WAGCM13 - Grid Code Alternative Form

GC0141:
Preferred permutation across all GC0141 "Sub-Modification" workstreams

Overview:

The Alternative has been raised to cover the proposers chosen permutation in relation to the elements that comprise the modification.

Details of the chosen permutation as attached and summarised below:

Solution	Independent Engineer	Sharing for SSTI / SSCI	RMS & EMT Models	Fault Ride Through Definition & Retrospective Requirements	Compliance Repeat Plan	Enhanced FRT Studies	Torsional Data
WAGCM13	No requirement for IE	ESO/TO host study environment with remote access	Specification of RMS & EMT model (fully encrypted)	Adds a time duration & retrospective requirements	Submit material changes from submission made to achieve FON	Additional studies for complex connections agreed at start of process	User provides data when asked prior to a completion date of 1st April 2015
	No change from Baseline						
	Original Proposal						
	Alternative Option						

Requirement for an Independent Engineer – Current Baseline

Sharing of SSTI / SSCI Models – Alternative Option 2c (NG ESO or TO host an EMT network with remote/parallel access for User to carry out studies without sight of other Users or network data).

Specification for RMS & EMT Models – Original Proposal

Fault Ride Through Definition and Retrospective Requirements – Original Proposal
Although not in-line with our view on the subject, the existence of GC0155 will address our concerns

Compliance Repeat Plan – Alternative Option 5a (Only changes to original baseline data to be submitted in order to achieve compliance)

Enhanced Fault Ride Through Studies – Original Proposal

Provision of Torsional Data for Older Plant – Alternative Option 7a (requirement for User to only provide Torsional Data for Generating Units with a completion date before 01 April 2015 on request)

Proposer: Tim Ellingham, RWE Supply and Trading

Contents

What is the proposed alternative solution?

The alternative covers the proposers chosen elements of the modification, with some elements differing from the Original Proposal.

What is the difference between this and the Original Proposal?

Requirement for an Independent Engineer – Current Baseline
This element adds, in our opinion and experience, cost, complexity and delay to new and existing projects. Adequate available resources to undertake such work to a standard greater than the existing process is also hard to come by. We do not support this move.

Sharing of SSTI / SSCI Models – Alternative Option 2c (NG ESO or TO host an EMT network with remote/parallel access for User to carry out studies without sight of other Users or network data).

Although this is probably the most complex option initially it will allow a central location for all models and will aid greatly with data management, an issue for users with older plant. It will also avoid repeated requests to users and OEMs. After the initial implementation hurdle, it will provide the quickest route to such studies for connecting parties.

Specification for RMS & EMT Models – Original Proposal
We have no further comments over the original proposal
Fault Ride Through Definition and Retrospective Requirements – Original Proposal
Although not in-line with our view on the subject, the existence of GC0155 will address our concerns

Compliance Repeat Plan – Alternative Option 5a (Only changes to original baseline data to be submitted in order to achieve compliance)
For large and older sites this option would be provide the greatest ease and efficiency to such users.

Enhanced Fault Ride Through Studies – Original Proposal
We have no further comments over the original proposal.

Provision of Torsional Data for Older Plant – Alternative Option 7a (requirement for User to only provide Torsional Data for Generating Units with a completion date before 01 April 2015 on request)
As this data is not normally on-hand and often involves a lengthy process with the original OEM (if available) then it makes sense to tackle the issue only as and when required.

What is the impact of this change?

Proposer's Assessment against Grid Code Objectives	
Relevant Objective	**Identified impact**

(a) To permit the development, maintenance and operation of an efficient, coordinated and economical system for the transmission of electricity	**Positive** FRT elements should contribute to a more robust system. Central model will improve study speed for connecting parties.
(b) Facilitating effective competition in the generation and supply of electricity (and without limiting the foregoing, to facilitate the national electricity transmission system being made available to persons authorised to supply or generate electricity on terms which neither prevent nor restrict competition in the supply or generation of electricity);	**Positive** The burden of SSTI studies required to be performed by some parties, but not all, would be eased by a readily available model/data thus levelling this element in connecting certain generation.
(c) Subject to sub-paragraphs (i) and (ii), to promote the security and efficiency of the electricity generation, transmission and distribution systems in the national electricity transmission system operator area taken as a whole;	**Neutral**
(d) To efficiently discharge the obligations imposed upon the licensee by this license and to comply with the Electricity Regulation and any relevant legally binding decisions of the European Commission and/or the Agency; and	**Neutral**
(e) To promote efficiency in the implementation and administration of the Grid Code arrangements	**Positive** Standardisation of modelling submissions will improve efficiency of evaluating said submissions.

When will this change take place?

Implementation date:

In line with GC0141

Implementation approach:

Acronyms, key terms and reference material

Acronym / key term	Meaning
BCA	Bilateral Connection Agreement - between a User and ESO
ECC	European Connection Conditions – part of Grid Code
PC	Planning Code – part of Grid Code
TO	Transmission Owner
NG ESO	National Grid Electricity System Operator

Reference material:

None.