme going forward.

Rejection of applications for accreditation

2.13 Ofgem rejected 9 applications for accreditation under the RO. The reasons for the rejections include: the generating station not being under the 20 MW declared net capacity threshold for hydro generating stations; a waste generating station not using one or more of the advanced conversion technologies; the generating station being located at the location of an unfulfilled NFFO/SRO contract; the generating station not being a micro hydro station; and a generating station commissioned prior to 1 January 1990 not having renewed the main components of the station.

Withdrawal of accreditation

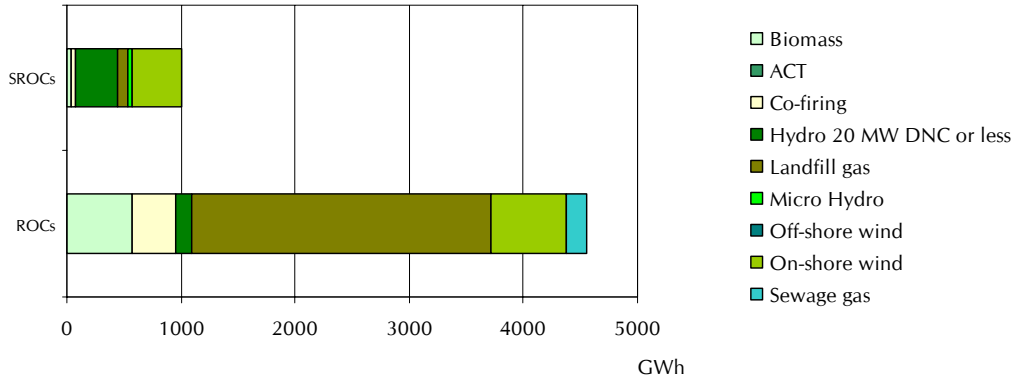
2.14 Ofgem withdrew accreditation from one station located at the location of an unfulfilled NFFO contract. This came to Ofgem's attention as a result of routine internal compliance checks and accreditation was withdrawn before any ROCs were issued.

3. Certificates issued

ROCs and SROCs issued

3.1 Ofgem issued 5,562,669[5] certificates with respect to electricity generated between 1 April 2002 and 31 March 2003. This was made up of 4,552,524 ROCs and 1,010,145 SROCs. Appendix 2 includes various tables showing further detail on ROCs and SROCs issued in the first period. For example, the breakdown by generation technology, ie the description of generating station, of the ROCs and SROCs issued is shown in Table B1 with the breakdown by month being shown in Table B2. Figure 7 represents the former graphically.

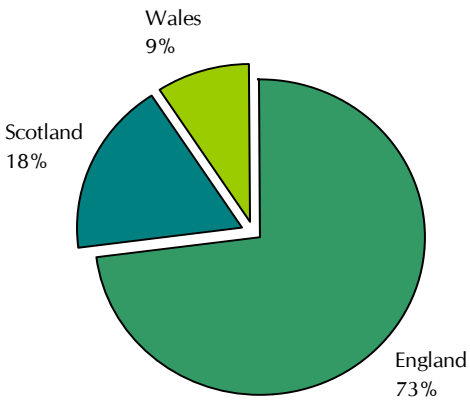
Figure 7:A comparison of ROCs and SROCs issued by generation technology



3.2 Figure 8[6] shows that renewable generating stations located in England receive the majority of ROCs; 73% compared to 18% and 9% for accredited generating stations sited in Scotland and Wales respectively.

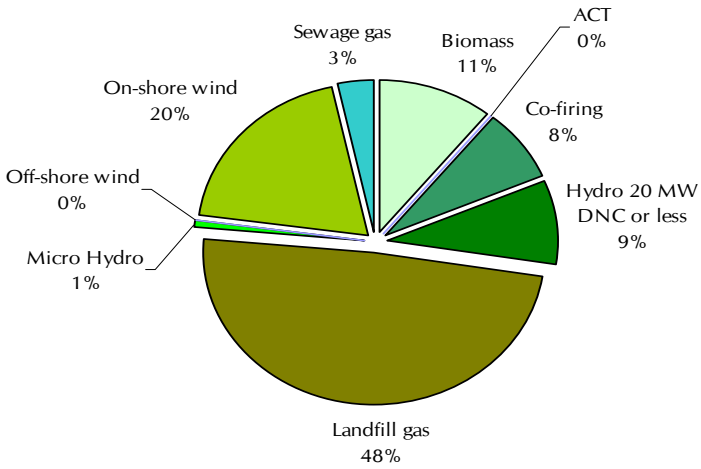
[5] This number is different to previously published numbers as certificates will have been issued on a back-dated basis. Each ROC represents one MWh of eligible renewable electricity generated.
[6] Please note that all percentages have been rounded.

Figure 8:ROCs and SROCs issued by generation location



3.3 Figure 9 below shows the percentages of ROCs issued by each technology for both the RO and the ROS. Landfill gas generation attracts almost 50% of the ROCs issued to date with on-shore wind generation being the next largest technology. Co-firing generation attracted just under 8% of the total ROCs.

Figure 9:ROCs and SROCs issued by generation technology



3.4 Figures 10, 11 and 12 represent the percentages of ROCs issued by technology for each country in Great Britain. Landfill gas generation dominates in England while on-shore wind generation is the largest originator of ROCs in both Scotland and Wales. Hydro generating stations (those with a declared net capacity of 20 MW or below and which are not micro hydro) represent the second largest technology contributing ROCs in Scotland with over a third being generated from that source and the second largest contributor in Wales representing just under a quarter of ROCs.

Figure 10:ROCs and SROCs issued for generation in England by technology

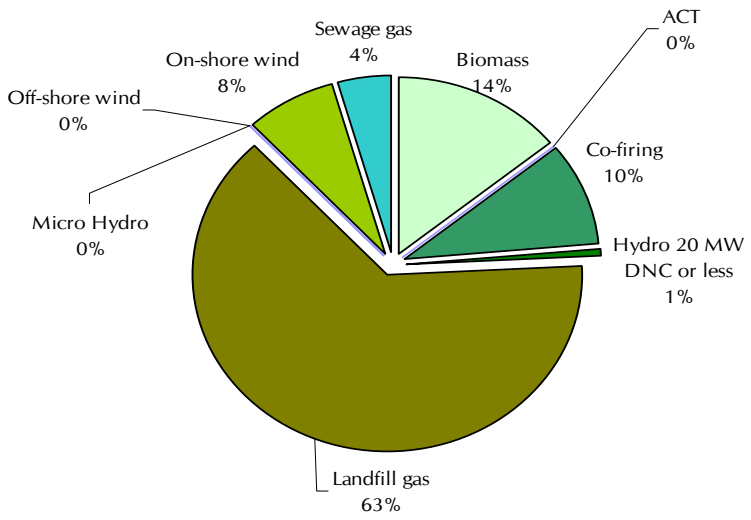


Figure 11:ROCs and SROCs issued for generation in Scotland by technology

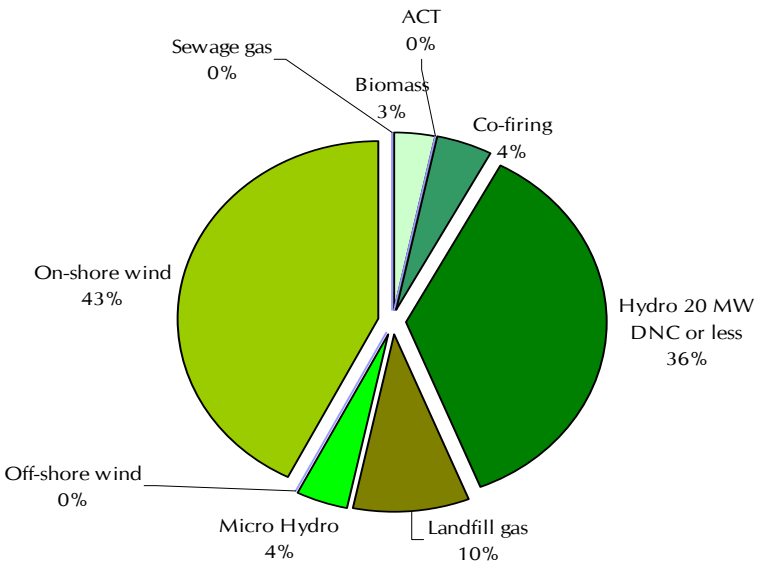
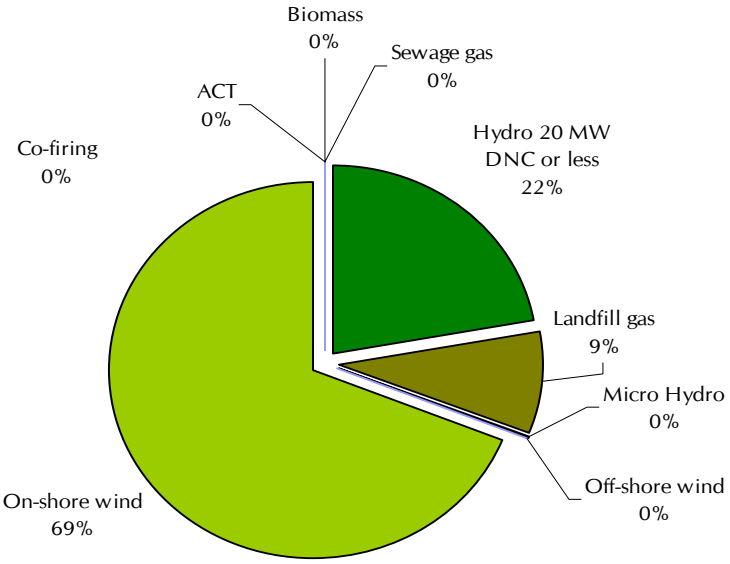


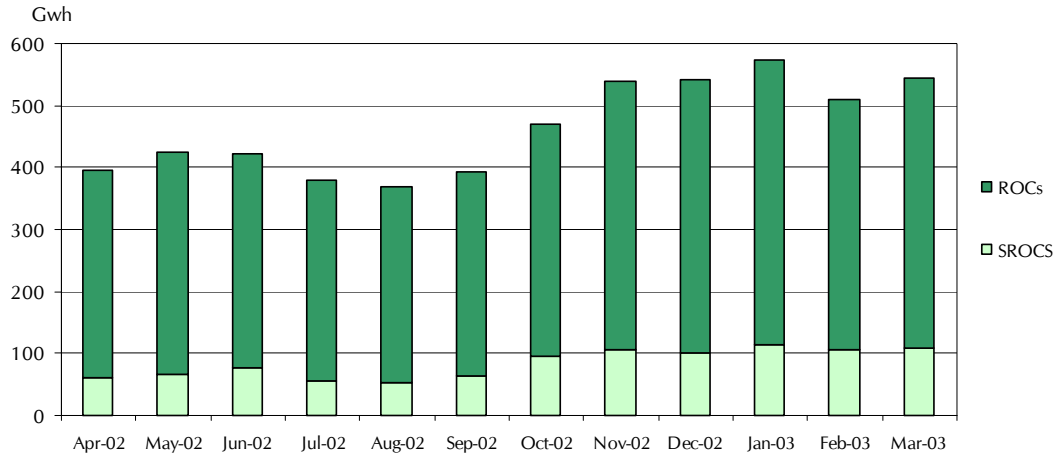
Figure 12:ROCs and SROCs issued for generation in Wales by technology



3.5 The bar chart shown in Figure 13 represents the breakdown of ROCs issued each month in the first obligation period as detailed in Table B2 in Appendix 2. As should be expected, there is indication of a seasonal spread (with more electricity generated in the winter months) but it will be interesting to compare

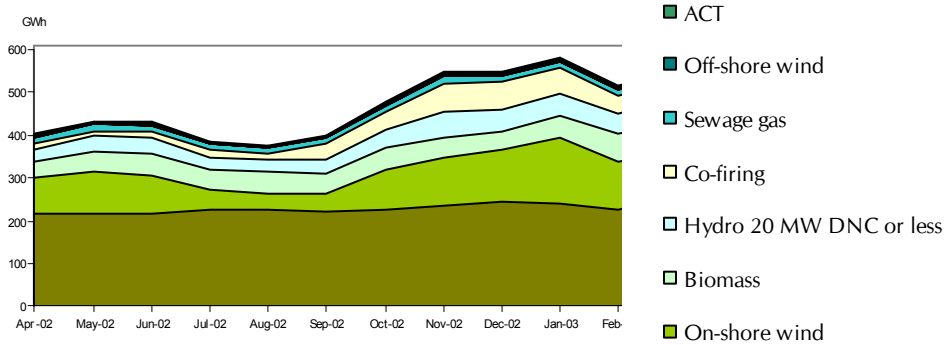
(on a month by month basis) how many more ROCs are issued for the second period given the increase in the number of accredited stations.

Figure 13:ROCs and SROCs issued by month of generation



3.6 The following graph shows the number of ROCs issued by technology and by month since the beginning of the Renewables Obligation.

Figure 14:ROCs and SROCs issued by generation technology



ROCs and SROCS revoked

3.7 Ofgem revoked 2,428 ROCs and no SROCs in the first Obligation period. In the one case in which Ofgem revoked ROCs, more replacement ROCs were issued subsequently.

3.8 The 2,428 ROCs were revoked because correspondence with the operator of a generating station led Ofgem to determine that the station should be accredited under both the biomass and co-firing technology codes, and the ROCs in question should have been issued as biomass ROCs. This was because the percentage of fossil fuel the generating station used could vary from month to month and that use was not always for one or more of the specified minimal fossil uses. 2,604 replacement ROCs were issued with the additional number being due to some of the fossil use being determined not to have contributed to electricity generation.

4. Compliance by suppliers

4.1 Suppliers are required to comply with the Renewables Obligation which is also a relevant requirement of the supply licence. If any supplier fails to meet any duty or other requirement imposed on them by the Orders, the supplier may be in breach of a relevant requirement of their supply licence. If after considering the case, the Authority found a supplier to be in breach of a relevant requirement of their supply licence, the Authority may consider imposing a financial penalty.

4.2 Ofgem started corresponding with all licensed suppliers at the end of May 2003 to remind them of their obligations and to start to put in place the necessary arrangements for compliance. A workshop for suppliers was held on 29 July 2003.

Total Renewables Obligation for England and Wales and for Scotland

4.3 For the first obligation period, the total Renewables Obligation for electricity supplied to customers in England and Wales was 8,393,972 MWh, and for electricity supplied to customers in Scotland was 867,596 MWh.

4.4 The total numbers of ROCs and SROCs correctly produced to Ofgem before the 1 October 2003 statutory deadline were 4,973,091 for England and Wales and 478,358 for Scotland.

4.5 The total buy-out payments received before the 1 October 2003 statutory deadline were £78,853,260 for England and Wales and £11,210,730 for Scotland.

4.6 The total buy-out funds for the first obligation period to be redistributed, including interest, were £79,251,930 for England and Wales and £11,267,124 for Scotland.

4.7 This meant that each supplier who correctly produced ROCs or SROCs under the RO received £15.94[7] back per certificate and each supplier who correctly produced SROCs or ROCs under the ROS received £23.55 back per certificate, giving a difference of £7.61.

4.8 105,535 ROCs and 5,685 SROCs issued during the first obligation period were not produced before 1 October 2003 and remain on the ROC Register for use in the next obligation period.

Licensed suppliers who had an obligation

4.9 Out of 71 licensed suppliers in England and Wales, 38 had a Renewables Obligation under the RO because they were supplying in England and Wales and out of 66 licensed suppliers in Scotland, 28 had a Renewables Obligation under the ROS as they were supplying in Scotland. 27 had an obligation under both Orders. The tables in Appendix 3 provide the amounts of Renewables Obligation under each Order for each supply licensee.

4.10 Powergen Retail had the largest obligation in England and Wales at 1,108,123 MWh (3% of its total sales) followed by EDF Energy plc and Npower Ltd. ScottishPower Energy Retail Ltd was the largest supplier in Scotland with an obligation amounting to 412,252 MWh with SSE Energy Supply Ltd having one of 223,344 MWh and British Gas Trading Ltd's obligation coming to 87,634 MWh.

4.11 The tables in Appendix 3 also provide the compliance details for each licensed supplier by Order. They highlight how each of these suppliers met their obligations, whether through producing ROCs, making a buy-out payment or a combination of both.

4.12 Tables C1 and C2 in Appendix 3 show that 12 licensed suppliers in England and Wales and 16 licensed suppliers in Scotland met their obligations wholly through producing ROCs.

---

[7] All the amounts in this paragraph have been rounded.

4.13 The tables also show which licensed suppliers met their obligations wholly by making buy-out payments.

4.14 Figures 19 and 20 represent what each supplier who correctly produced ROCs against their RO or ROS respectively produced in terms of co-fired ROCs. For ease of reference, these graphs group together each of the supply licences, against which there were Renewables Obligations, held by a group company. The detail by each licence is provided in Tables C3 and C4 in Appendix 3.

Figure 19:A comparison of the percentage of each supplier's RO that was satisfied by ROCs or SROCs

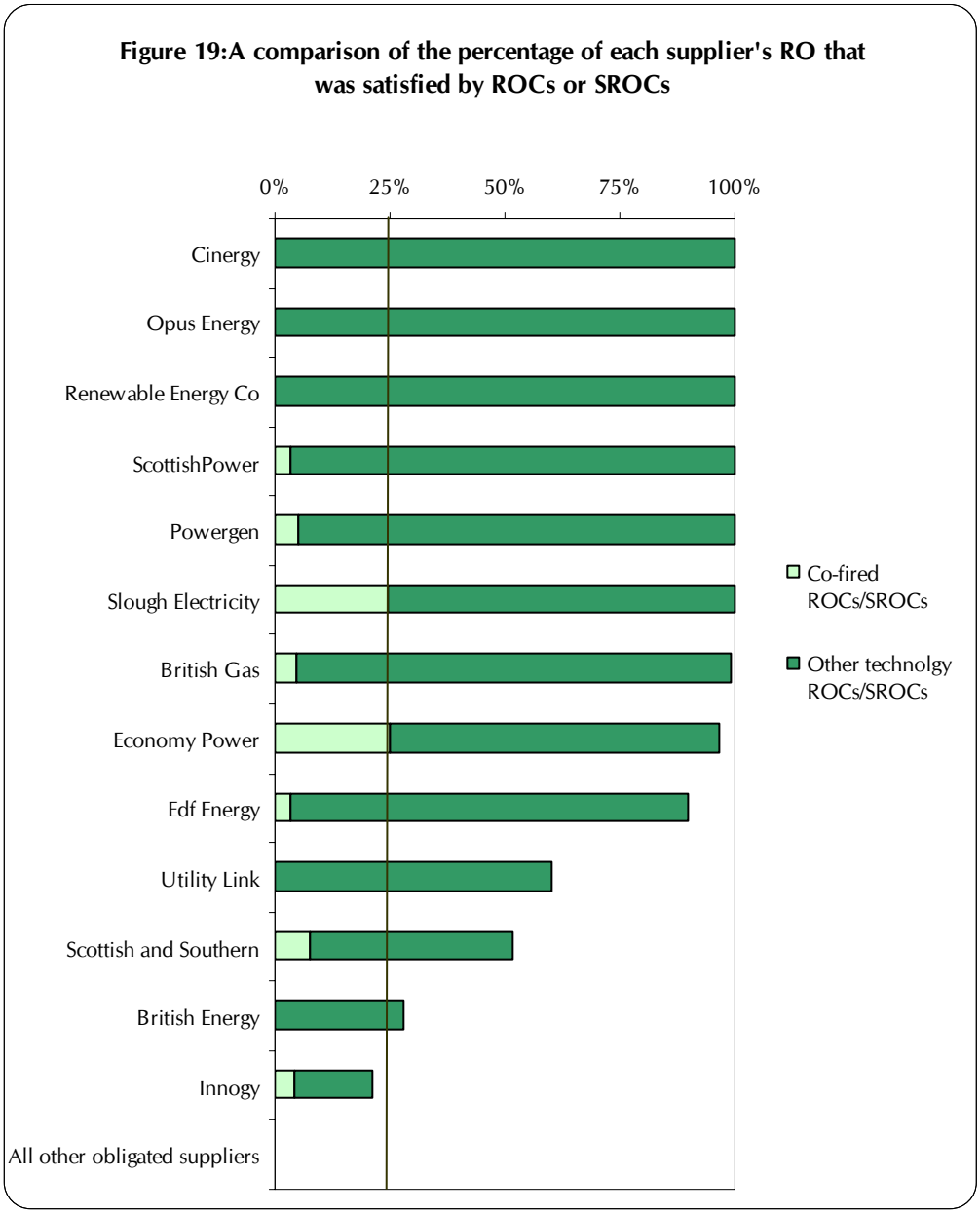
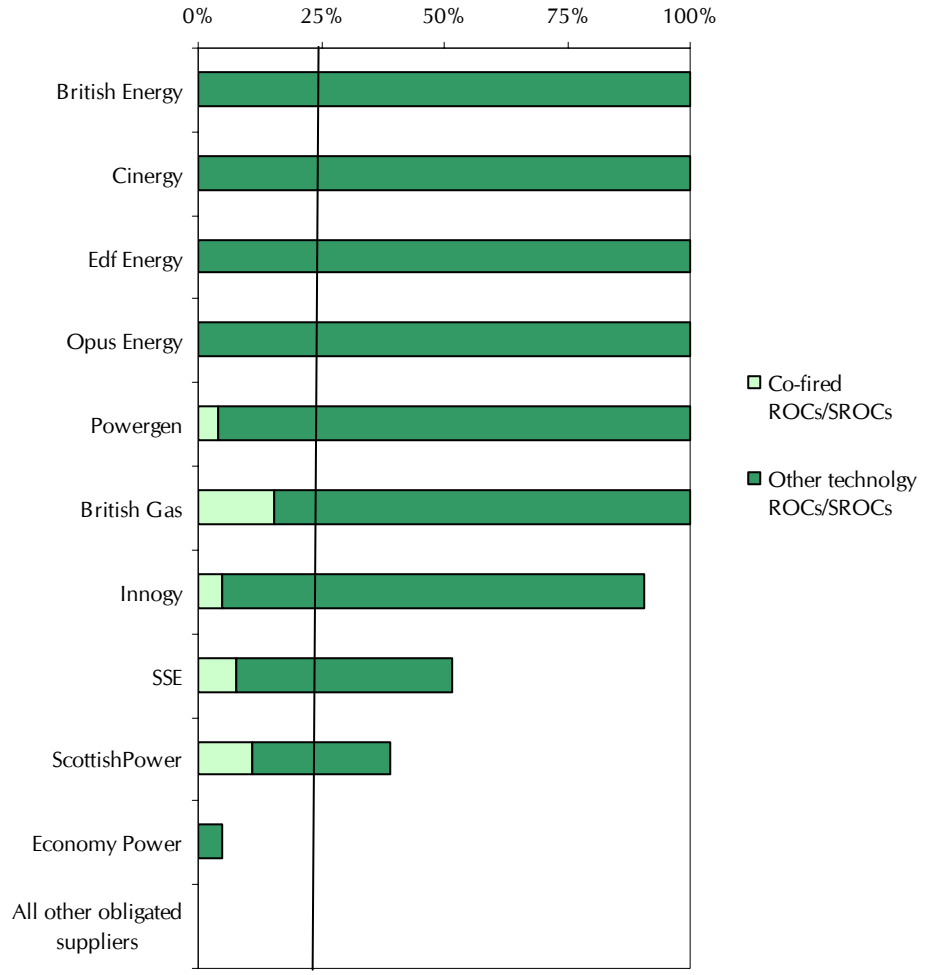


Figure 20:A comparison of the percentage of each supplier's ROS that was satisfied by ROCs or SROCs



4.15 23 licensed suppliers received buy-out redistribution totalling £79,251,930 under the RO with 19 receiving buy-out redistribution totalling £11,267,124 under the ROS. Tables C5 and C6 provide the detail of what each supplier received back under each Order by percentage and amount. Powergen Retail Ltd received the largest amount under the RO, £17,659,217 and ScottishPower Energy Retail Ltd received the largest amount under the ROS, £3,778,730. Figures 21 and 22 compare the amounts received by each supplier (or group) under the RO and the ROS.

Figure 21:A comparison of the buy-out fund paid to suppliers under the RO

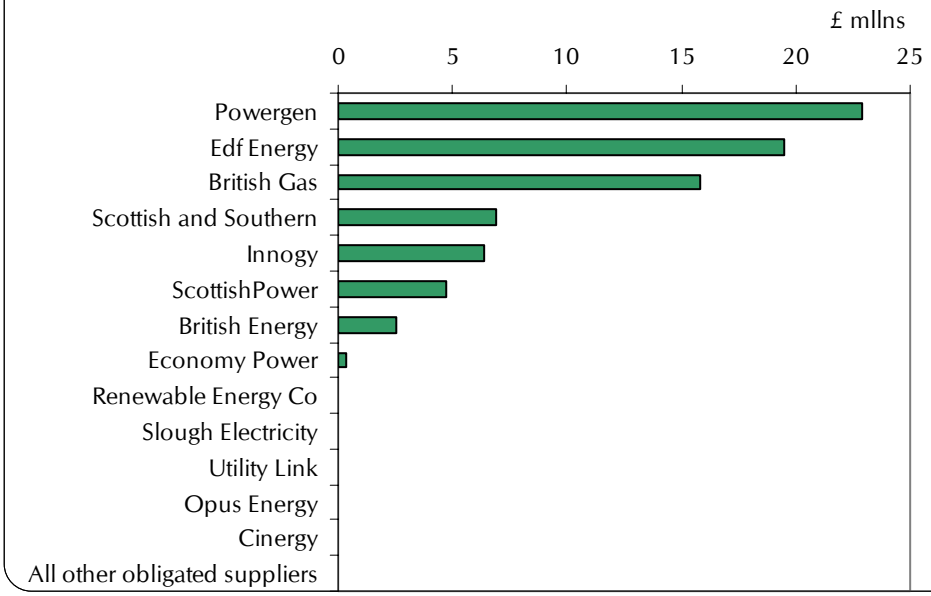
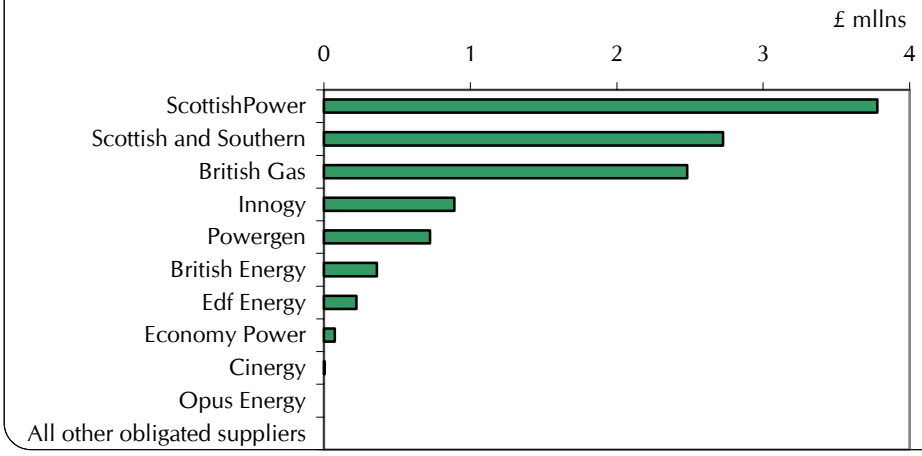


Figure 22:A comparison of the buy-out fund paid to suppliers under the ROS



Licensed suppliers who did not provide information to DTI on their sales volumes

4.16 The requirement in article 6(5) of the Orders is that licensed electricity suppliers must provide to DTI their estimated figures relating to their total sales of electricity to customers in England and Wales and Scotland during an obligation period by no later than 20 June immediately following the end of the obligation

period. 31 licensed suppliers failed to provide information to DTI as required by the due date. These suppliers are shown in the table below.

Accord Energy Ltd	Enron Direct Ltd
AEP Energy Services Ltd	Essential Power Ltd
AES Power Direct (UK) Ltd	Fortum Direct
AES Barry Operations Ltd (Centrica)	Gaz De France Marketing Ltd
Affinity Power Ltd	International Power plc
Allied Domecq (Holdings) plc	Midlands Gas Ltd
Atlantic Electric and Gas Ltd	OwnLabel Energy Ltd
BP Power Trading Ltd	Opus Energy Ltd
British Gas Trading Ltd	Pentex Oil and Gas Ltd
Cinergy Global Trading Ltd	Seeboard Powerlink Ltd
Citigen (London) Ltd	SmartestEnergy Ltd
Commercial Electricity Supplies Ltd	Telecom Plus plc
Corona Energy 4 Retail Ltd	TXU Europe (AHG) Ltd
EDF Trading Ltd	Unit Energy Ltd
Electricity Direct (UK) Ltd	Wilton Energy Ltd
Enizade Ltd	

4.17 While these suppliers are in breach of a relevant requirement of their supply licence, as the breach related to the first obligation period under the Orders and suppliers may not have been clear as to their obligations in this respect, Ofgem does not intend to pursue this matter at this time.

Licensed suppliers who did not provide information to Ofgem on their sales volumes

4.18 The requirement in article 6(6) of the Orders is that each electricity supplier must provide to Ofgem the amounts in MWh of their Renewables Obligations for the obligation period in question and the amounts of all electricity supplied to customers in England and Wales and in Scotland during an obligation period before 7 August immediately following the end of the obligation period. 29 licensed suppliers failed to provide information to Ofgem as required by the due

date. They subsequently provided the information in order to enable their obligations to be calculated. These suppliers are shown in the following table.

AEP Energy Services Ltd	Fortum Direct
AES Power Direct (UK) Ltd	Gaz De France Marketing Ltd
AES Barry Operations Ltd (Centrica)	Ineos Chlor Ltd
AES New Energy Ltd	International Power plc
Affinity Power Ltd	OwnLabel Energy Ltd
Allied Domecq (Holdings) plc	Opus Energy Ltd
Atlantic Electric and Gas	Pentex Oil and Gas Ltd
BizzEnergy Ltd	Powergen (UK) plc
BP Power Trading Ltd	Renewable Energy Company Ltd
Cinergy Global Trading Ltd	SmartestEnergy Ltd
Commercial Electricity Supplies Ltd	SSE Energy Supply Ltd
Corona Energy 4 Retail Ltd	Telecom Plus plc
EDF Trading Ltd	UK Electric Power Ltd
Enron Direct Ltd	Unit Energy Ltd
Essential Power Ltd	

4.19 While these suppliers are in breach of a relevant requirement of their supply licence, as the breach related to the first obligation period under the Orders and suppliers may not have been clear as to their obligations in this respect, Ofgem does not intend to pursue this matter at this time.

Licensed suppliers who had no obligation

4.20 33 licensed suppliers had no obligation under the RO and 38 had no obligation under the ROS either because they had no sales to customers in the first obligation period or because all their sales were to transmission connected customers only. Supply to transmission connected customers is not supply within the meaning of the Electricity Act 1989 and so is also not subject to the Renewables Obligation. The Energy Bill currently before Parliament contains

provision to amend the definition of supply in the Electricity Act 1989 so as to include supply to transmission connected customers

4.21 Tables C7 and C8 in Appendix 3 show these suppliers. All of them had either no sales to customers for the period in question or their sales were only to transmission connected customers.

Licensed suppliers who failed to produce the required number of ROCs or make the full alternative payment to the buy-out fund before 1 October 2003

4.22 Seven suppliers failed to produce the required number of ROCs or make the full alternative payment to the buy-out fund before 1 October 2003. The following table summarises the details.

Supplier	Reason	Obligation
TXU (UK) Ltd	Company in administration (£22,778,310 and £327,960 buy-out respectively owed)	RO and ROS
Maverick Energy Ltd	Company in administrative receivership (£515,640 and £13,770 buy-out respectively owed)	RO and ROS
Electricity Direct (UK) Ltd	More than 25% of ROCs produced were co-fired (26% = 1455 additional ROCs)	RO
Npower Direct Ltd	More than 25% of ROCs produced were co-fired (100% = 3839 additional ROCs)	ROS
Economy Power Ltd	More than 25% of ROCs produced were co-fired (28% = 735 additional ROCs)	RO
BizzEnergy Ltd	Produced ROCs (6969) after the statutory deadline	RO
Corona Energy 4 Retail Ltd	Submitted the correct buy-out payments (£204,450 and £9,510 respectively) after the statutory deadline	RO and ROS

4.23 As stated in paragraph 4.2, Ofgem began communicating with all licensed suppliers at the end of May 2003 to remind them of their obligations and to start to put in place the necessary arrangements for compliance.

4.24 This correspondence led to TXU (UK) Ltd's ("TXU") Administrator, Ernst & Young, indicating that they could not yet confirm what they were planning to do to ensure compliance with TXU's Renewables Obligation. Ofgem notified industry of this in its Information Note R/76 published on 12 August 2003 and of the estimated potential amount of any buy-out shortfall. Further communication with the Administrator led to Ofgem being advised that TXU would be unable to meet its Renewables Obligation. Ofgem subsequently issued a Provisional Order under section 25(2) of the Electricity Act 1989 on 25 September 2003 requiring TXU to either produce ROCs or pay the total calculated buy-out amount of £23,106,270 before 1 October 2003, after which date the Provisional Order would cease to have effect.

4.25 In parallel, Ofgem was also in communication with Maverick Energy Ltd ("Maverick") who had gone into administrative receivership in June 2003. This correspondence also led to a Provisional Order under section 25(2) of the Electricity Act 1989 being issued on 25 September 2003 requiring Maverick to either produce ROCs or pay the total calculated buy-out amount of £529,410 before 1 October 2003, after which date the Provisional Order would cease to have effect. Information Note R/92 advising of both these Provisional Orders was published on 26 September 2003.

4.26 On 1 October 2003, Ofgem confirmed that both TXU and Maverick had failed to discharge their Renewables Obligations by not producing ROCs and by not paying the appropriate amount of buy-out before that date.

4.27 The Authority is currently considering whether further enforcement action will be taken against TXU and Maverick.

4.28 Ofgem is aware that TXU's Administrator made a successful application to court on 29 September 2003 to seek leave to negotiate directly with suppliers who make claims for direct losses sustained as a result of TXU's failure to pay into the buy-out fund. Ofgem is also aware that such claims have been made by suppliers.

4.29 The remaining five companies agreed to make voluntary payments pro rata to suppliers who had correctly produced ROCs for the first obligation period.

These payments totalled £606, 863 (when rounded) with interest included and should have been paid by 1 December 2003. A breakdown of this total is given in the table below.

Supplier	**RO**	**ROS**
Bizzenergy Ltd	£210,102.51	
Corona Energy 4 Retail Ltd	£205,441.41	£9,556.12
Economy Power Ltd	£22,158.90	
Electricity Direct (UK) Ltd	£43,865.57	
Npower Direct Ltd	£115,738.77	

4.30 Ofgem returned the excess co-fired ROCs, and the ROCs produced and buy-out payments made after the statutory deadline to the companies in question.

4.31 Ofgem confirmed with the affected suppliers that all but one of the voluntary payments had been made by 1 December 2003. The one outstanding payment is for £8.95 and is expected to be settled shortly.

5. Issues raised

5.1 The administration of the RO during the first obligation period has highlighted some operational issues which are described in the following paragraphs.

Definition of a generating station

5.2 A number of the provisions of the Orders refer to a generating station. There is no definition of a generating station in the Electricity Act 1989 or the Orders although there is a definition of a hydro generating station.

"Input electricity"

5.3 "Input electricity" is defined in the Orders as "all the electricity used by a generating station in that month (whether generated by that generating station or not) for a purpose directly relating to the operation of that generating station, including fuel handling, fuel preparation and pumping water". The Orders are clear that this electricity has to be deducted regardless of whether the station is itself generating electricity or not at the time the "input electricity" is used. However, this seems not to have been understood by all generators.

"Eligible own use"

5.4 For electricity to be eligible for ROCs, it must have been supplied to a customer in Great Britain by a licensed supplier. Article 10 provides for electricity to be treated as if it had been supplied by a licensed supplier to a customer in Great Britain where it is sold by the operator of a generating station to a licensed electricity supplier and is then purchased and consumed by the operator of the generating station. Such an arrangement is known as a 'sell-and-buy-back' contract. Suppliers entering into these contracts should be aware of the requirements of Schedule 7 to the Electricity Act 1989 which relates to the metering of supplies to customers. This Schedule provides that meters measuring the supply of electricity to customers have to be appropriate, of an approved pattern or construction, installed in an approved manner and, in certain circumstances, certified.

"Minimal fossil use"

5.5 Some participants were unclear about the specified purposes for minimal fossil use as defined in the Orders and considered that fossil fuel used for maintenance of the generating station was a specified use when this is not the case.

Classification and calculations for ROCs

5.6 A related issue concerned the classification of generating stations according to their use of fossil fuel. The provisions in articles 8 and 9 are complicated and require Ofgem to consider what is "fuelling" the generating station, what "fuel" the generating station is "using" in respect of minimal fossil use (which refers to "use" rather than "fuel"), and the amount of electricity being generated from respective fuel sources.

5.7 In calculating the amount of electricity generated from eligible renewable sources under article 9, electricity which is used by the generating station when the station is not generating electricity is taken into account and is deducted from the output but fuel used by the generating station when the station is not generating electricity is excluded from the calculations.

5.8 Ofgem issued guidelines in April 2003[8], to provide clarification on the issues outlined above. In particular, they provide guidance on what Ofgem considers to be a generating station for the purposes of the Orders, "input electricity", specified purposes for minimal fossil use and what fuel is used for generating electricity. This guidance, available on Ofgem's website, www.ofgem.gov.uk, is likely to be reviewed and may be revised should the Renewables Obligation (Amendment) Order 2004 and the Renewables Obligation (Scotland) Order 2004 receive Parliamentary approval.

[8] The Renewables Obligation – definition of a generating station, Ofgem's guidelines

Down-rating of hydro generating stations

5.9 The Orders define a hydro generating station (see paragraph 5.2). They also define a large hydro generating station as being one "which has, or has had at any time since 1 April 2002, a declared net capacity of more than 20 MW". This provision allowed what would otherwise have been large hydro generating stations to down-rate their declared net capacity (DNC) to 20 MW or below before 1 April 2002 in order to be eligible for accreditation under the Orders. In relation to a hydro generating station, the Orders define DNC as:

"the highest generation of electricity (calculated by adding together the highest generation of electricity at the main terminals of each alternator and dynamo) which, on the assumption that the source of power is available uninterruptedly, can be maintained indefinitely without causing damage to the plant less so much of that electricity as is consumed by the plant".

5.10 Ofgem is aware that ten stations have taken advantage of this provision and have undertaken activity to ensure that their DNCs were under or at the threshold prior to the statutory deadline of 1 April 2002. The details are provided in the following table:

Hydro generating station	**Original DNC in MW**	**DNC at 31/3/03**	**Accreditation date**
Kinlochleven	30	19.5	April 2002
Dolgarrog High Head*	37	18.4	April 2002
Dolgarrog Low Head*		14.98	April 2002
St Fillians	21	16.83	September 2002
Mossford	24	18.6	February 2003
Shin	24	18.62	June 2003
Quoich	22	18.05	July 2003
Finlarig	30	16.05	December 2003
Grudie Bridge**	24	18.66	
Culligran**	24	17.1	
Total	236	176.79	

*Dolgarrog was previously treated as one hydro generating station but took action to be treated as two hydro generating stations as per the definition in the Orders. **These stations are either only recently accredited or have not yet sought accreditation as, having commissioned prior to 1 January 1990, they would have been required to also renew the main components of the generating stations before they would be eligible for accreditation.

5.11 The capacity that was down-rated equated to 59.21 MW in total. This ranged from 3.62 MW for the down-rating in respect of the Dolgarrog stations together to 13.95 MW for Finlarig. This capacity would have contributed to the Government's targets for renewable generation.

Treatment of standby generators

5.12 An issue arose in regard to the treatment of fossil fuel standby generators. The Orders exclude stations fuelled by fossil fuel and renewable sources unless the renewable source is biomass. So, a sewage gas station with a diesel standby generator would be treated as a co-firing station in any month in which the standby generator was used: the standby generator would be considered as part of the generating station which would then be considered to be fuelled by fossil fuel as well as renewable sources. Any such station that was not using biomass as fuel would have been excluded under the terms of the Order. Ofgem determined that it would not consider generating stations (but not wind, water or solar driven generating stations as they are not "fuelled") which have fossil fuel standby generators as co-fired or excluded stations providing they have interlocking arrangements or the equivalent in place to prevent the electricity being exported for supply.

Back-dated accreditation

5.13 Ofgem's initial interpretation of the Orders regarding the timetable for accreditation was that applications for accreditation could not be back-dated, eg that an eligible renewable generating station had to have sent in their application form and had it processed and accepted by Ofgem before 1 April 2002 in order for ROCs to be issued for electricity generated during April 2002. The initial applications were treated in this way. However, on further consideration, Ofgem revised this interpretation and determined that accreditation could be

back-dated to such time as a particular station would be eligible for accreditation. Accordingly, Ofgem notified all generators and back-dated accreditation where appropriate.

Timetable for receipt of certain information

5.14 Ofgem has also dealt with queries about the timetable for receipt of certain information in order to be able to issue ROCs. Originally, Ofgem was of the view that information could be provided later than two months after the end of the month in which generation took place. On further consideration, Ofgem determined that the information regarding gross output and input electricity had to be provided no later than the end of the second month following the month of generation. All affected generators were notified, the timetable was amended with time being given to allow generators to become used to the change and reminders were sent.

NFFO/SRO queries

5.15 The 'site sterilisation' provisions referred to in paragraph 1.31 above apply where a NFFO or SRO contract holder has defaulted on their contract obligations, where NFFO or SRO generating stations have not yet been built and where they are not selling electricity under the NFFO or SRO contract. These provisions mean that any other station at the location of the NFFO or SRO contract will not qualify for ROCs unless the NFFO or SRO station is generating and selling electricity under the NFFO/SRO contract. Developers have queried with Ofgem whether NFFO or SRO stations are located at certain sites. However, this is not information that is readily available to Ofgem and, in any case, it would not be appropriate for Ofgem to provide such information given its particular role and functions under the Orders.

5.16 The interpretation of article 8(11) of the Orders which sets out one of the 'site sterilisation' provisions led to queries being raised about which stations should in fact be excluded. For example, there might be two NFFO contracts at one location (as the boundaries of the locations were generally drawn quite widely) and one contract might not yet have been fulfilled. Or there might have been an ex-NFFO station (ie one whose term of contract has completed because the particular NFFO Order governing it has expired – NFFO 1 and 2 contracts fall

into this category) at the same location as an existing NFFO contract, again which has not yet been fulfilled. Ofgem issued its interpretation on this in March 2003[9] and this is available on Ofgem's website, www.ofgem.gov.uk.

NFFO/SRO requests for economic termination

5.17 The 'site sterilisation' provisions have highlighted the fact that the NFFO/SRO contracts allow a generator to request that the contract be terminated because it is no longer, or can reasonably be expected no longer to be, economically viable in certain circumstances. Such a termination has to be agreed by Ofgem and would result in the 'site sterilisation' provisions not applying. This means that existing NFFO or SRO generating stations (and those to be commissioned once commissioned and generating electricity) could claim ROCs which the developers would benefit from if the contracts were so terminated. Currently, ROCs in respect of NFFO stations are sold along with the electricity (and Renewables LECs) via the NFPA's auctions while SROCs in respect of SRO stations are sold via separate auctions. The proceeds from such auctions are used to reduce and maintain the Fossil Fuel Levy at 0% with any surplus being planned to be used by the Secretary of State to promote renewables under the provisions of the Sustainable Energy Act 2003.

5.18 There are four tests which a generator needs to meet for economic termination of a NFFO/SRO contract and further details of these and Ofgem's procedures can be found in Procedure for dealing with request for economic termination of NFFO/SRO contracts, available on Ofgem's website, www.ofgem.gov.uk.

5.19 During the first period, Ofgem has received 16 requests for economic termination of NFFO/SRO contracts. Seven NFFO contracts and one SRO contract have been terminated on economic grounds with two requests being rejected based on the evidence provided.

[9] Interpretation of Article 8(11) of the Renewables Obligation Order

Measurement and sampling of fuels

5.20 It has come to Ofgem's attention that some co-firing generating stations were planning to import biomass and measure and 'blend' it at other locations either overseas or in Great Britain. Other co-firing stations were using United Kingdom sourced biomass but again were mixing it with fossil fuel before the fuels were delivered to the generating station. All of the stations involved wanted to use this 'blended' material to claim ROCs. In all the cases, the measurement and sampling required would have occurred away from the generating station. Ofgem does not consider that the Orders allow for measurement and sampling to occur away from the generating station.

5.23 Ofgem issued guidelines on this issue on 12 August 2003[10]. The guidelines leave it open to a generator to come up with a proposal for a sampling method to be used on site that would allow 'pre-blending'. To date, no proposal has been forthcoming but some co-firing generators are mixing the fuels and measuring them at the generating station.

[10] Renewables Obligation – measurement and sampling of fuels, Ofgem's Guidelines

6. Review of the Renewables Obligation

The 2003 review and late payment into the buy-out fund consultations

6.1 DTI published their statutory consultation on proposed changes to the RO in August 2003 and the Scottish Executive published an equivalent consultation in relation to proposed changes to the ROS at the same time. Responses were due by 21 November 2003.

6.2 The consultations proposed changes in a number of areas: to the rules on co-firing of energy crops; to allow fossil fuel generating stations commissioned before 1 January 1990 which convert entirely to biomass to qualify for ROCs without renewing the main components of the generating station; to clarify the definitions of micro hydro generating stations and fuel used by a generating station; to allow small amounts of input electricity to be disregarded for ROC calculations purposes; to add a definition of energy content; to enable ROCs to be issued to small generators; to clarify the 'site sterilisation' provisions; to enable the supplier who successfully bids for the NFFO output to provide the necessary declaration about where the electricity has been supplied; and to provide more flexibility to Ofgem as to the timescales in which it deals with transfer requests.

6.3 Further consultations were issued in October on allowing Ofgem to accept late payments into the buy-out fund.

6.4 Ofgem is a statutory consultee and welcomed the opportunity to respond formally to those consultations. Ofgem also acknowledges the in-depth discussions it has been able to have with DTI and the Scottish Executive. The Renewables Obligation (Amendment) Order 2004 and the Renewables Obligation (Scotland) Order 2004 have now been laid before the respective Parliaments and, subject to Parliamentary approval, are due to take effect from 1 April 2004.

6.5 While Ofgem had no substantive comments to make on a number of the proposals, it did welcome the clarification on the definitions described above and the new definition of energy content. It also welcomed the proposal to simplify some of the complex calculations involved in the issue of ROCs, the flexibility to deal with transfer requests in a more timely manner and the proposal that suppliers can provide the necessary supply declarations on behalf of NFFO and SRO generating stations. Ofgem also supported the proposed idea to allow it to accept late payments into the buy-out fund.

6.6 Administering the Orders with all their complexities has been challenging for Ofgem and has created a great deal of administrative, technical and legal work. This work has been increased by the lack of clarity in various areas. Ofgem acknowledges Government's efforts to deal with these complexities. However, Ofgem has no doubt that the amendments to the Orders, once they take effect, will lead to further queries about interpretation and perhaps additional administration work. Ofgem will continue to administer the scheme so as to facilitate the Government's renewable energy targets being met. In the meantime, Ofgem will be revising its original procedures including the accreditation application form and guidance notes in anticipation of the changes expected to take effect from 1 April 2004.

6.7 Ofgem has been participating in discussions with DTI and industry where various proposals have been put forward to address the concerns expressed by market participants as a result of the failures by TXU and Maverick. These discussions are ongoing and Ofgem does not intend to comment on these proposals further at this stage except to state that Ofgem's principal objective is to protect the interests of consumers, wherever appropriate by promoting effective competition. Any proposals involving an extended role for Ofgem must be considered in this light.

Extension of the Renewables Obligation targets

6.8 As stated earlier, the Government has announced its intention to increase the amount of the Renewables Obligation for the years 2010/2011 to 2015/2016. Ofgem looks forward to participating in that consultation process which, in

Ofgem's view, will need to set out clearly the increased costs to consumers of the additional support being provided to renewable generation.

Creation of a UK wide Renewables Obligation

6.9 The Government is currently considering creating a UK wide Renewables Obligation to take effect from 1 April 2005. This is intended to be brought into effect via an Order under The Energy (Northern Ireland) Order 2003 and amendments to the Great Britain Orders.

6.10 The Energy Bill currently going through Parliament contains provisions which will allow the Great Britain Orders to be amended to provide that Northern Ireland Renewables Obligation Certificates (NIROCs) may be used to discharge a supplier's Renewables Obligation under the RO and ROS. The provisions will also allow the Great Britain Orders to be amended so that the buy-out fund under the RO and ROS may be redistributed to Northern Ireland suppliers.

6.11 It is intended that Ofreg will be given the same specific functions as Ofgem has in its administration of the Northern Ireland Renewables Obligation. The Energy Bill also contains a provision which would allow Ofreg to authorise Ofgem to carry out the relevant functions on its behalf.

6.12 Ofgem has been discussing the creation and administration of a UK wide Renewables Obligation with DTI and the Department of Environment, Trade and Industry in NI ("DETINI") for some time and has also entered into discussions with Ofreg.

6.13 Ofgem understands the Government is committed to ensuring that the requirements on all licensed suppliers and all accredited generating stations are the same across the UK. Ofgem regards it as fairer to all those parties for a single buy-out fund to be established as soon as possible.

The 2005/2006 review

6.14 The Government has committed to carrying out a full review of the Renewables Obligation in 2005/2006. In Ofgem's view, such a review will need to assess whether the Government's target for renewable generation is going to be met, the effect of the Renewables Obligation on any other policies, eg NFFO/SRO and the Renewables CCL exemption as well as its potential interactions with schemes such as the Emissions Trading Scheme. Ofgem would expect that the Government will publish the scope of this fundamental review to allow the detailed work to commence in 2004/2005.

6.15 Ofgem will play its part in that process and will continue to work closely with DTI and the Scottish Executive to ensure that the Renewables Obligation continues to work as effectively and efficiently as possible.

Appendix 1 - Statistics on accredited generating stations

Table A1:A comparison of the number of accredited generating stations

	England	Scotland	Wales	Total
Biomass	11	1	0	**12**
ACT	2	0	0	**2**
Co-firing	18	1	0	**19**
Hydro < 20 MW DNC	23	34	18	**75**
Landfill gas	210	9	7	**226**
Micro hydro	3	25	1	**29**
Off-shore wind	2	0	0	**2**
On-shore wind	42	26	23	**91**
Sewage gas	49	0	0	**49**
Total	**360**	**96**	**49**	**505**

Table A2:A comparison of the total installed generating capacity of accredited generating stations

	England (kWh)	Scotland (kWh)	Wales (kWh)	Total (kWh)
Biomass	145,425	12,500	0	**157,925**
ACT	1,785	0	0	**1,785**
Co-firing*	159,347	14,160	0	**173,507**
Hydro < 20 MW DNC	8,155	160,605	73,643	**242,403**
Landfill gas	495,428	20,888	11,321	**527,637**
Micro hydro	297	9,907	60	**10,264**
Off-shore wind	3,800	0	0	**3,800**
On-shore wind	145,415	192,888	171,288	**509,591**
Sewage gas	48,364	0	0	**48,364**
Total	**1,008,016**	**410,948**	**256,312**	**1,675,276**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A3:A comparison of generating stations accredited at 1 April 2002 and after 1 April 2002

	Non-NFFO	NFFO	Non-SRO	SRO	Total
Accredited at 1 April 2002	162	204	39	26	**431**
Accredited after 1 April 2002 and before 1 April 2003	31	12	23	8	**74**
Total	**193**	**216**	**62**	**34**	**505**

Table A4:A comparison of the total installed generating capacity of generating stations accredited at 1 April 2002 and after 1 April 2002

	Non-NFFO *(kWh)	NFFO* (kWh)	Non-SRO* (kWh)	SRO (kWh)	Total (kWh)
Accredited at 1 April 2002	564,421	629,672	93,782	164,136	**145,2011**
Accredited after 1 April 2002 and before 1 April 2003	43,951	26,284	114,292	38,738	**223,265**
Total	**608,372**	**655,956**	**208,074**	**202,874**	**1,675,276**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A5:A comparison of generating stations accredited at 1 April 2002 and after 1 April 2002

	Generating stations accredited at 1 April 2002	Generating stations accredited after 1 April 2002 and before 1 April 2003	Capacity of generating stations at 1 April 2002 (kWh)	Capacity of generating stations accredited after 1 April 2002 and before 1 April 2003 (kWh)
Biomass	11	1	157,686	239
ACT	1	1	1,560	225
Co-firing*	11	8	170,863	2,644
Hydro < 20 MW DNC	56	19	132,266	110,137
Landfill gas	202	24	473,786	53,851
Micro hydro	25	4	9,622	642
Off-shore wind	2	0	3,800	0
On-shore wind	77	14	457,530	52,061
Sewage gas	46	3	44,898	3,466
Total	**431**	**74**	**1,452,011**	**223,265**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A6:A comparison of accredited generating stations commissioned before 1 April 2002 and after 1 April 2002

Technology	Generating stations commissioned before 1 April 2002	Generating stations commissioned after 1 April 2002 and before 1 April 2003	Capacity of generating stations commissioned at 1 April 2002 (kWh)	Capacity of generating stations commissioned after 1 April 2002 and before 1 April 2003 (kWh)
Biomass	9	3	148,186	9,739
ACT	1	1	225	1,560
Co-firing*	19	0	173,507	0
Hydro < 20 MW DNC	69	6	240,653	1,750
Landfill gas	195	31	458,924	68,713
Micro hydro	29	0	10,264	0
Off-shore wind	2	0	3,800	0
On-shore wind	79	12	453,245	56,346
Sewage gas	46	3	44,898	3,466
Total	**449**	**56**	**1533702**	**141574**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A7:A comparison of generating stations accredited at 1 April 2002 and after 1 April 2002

	Generating stations accredited at 1 April 2002	Generating stations accredited after 1 April 2002 and before 1 April 2003	Capacity of accredited generating stations at 1 April 2002 (kWh)*	Capacity of accredited generating stations after 1 April 2002 and before 1 April 2003 (kWh)*
England	324	36	954,514	53,502
Scotland	65	31	257,918	153,030
Wales	42	7	239,579	16,733
Total	**431**	**74**	**1452011**	**223265**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A8:A comparison of generating stations commissioned before 1 April 2002 and after 1 April 2002

Country	Generating stations commissioned before 1 April 2002	Generating stations commissioned after 1 April 2002 and before 1 April 2003	Capacity of generating stations commissioned before 1 April 2002 (kWh)*	Capacity of generating stations commissioned after 1 April 2002 and before 1 April 2003 (kWh)*
England	326	34	934,284	73,732
Scotland	83	13	355,584	55,364
Wales	40	9	243,834	12,478
Total	**449**	**56**	**1,533,702**	**14,1574**

*** co-fired capacity is an estimate of the "renewable capacity"**

Table A9:Estimation of co-fired generating stations' "renewable capacity"

Generating Station	Accreditation ID	Total installed generating capacity (kWh)	Maximum renewable qualifying percentage achieved in any month	Estimate of "renewable" capacity (kWh)
Avonmouth	R00010RBEN	5,750	72%	**4,123**
Beckton	R00003RBEN	11,400	85%	**9,742**
Cottam	R00015RBEN	2,000,000	0%	**0**
Crossness	R00004RBEN	5,900	94%	**5,564**
Drakelow	R00007RBEN	333,000	0%	**0**
Didcot A	R00018RBEN	2,100,000	0%	**0**
Drax	R00035RBEN	40,650	0%	**0**
Ferrybridge C	R00005RBEN	2,035,000	4%	**87,302**
FibrePower (Slough)	R00034RBEN	12,000	0%	**0**
Fiddler's Ferry	R00006RBEN	1,995,000	1%	**16,160**
High Marnham	R00009RBEN	756,000	0%	**0**
Ironbridge	R00008RBEN	970,000	0%	**1,261**
Kingsnorth	R00014RBEN	2,034,000	0%	**2,644**
Rugeley	R00019RBEN	1,000,000	0%	**0**
Shell Green	R00002RBEN	4,200	81%	**3,420**
Slough Electricity	R00001RBEN	35,000	83%	**29,131**
Tilbury	R00013RBEN	1,085,000	0%	**0**
West Burton	R00017RBEN	2,040,000	0%	**0**
Longannet	R00001SBSC	2,400,000	1%	**14,160**
		Estimate of total "renewable" capacity		**173507**

Appendix 2 – Statistics on ROCs and SROCs issued

Table B1:ROCs and SROCs issued by generation technology

	ROCs	SROCs	Total	Proportion of total
Biomass	574,828	33,266	**608,094**	10.93%
ACT	173	0	**173**	0.00%
Co-firing	385,106	44,753	**429,859**	7.73%
Hydro 20 MW DNC or less	136,085	362,487	**498,572**	8.96%
Landfill gas	2,620,211	96,533	**2,716,744**	48.84%
Micro Hydro	1,151	39,769	**40,920**	0.74%
Off-shore wind	2,347	0	**2,347**	0.04%
On-shore wind	657,216	430,441	**1,087,657**	19.55%
Sewage gas	178,303	0	**178,303**	3.21%
Total	**4,555,420**	**1,007,249**	**5,562,669**	100.00%

Table B2:ROCs and SROCs issued by month of generation

	ROCs	SROCS	Total
Apr-02	335,325	60,114	**395,439**
May-02	358,574	66,753	**425,327**
Jun-02	346,335	76,950	**423,285**
Jul-02	322,279	56,958	**379,237**
Aug-02	317,905	52,034	**369,939**
Sep-02	328,128	64,874	**393,002**
Oct-02	374,875	94,457	**469,332**
Nov-02	431,550	107,456	**539,006**
Dec-02	440,930	99,910	**540,840**
Jan-03	459,302	114,867	**574,169**
Feb-03	403,807	105,263	**509,070**
Mar-03	436,410	107,613	**544,023**
Total	**4,555,420**	**1,007,249**	**5,562,669**

Table B3:ROCs issued by generation technology and month

	Biomass	ACT	Co-firing	Hydro 20 MW DNC or less	Landfill gas	Micro Hydro	Off-shore wind	On-shore wind	Sewage gas	Total
Apr-02	33,435	0	13,421	7,889	207,248	86	0	57,795	15,451	**335,325**
May-02	38,107	0	11,090	12,577	209,552	99	233	70,380	16,536	**358,574**
Jun-02	46,186	0	15,454	10,280	206,624	98	221	54,041	13,431	**346,335**
Jul-02	39,403	0	18,603	7,030	215,826	118	144	28,133	13,022	**322,279**
Aug-02	51,663	0	10,581	6,873	214,248	40	174	21,354	12,972	**317,905**
Sep-02	44,244	0	33,219	6,421	210,481	24	95	20,475	13,169	**328,128**
Oct-02	46,487	0	38,370	7,987	215,110	108	510	51,303	15,000	**374,875**
Nov-02	47,063	0	62,762	18,996	222,551	137	335	64,484	15,222	**431,550**
Dec-02	44,422	0	58,421	16,446	230,961	124	213	74,175	16,168	**440,930**
Jan-03	51,675	33	53,399	16,765	226,827	127	95	94,733	15,648	**459,302**
Feb-03	62,599	59	36,444	12,052	215,553	95	312	61,308	15,385	**403,807**
Mar-03	69,544	81	33,342	12,769	245,230	95	15	59,035	16,299	**436,410**
Total	**574,828**	**173**	**385,106**	**136,085**	**2,620,211**	**1,151**	**2,347**	**657,216**	**178,303**	**4,555,420**

Table B4:SROCs issued by generation technology and month

	Biomass	ACT	Co-firing	Hydro 20 MW DNC or less	Landfill gas	Micro Hydro	Off-shore wind	On-shore wind	Sewage gas	Total
Apr-02	3,657	0	458	22,512	5,012	2,571	0	25,904	0	**60,114**
May-02	5,988	0	439	23,818	4,754	2,856	0	28,898	0	**66,753**
Jun-02	4,687	0	422	27,127	6,624	3,630	0	34,460	0	**76,950**
Jul-02	6,144	0	241	22,345	7,903	3,274	0	17,051	0	**56,958**
Aug-02	3,644	0	2,392	19,924	8,350	3,006	0	14,718	0	**52,034**
Sep-02	3,587	0	3,961	26,184	9,765	2,599	0	18,778	0	**64,874**
Oct-02	5,559	0	4,826	32,056	8,799	2,632	0	40,585	0	**94,457**
Nov-02	0	0	5,538	40,099	8,732	4,352	0	48,735	0	**107,456**
Dec-02	0	0	6,292	33,178	9,729	3,640	0	47,071	0	**99,910**
Jan-03	0	0	6,523	35,982	8,888	3,904	0	59,570	0	**114,867**
Feb-03	0	0	6,440	35,624	8,284	3,752	0	51,163	0	**105,263**
Mar-03	0	0	7,221	43,638	9,693	3,553	0	43,508	0	**107,613**
Total	**33,266**	**0**	**44,753**	**362,487**	**96,533**	**39,769**	**0**	**430,441**	**0**	**1,007,249**

Table B5:ROCs issued by location and month

	England	Scotland	Wales	Total
Apr-02	292,715	257	42,353	**335,325**
May-02	306,603	256	51,715	**358,574**
Jun-02	307,631	282	38,422	**346,335**
Jul-02	299,052	282	22,945	**322,279**
Aug-02	299,633	251	18,021	**317,905**
Sep-02	309,908	207	18,013	**328,128**
Oct-02	339,463	116	35,296	**374,875**
Nov-02	375,609	189	55,752	**431,550**
Dec-02	380,790	283	59,857	**440,930**
Jan-03	388,020	242	71,040	**459,302**
Feb-03	356,365	269	47,173	**403,807**
Mar-03	387,670	262	48,478	**436,410**
Total	**4,0434,59**	**2,896**	**509,065**	**4,555,420**

Table B6:ROCs issued by location and technology

	England	Scotland	Wales	Total
Biomass	574,828	0	0	**574,828**
ACT	173	0	0	**173**
Co-firing	385,106	0	0	**385,106**
Hydro 20 MW DNC or less	20,725	2,896	112,464	**136,085**
Landfill gas	2,575,315	0	44,896	**2,620,211**
Micro Hydro	772	0	379	**1,151**
Off-shore wind	2,347	0	0	**2,347**
On-shore wind	305,890	0	351,326	**657,216**
Sewage gas	178,303	0	0	**178,303**
Total	**4,043,459**	**2,896**	**509,065**	**4,555,420**

Table B7:SROCs issued by location and month

	England	Scotland	Wales	Total
Apr-02	0	60,114	0	**60,114**
May-02	0	66,753	0	**66,753**
Jun-02	0	76,950	0	**76,950**
Jul-02	0	56,958	0	**56,958**
Aug-02	0	52,034	0	**52,034**
Sep-02	0	64,874	0	**64,874**
Oct-02	0	94,457	0	**94,457**
Nov-02	0	107,456	0	**107,456**
Dec-02	0	99,910	0	**99,910**
Jan-03	0	114,867	0	**114,867**
Feb-03	0	105,263	0	**105,263**
Mar-03	0	107,613	0	**107,613**
Total	**0**	**1,007,249**	**0**	**1,007,249**

Table B8:SROCs issued by location and technology

	England	Scotland	Wales	Total
Biomass	0	33,266	0	**33,266**
ACT	0	0	0	**0**
Co-firing	0	44,753	0	**44,753**
Hydro 20 MW DNC or less	0	362,487	0	**362,487**
Landfill gas	0	96,533	0	**96,533**
Micro Hydro	0	39,769	0	**39,769**
Off-shore wind	0	0	0	**0**
On-shore wind	0	430,441	0	**430,441**
Sewage gas	0	0	0	**0**
Total	**0**	**1,007,249**	**0**	**1,007,249**

Table B9:ROCs and SROCs issued by generation location and month

	England	Scotland	Wales	Total
Apr-02	292,715	60,371	42,353	**395,439**
May-02	306,603	67,009	51,715	**425,327**
Jun-02	307,631	77,232	38,422	**423,285**
Jul-02	299,052	57,240	22,945	**379,237**
Aug-02	299,633	52,285	18,021	**369,939**
Sep-02	309,908	65,081	18,013	**393,002**
Oct-02	339,463	94,573	35,296	**469,332**
Nov-02	375,609	107,645	55,752	**539,006**
Dec-02	380,790	100,193	59,857	**540,840**
Jan-03	388,020	115,109	71,040	**574,169**
Feb-03	356,365	105,532	47,173	**509,070**
Mar-03	387,670	107,875	48,478	**544,023**
Total	**4,043,459**	**1,010,145**	**509,065**	**5,562,669**

Table B10:ROCs and SROCs issued by generation location and technology

	England	Scotland	Wales	Total
Biomass	574,828	33,266	0	**608,094**
ACT	173	0	0	**173**
Co-firing	385,106	44,753	0	**429,859**
Hydro 20 MW DNC or less	20,725	365,383	112,464	**498,572**
Landfill gas	2,575,315	96,533	44,896	**2,716,744**
Micro Hydro	772	39,769	379	**40,920**
Off-shore wind	2,347	0	0	**2,347**
On-shore wind	305,890	430,441	351,326	**1,087,657**
Sewage gas	178,303	0	0	**178,303**
Total	**4,043,459**	**1,010,145**	**509,065**	**5,562,669**

Appendix 3 – Statistics on supplier compliance

Table C1:Suppliers' compliance with the RO 2002/2003

Supplier licence	RO (3% of sales) (MWh)	Produced ROCs/SROCs	Money paid into buy-out fund (£)	RO met by ROCs/SROCs	RO met by buy-out	Remaining money that would have covered the RO (£)	Did the combination of ROCs/SROCs and buy-out cover the RO?
Atlantic Electric and Gas Ltd	68,137	0	2,044,110	0%	100%	0	yes
BizzEnergy Limited	53,520	0	1,396,530	0%	87%	209,070	no - ROCs produced late
BP Power Trading Ltd	471	0	14,130	0%	100%	0	yes
British Energy Generation Ltd	564,622	158,376	12,187,380	28%	72%	0	yes
British Gas Trading Limited	885,118	885,118	0	100%	0%	0	yes
Cinergy Global Trading Ltd	212	212	0	100%	0%	0	yes
Economy Power Ltd	22,323	21,588	0	97%	0%	22,050	no - produced over 25% co-fired ROCs
Electricity Direct (UK) Ltd	114,937	107,108	191,220	93%	6%	43,650	no - produced over 25% co-fired ROCs
Enron Gas & Petrochemicals Trading Ltd	3,626	0	108,780	0%	100%	0	yes
Fortum Energy Plus Limited	6,815	0	0	0%	0%	204,450	no - late payment
Gaz De France Marketing Limited	32,554	0	976,620	0%	100%	0	yes
Innogy Cogen Ltd	116,767	0	3,503,010	0%	100%	0	yes
Innogy Cogen Trading Ltd	43,661	0	1,309,830	0%	100%	0	yes

Table C1 continued

Supplier licence	RO (3% of sales) (MWh)	Produced ROCs/SROCs	Money paid into buy-out fund (£)	RO met by ROCs/SROCs	RO met by buy-out	Remaining money that would have covered the RO (£)	Did the combination of ROCs/SROCs and buy-out cover the RO?
London Electricity plc	1,037,179	931,276	3,177,090	90%	10%	0	yes
Maverick Energy Ltd	17,188	0	0	0%	0%	515,640	no - in administration
Norweb Energi Ltd	171,421	0	0	0%	0%	5,142,630	no - in administration
Npower Direct Ltd	103,545	23,717	2,394,840	23%	77%	0	yes
Npower Ltd	1,007,419	235,751	23,150,040	23%	77%	0	yes
Npower Northern Ltd	364,638	83,521	8,433,510	23%	77%	0	yes
Npower Yorkshire Ltd	248,398	56,896	5,745,060	23%	77%	0	yes
Opus Energy Ltd	369	369	0	100%	0%	0	yes
Powergen (UK) plc	312,012	312,012	0	100%	0%	0	yes
Powergen Retail Ltd	1,108,123	1,108,123	0	100%	0%	0	yes
Renewable Energy Company Ltd	7,701	7,701	0	100%	0%	0	yes
ScottishPower Energy Retail Ltd	295,004	295,004	0	100%	0%	0	yes
Seeboard Energy Ltd	324,032	290,264	1,013,040	90%	10%	0	yes
Severn Trent Energy Ltd	624	624	0	100%	0%	0	yes
Slough Energy Supplies Ltd	2,835	2,835	0	100%	0%	0	yes
SmartestEnergy Limited	463	0	13,890	0%	100%	0	yes
SSE Energy Supply Ltd	839,310	434,999	12,129,330	52%	48%	0	yes
TotalFinaElf Gas & Power Ltd	9,059	0	271,770	0%	100%	0	yes
TXU Direct Sales Ltd	24,694	0	0	0%	0%	740,820	no - in administration

Table C1 continued

Supplier licence	RO (3% of sales) (MWh)	Produced ROCs/SROCs	Money paid into buy-out fund (£)	RO met by ROCs/SROCs	RO met by buy-out	Remaining money that would have covered the RO (£)	Did the combination of ROCs/SROCs and buy-out cover the RO?
TXU Europe (Ah Online) Ltd	7,279	7,279	0	100%	0%	0	yes
TXU Europe (AHGD) Ltd	6,972	6,972	0	100%	0%	0	yes
TXU UK Ltd	563,162	0	0	0%	0%	16,894,860	no - in administration
UK Electric Power Ltd	24,627	0	738,810	0%	100%	0	yes
Utility Link Ltd	4,561	2,752	54,270	60%	40%	0	yes
Western Gas Ltd	594	594	0	100%	0%	0	yes
Total	**8,393,972**	**4,973,091**	**78,853,260**	**59%**	**31%**	**23,773,170**	**no**

Table C2:Suppliers' compliance with the ROS 2002/2003

Supplier licence	ROS (3% of sales) (MWh)	Produced ROCs/SROCs	Money paid into buy-out fund (£)	ROS met by ROCs/SROCs	ROS met by buy-out	Remaining money that would have covered the ROS (£)	Did the combination of ROCs/SROCs and buy-out cover the ROS?
Atlantic Electric and Gas Ltd	1,690	0	50,700	0%	100%	0	yes
British Energy Generation Ltd	15,384	15,384	0	100%	0%	0	yes
British Gas Trading Limited	87,634	87,623	330	100%	0%	0	yes
Cinergy Global Trading Ltd	156	156	0	100%	0%	0	yes
Economy Power Ltd	3,154	3,154	0	100%	0%	0	yes
Electricity Direct (UK) Ltd	17,750	17,750	0	100%	0%	0	yes
Fortum Direct	12,472	0	374,160	0%	100%	0	yes
Fortum Energy Plus Limited	317	0	0	0%	0%	9,510	no - late payment
London Electricity plc	7,916	7,916	0	100%	0%	0	yes
Maverick Energy Ltd	459	0	0	0%	0%	13,770	no - in administration
Norweb Energi Ltd	851	0	0	0%	0%	25,530	no - in administration
Npower Direct Ltd	5,118	1,279	0	25%	0%	115,170	no - produced over 25% co-fired ROCs
Npower Ltd	28,564	28,564	0	100%	0%	0	yes
Npower Northern Ltd	3,943	3,943	0	100%	0%	0	yes
Npower Yorkshire Ltd	4,052	4,052	0	100%	0%	0	yes
Opus Energy Ltd	10	10	0	100%	0%	0	yes
Powergen (UK) plc	10,249	10,249	0	100%	0%	0	yes
Powergen Retail Ltd	19,960	19,960	0	100%	0%	0	yes

Table C2 continued

Supplier licence	ROS (3% of sales) (MWh)	Produced ROCs/SROCs	Money paid into buy-out fund (£)	ROS met by ROCs/SROCs	ROS met by buy-out	Remaining money that would have covered the ROS (£)	Did the combination of ROCs/SROCs and buy-out cover the ROS?
ScottishPower Energy Retail Ltd	412,252	160,430	7,554,660	39%	61%	0	yes
Seeboard Energy Ltd	1,548	1,548	0	100%	0%	0	yes
Severn Trent Energy Ltd	2	2	0	100%	0%	0	yes
SSE Energy Supply Ltd	223,344	115,755	3,227,670	52%	48%	0	yes
TotalFinaElf Gas & Power Ltd	31	0	930	0%	100%	0	yes
TXU Direct Sales Ltd	1,967	0	0	0%	0%	59,010	no - in administration
TXU Europe (Ah Online) Ltd	363	363	0	100%	0%	0	yes
TXU Europe (AHGD) Ltd	220	220	0	100%	0%	0	yes
TXU UK Ltd	8,114	0	0	0%	0%	243,420	no - in administration
UK Electric Power Ltd	76	0	2,280	0%	100%	0	yes
Total	**867,596**	**478,358**	**11,210,730**	**55%**	**43%**	**466,410**	**no**

Table C3:ROCs produced under the RO

Supplier licence	Produced co-fired ROCs/SROCs	Produced non - co-fired ROCs/SROCs	RO met by co-fired ROCs/SROCs	RO met by ROCs/SROCs
Atlantic Electric and Gas Ltd	0	0	0%	0%
BizzEnergy Limited	0	0	0%	0%
BP Power Trading Ltd	0	0	0%	0%
British Energy Generation Ltd	0	158,376	0%	28%
British Gas Trading Limited	18,570	866,548	2%	100%
Cinergy Global Trading Ltd	0	212	0%	100%
Economy Power Ltd	5,580	16,008	25%	97%
Electricity Direct (UK) Ltd	28,734	78,374	25%	93%
Enron Gas & Petrochemicals Trading Ltd	0	0	0%	0%
Fortum Energy Plus Limited	0	0	0%	0%
Gaz De France Marketing Limited	0	0	0%	0%
Innogy Cogen Ltd	0	0	0%	0%
Innogy Cogen Trading Ltd	0	0	0%	0%
London Electricity plc	34,390	896,886	3%	90%
Maverick Energy Ltd	0	0	0%	0%
Norweb Energi Ltd	0	0	0%	0%
Npower Direct Ltd	21,623	2,094	21%	23%
Npower Ltd	59,850	175,901	6%	23%
Npower Northern Ltd	0	83,521	0%	23%
Npower Yorkshire Ltd	0	56,896	0%	23%
Opus Energy Ltd	0	369	0%	100%
Powergen (UK) plc	496	311,516	0%	100%
Powergen Retail Ltd	71,981	1,036,142	6%	100%
Renewable Energy Company Ltd	0	7,701	0%	100%
ScottishPower Energy Retail Ltd	10,000	285,004	3%	100%
Seeboard Energy Ltd	10,992	279,272	3%	90%
Severn Trent Energy Ltd	0	624	0%	100%
Slough Energy Supplies Ltd	700	2,135	25%	100%
SmartestEnergy Limited	0	0	0%	0%
SSE Energy Supply Ltd	65,254	369,745	8%	52%
TotalFinaElf Gas & Power Ltd	0	0	0%	0%
TXU Direct Sales Ltd	0	0	0%	0%
TXU Europe (Ah Online) Ltd	0	7,279	0%	100%
TXU Europe (AHGD) Ltd	0	6,972	0%	100%
TXU UK Ltd	0	0	0%	0%
UK Electric Power Ltd	0	0	0%	0%

Supplier licence	Produced co-fired ROCs/SROCs	Produced non - co-fired ROCs/SROCs	RO met by co-fired ROCs/SROCs	RO met by ROCs/SROCs
Utility Link Ltd	0	2,752	0%	60%
Western Gas Ltd	0	594	0%	100%
Total	**328,170**	**4,644,921**	**4%**	**59%**

Table C4:ROCs produced under the ROS

Supplier licence	Produced co-fired ROCs/SROCs	Produced non - co-fired ROCs/SROCs	ROS met by co-fired ROCs/SROCs	ROS met by ROCs/SROCs
Atlantic Electric and Gas Ltd	0	0	0%	0%
British Energy Generation Ltd	0	15,384	0%	100%
British Gas Trading Limited	16,022	71,601	18%	100%
Cinergy Global Trading Ltd	0	156	0%	100%
Economy Power Ltd	435	2,719	14%	100%
Electricity Direct (UK) Ltd	106	17,644	1%	100%
Fortum Direct	0	0	0%	0%
Fortum Energy Plus Limited	0	0	0%	0%
London Electricity plc	0	7,916	0%	100%
Maverick Energy Ltd	0	0	0%	0%
Norweb Energi Ltd	0	0	0%	0%
Npower Direct Ltd	1,279	0	25%	25%
Npower Ltd	0	28,564	0%	100%
Npower Northern Ltd	0	3,943	0%	100%
Npower Yorkshire Ltd	707	3,345	17%	100%
Opus Energy Ltd	0	10	0%	100%
Powergen (UK) plc	1,277	8,972	12%	100%
Powergen Retail Ltd	0	19,960	0%	100%
ScottishPower Energy Retail Ltd	44,753	115,677	11%	39%
Seeboard Energy Ltd	0	1,548	0%	100%
Severn Trent Energy Ltd	0	2	0%	100%
SSE Energy Supply Ltd	17,364	98,391	8%	52%
TotalFinaElf Gas & Power Ltd	0	0	0%	0%
TXU Direct Sales Ltd	0	0	0%	0%
TXU Europe (Ah Online) Ltd	0	363	0%	100%
TXU Europe (AHGD) Ltd	0	220	0%	100%
TXU UK Ltd	0	0	0%	0%
UK Electric Power Ltd	0	0	0%	0%
Total	**81,943**	**396,415**	**9%**	**55%**

Table C5:Redistribution of RO buy-out

Supplier licence	Buy-out redistributed for ROCs/SROCs produced (£)
Atlantic Electric and Gas Ltd	0
BizzEnergy Limited	0
BP Power Trading Ltd	0
British Energy Generation Ltd	2,523,904
British Gas Trading Limited	14,105,376
Cinergy Global Trading Ltd	3,378
Economy Power Ltd	344,029
Electricity Direct (UK) Ltd	1,706,889
Enron Gas & Petrochemicals Trading Ltd	0
Fortum Energy Plus Limited	0
Gaz De France Marketing Limited	0
Innogy Cogen Ltd	0
Innogy Cogen Trading Ltd	0
London Electricity plc	14,840,957
Maverick Energy Ltd	0
Norweb Energi Ltd	0
Npower Direct Ltd	377,957
Npower Ltd	3,756,964
Npower Northern Ltd	1,331,003
Npower Yorkshire Ltd	906,703
Opus Energy Ltd	5,880
Powergen (UK) plc	4,972,271
Powergen Retail Ltd	17,659,217
Renewable Energy Company Ltd	122,724
ScottishPower Energy Retail Ltd	4,701,228
Seeboard Energy Ltd	4,625,691
Severn Trent Energy Ltd	9,944
Slough Energy Supplies Ltd	45,178
SmartestEnergy Limited	0
SSE Energy Supply Ltd	6,932,210
TotalFinaElf Gas & Power Ltd	0
TXU Direct Sales Ltd	0
TXU Europe (Ah Online) Ltd	111,106
TXU Europe (AHGD) Ltd	115,999
TXU UK Ltd	0
UK Electric Power Ltd	0
Utility Link Ltd	43,856
Western Gas Ltd	9,466
Total	**79,251,930**

Table C6:Redistribution of ROS buy-out

Supplier licence	Buy-out redistributed for ROCs/SROCs produced (£)
Atlantic Electric and Gas Ltd	0
British Energy Generation Ltd	362,351
British Gas Trading Limited	2,063,851
Cinergy Global Trading Ltd	3,674
Economy Power Ltd	74,288
Electricity Direct (UK) Ltd	418,079
Fortum Direct	0
Fortum Energy Plus Limited	0
London Electricity plc	186,451
Maverick Energy Ltd	0
Norweb Energi Ltd	0
Npower Direct Ltd	30,125
Npower Ltd	672,789
Npower Northern Ltd	92,872
Npower Yorkshire Ltd	95,439
Opus Energy Ltd	235
Powergen (UK) plc	241,402
Powergen Retail Ltd	470,133
ScottishPower Energy Retail Ltd	3,778,730
Seeboard Energy Ltd	36,461
Severn Trent Energy Ltd	47
SSE Energy Supply Ltd	2,726,466
TotalFinaElf Gas & Power Ltd	0
TXU Direct Sales Ltd	0
TXU Europe (Ah Online) Ltd	8,550
TXU Europe (AHGD) Ltd	5,181
TXU UK Ltd	0
UK Electric Power Ltd	0
Total	**11,267,124**

Table C7:Suppliers with no RO

Supplier licence
Accord Energy Limited
AEP Energy Services Limited
AES Barry Operations Ltd
AES New Energy Ltd
Affinity Power Limited
Allied Domecq (Holdings) plc
Aquila Energy Supplies Ltd
Citigen (London) Ltd
Commercial Electricity Supplies Ltd
EDF Trading Ltd
Eledor Limited
Enizade Ltd
Enron Direct Ltd
Essential Power Limited
Fellside Heat and Power Ltd
Fortum Direct
Ineos Chlor Energy Ltd
International Power plc
Magnox Electric plc
Midlands Gas Ltd
Npower Northern Supply Ltd
Npower Yorkshire Supply Limited
OwnLabel Energy Ltd
Pentex Oil and Gas Ltd
Seeboard Powerlink Limited
Shell Gas Direct Ltd
South Wales Electricity Ltd
SSE Energy Ltd
SWEB Ltd
Telecom Plus PLC
TXU Europe (AHG) Ltd
Unit Energy Limited
Wilton Energy Limited

Table C8:Suppliers with no ROS

Supplier licence
Accord Energy Limited
AEP Energy Services Limited
AES New Energy Ltd
Affinity Power Limited
Allied Domecq (Holdings) plc
Aquila Energy Supplies Ltd
BizzEnergy Limited
Citigen (London) Ltd
Commercial Electricity Supplies Ltd
EDF Trading Ltd
Eledor Limited
Enizade Ltd
Enron Direct Ltd
Enron Gas & Petrochemicals Trading Ltd
Essential Power Limited
Gaz De France Marketing Limited
Ineos Chlor Energy Ltd
Innogy Cogen Ltd
Innogy Cogen Trading Ltd
International Power plc
Magnox Electric plc
Midlands Gas Ltd
Npower Northern Supply Ltd
Npower Yorkshire Supply Limited
OwnLabel Energy Ltd
Pentex Oil and Gas Ltd
Renewable Energy Company Ltd
Shell Gas Direct Ltd
SmartestEnergy Limited
South Wales Electricity Ltd
SSE Energy Ltd
SWEB Ltd
Telecom Plus PLC
TXU Europe (AHG) Ltd
Unit Energy Limited
Utility Link Ltd
Western Gas Ltd
Wilton Energy Limited

Table C9:ROCs and SROCs issued and redeemed for RO or ROS compliance

	ROCs	SROCs	Total
Redeemed	4,449,885	1,001,564	**5,451,449**
Not redeemed	105,535	5,685	**111,220**
Total issued	**4,555,420**	**1,007,249**	**5,562,669**