

TNUoS tariffs for 2009/10

This statement details the Transmission Network Use of System (TNUoS) tariffs that will apply on 1 April 2009.

Pursuant to National Grid's Transmission Licence, tariffs have been calculated according to the Charging Methodology¹ which has recently been amended by ECM-11 to introduce local charging arrangements for generation. The tariffs reflect the impact that changes in generation and demand have on transmission investment and recover the revenue allowed in the transmission network owners' price controls. In summary, the charging model has been updated to include:

- generation changes reflecting the contracts Users have struck with National Grid and detailed in the October update of the Seven Year Statement²;
- demand information provided mainly by Distribution Network Owners (DNOs);
- the transmission network data;
- the increase in allowed revenue of the three transmission companies in line with the RPI + 2% price controls; and
- the revised charging base, which has shown a sizable reduction in the demand base.

In addition, since the publication of the draft tariffs in December 2008, National Grid has reviewed its forecast of revenues in the current year, which has risen given the recent cold conditions.

The tariffs are comprised of locational and non-locational elements. National Grid published an Information Paper³ in December 2008 that described the changes in locational tariffs. The paper can also be used to help predict future changes in TNUoS tariffs.

GENERATION TNUoS TARIFFS

A user's generation TNUoS tariff is comprised of a wider zonal tariff and a local tariff, which will contain a substation element and may also contain a circuit element.

Wider zonal tariffs

The table below presents the wider zonal generation TNUoS tariffs for 2009/10. A comparison with 2008/09 is given but care should be exercised, as the wider zonal tariffs for 2009/10 are now a component of the overall tariff structure.

Zone	Zone Name	2008/09 Tariff (£/kW)	2009/10 Tariff (£/kW)	Tariff Changes	
				Absolute	%
1	North Scotland	22.26	21.59	-0.67	-3%
2	Peterhead	19.76	20.32	0.56	3%
3	Western Highland & Skye	20.53	21.10	0.57	3%
4	Central Highlands	16.74	16.87	0.13	1%
5	Argyll	15.06	13.99	-1.07	-7%
6	Stirlingshire	14.36	14.48	0.12	1%
7	South Scotland	13.52	13.60	0.08	1%
8	Auchencrosh	10.38	11.24	0.86	8%
9	Humber, Lancashire	6.32	6.14	-0.17	-3%
10	North East England	9.95	9.85	-0.10	-1%
11	Anglesey	6.83	6.87	0.04	1%
12	Dinorwig	9.82	6.19	-3.63	-37%
13	South Yorks & North Wales	4.42	4.20	-0.22	-5%
14	Midlands	2.32	2.11	-0.21	-9%
15	South Wales & Gloucester	-2.47	-1.60	0.87	-35%
16	Central London	-5.66	-6.98	-1.32	23%
17	South East	1.22	0.25	-0.97	-79%
18	Oxon & South Coast	-0.01	-1.39	-1.37	9287%
19	Wessex	-2.57	-3.28	-0.71	28%
20	Peninsula	-8.53	-6.68	1.84	-22%

¹ ["The Statement of the Use of System Charging Methodology"](#) Issue 4, Revision 0

² ["2008 GB SYS"](#) October 2008

³ ["2008 Information Paper"](#) December 2008

On average wider zonal generation tariffs have reduced by £0.27/kW. This is mainly due to the revenue collected through local asset charges offsetting the generation share of the increased allowed revenue.

Individual zonal tariffs will differ from the average due to changes in power flows on the system and / or the introduction of local generation tariffs. The most notable change is in Peninsula (Zone 20) due to the arrival of 905MW of new generation in the zone; Oxon & South Cost (Zone 18) due to combination of generation changes and local charging; and Dinorwig (Zone 12) due to the introduction of local generation charges.

Local tariffs

All transmission connected generation will be liable to pay a local substation charge. The following table shows the 2009/10 substation local tariffs that will apply to all generators depending on the substation rating, connection type, and connection voltage.

Substation Rating	Connection Type	132kV	275kV	400kV
<1320 MW	No redundancy	0.14	0.08	0.07
<1320 MW	Redundancy	0.30	0.19	0.16
>1320 MW	No redundancy	-	0.26	0.21
>1320 MW	Redundancy	-	0.42	0.34

In addition, generators that are not connected to main interconnected transmission system (MITS) are liable to pay a local circuit charge. The following table below presents the local circuit generation TNUoS tariffs for 2009/10 for generators connected at the listed substation.

Substation Name	Local Tariff (£/kW)	Substation Name	Local Tariff (£/kW)
Aigas	0.53	Hartlepool	0.39
Arcleloch	0.17	Invergarry	1.02
Auchencrosh	-0.78	Killingholme	0.40
Baglan Bay	0.06	Kilmorack	0.16
Black Law	2.43	Langage	0.46
Coryton	0.25	Leiston	0.88
Cruachan	1.23	Lochay	0.26
Crystal Rig	0.03	Luichart	3.00
Culligran	1.25	Marchwood	0.38
Deanie	2.06	Millennium	1.27
Didcot	0.59	Mossford	4.89
Dinorwig	3.81	Nant	1.81
DunLaw	0.16	Oldbury-on-Severn	1.34
Edinbane	4.84	Orrin	2.18
Fallago	0.14	Quoich	2.90
Farr	4.85	Saltend	0.25
Ffestiniog	0.19	South Humber Bank	0.61
Finlarig	0.23	Spalding	0.23
Foyers	1.68	Strathbora	1.03
Glendoe	1.80	Teesside	0.08
Glenmoriston	1.03	Whitelee	1.45
Gordonbush	1.29		

In addition, generators that are not connected to main interconnected transmission system (MITS) are liable to pay a local circuit charge. The following table below presents the local circuit generation TNUoS tariffs for 2009/10 for generators connected at the listed substation.

Example

The following example shows how a generator's total TNUoS tariff is calculated from the wider zonal, local substation, and local circuit tariffs stated above.

A 1000MW generator is connected to the transmission system at 400kV Killingholme, which is rated at greater than 1320MW and for which redundancy has been included within the substation design, in accordance with the security standards. The substation is in generation TNUoS zone 9.

The final TNUoS tariff will be:

$$\begin{aligned} \text{TNUoS tariff} &= \text{Wider zonal tariff} + \text{Local substation tariff} + \text{Local circuit tariff} \\ &= 6.14/\text{kW} + \text{£}0.34/\text{kW} + \text{£}0.40/\text{kW} \\ &= \text{£}6.88/\text{kW} \end{aligned}$$

As a result, the generator will be liable to pay an annual TNUoS charge of £6.88m. This will be divided by twelve to produce a monthly charge of £573k.

Discount for small generators

The 2009/10 small generation discount, based on 25% of the combined generation and demand residuals, is £5.18/kW.

DEMAND TNUoS TARIFFS

The tables below present the half-hourly (HH) and non half-hourly (NHH) demand TNUoS tariffs for 2009/10 and include the adjustment for the small generation discount.

Zone	Zone Name	2008/09 Tariff (£/kW)	2009/10 Tariff (£/kW)	Tariff Changes	
				Absolute	%
1	Northern Scotland	2.87	3.38	0.51	18%
2	Southern Scotland	7.95	9.07	1.12	14%
3	Northern	10.90	12.06	1.16	11%
4	North West	14.91	16.54	1.63	11%
5	Yorkshire	14.83	16.30	1.47	10%
6	N Wales & Mersey	15.46	16.89	1.43	9%
7	East Midlands	17.62	19.13	1.51	9%
8	Midlands	19.15	20.53	1.38	7%
9	Eastern	18.36	20.01	1.65	9%
10	South Wales	23.23	23.68	0.45	2%
11	South East	21.50	23.84	2.34	11%
12	London	23.55	25.90	2.35	10%
13	Southern	22.19	24.47	2.28	10%
14	South Western	25.21	25.63	0.42	2%

Zone	Zone Name	2008/09 Tariff (p/kWh)	2009/10 Tariff (p/kWh)	Tariff Changes	
				Absolute	%
1	Northern Scotland	0.37	0.46	0.09	24%
2	Southern Scotland	1.05	1.14	0.09	8%
3	Northern	1.42	1.60	0.18	13%
4	North West	1.96	2.10	0.14	7%
5	Yorkshire	1.94	2.13	0.19	10%
6	N Wales & Mersey	2.04	2.03	-0.01	-1%
7	East Midlands	2.34	2.47	0.13	6%
8	Midlands	2.54	2.71	0.17	7%
9	Eastern	2.47	2.53	0.06	2%
10	South Wales	2.94	2.94	0.00	0%
11	South East	2.85	3.06	0.21	7%
12	London	3.01	3.03	0.02	1%
13	Southern	2.93	3.02	0.09	3%
14	South Western	3.22	3.20	-0.02	-1%

The average increase in HH and NHH demand tariffs are £1.41/kW and 0.10p/kWh respectively. The majority of the demand tariff increase is due to increases in the allowed revenue and also a reduction in the demand changing base, caused by the decline in the economy (which has already been seen in the demand observed during 2008/09). These factors tend to have a uniform impact across all demand customers in Great Britain. Variations to the average are caused typically by local changes to load and generation that alter power flows on the transmission system.