Stakeholder Feedback Template

This template has been developed to enable stakeholders to provide their feedback on the draft DER Register Information Guidelines.

AEMO encourages stakeholders to use this template, so they can have due regard to the views expressed by stakeholders on each issue. Stakeholders should not feel obliged to answer each question, but rather address those issues of particular interest or concern.

Stakeholder submissions will be published on AEMO's website unless they are clearly marked as being confidential. Submissions should be sent to DERRegister@aemo.com.au by Wednesday, 24 April 2019.

Organisation: AusNet Services

Contact name: Justin Betlehem

Contact details (email / phone): justin.betlehem@ausnetservices.com.au; T 03 9695 6288, M: 0433 691 111

Questions		Feedback
1	Is 1 KW as appropriate minimum size of small generating unit to capture in the DER Register?	Yes, this would remove any inconsequential plug and play energy storage devices that are unlikely to affect the customers load profile.
2	Are standard, packaged reports also required for NSPs? If so, what information is required?	AusNet Services would prefer to access the DER Register Data via APIs to create internal business reporting. This would provide greater flexibility to integrate with internal systems and interfaces enabling us to better keep this data up-to-date.
3	What is the most effective means to communicate and inform key stakeholders on how to use the DER Register?	The most effective means to inform and engage with DNSPs and other key stakeholders on the use of the DER register would be to hold technical implementation forums between July and December 2019. This would provide an ideal forum to answer technical questions and for key DNSP to troubleshoot issues identified during any pre-1 Dec testing.
4	Timeframe for submission by installer once they have accessed the information in relation to an installation?	We believe it is reasonable for the installer should have access to the installation information for 20 business days post initial log in. Installers should

		be provided with a notification email from the AEMO webinterface prior to the 10 business day timeout to prompt Installers to provide missing data, manage data exceptions and complete the submission.
5	Timeframe for data entry to timeout and automatically submit, given it is not accessed by an installer?	In the following scenarios in which timeouts occur; 1. DNSP submits DER data collected from the applicant at the connection alteration offer stage to the DER register and the installer does not proceed with the installation. AusNet Services allows an installer 90 days for installers to commission the DER installation before our connection alteration offer expires, alternatively Installers may advise that they wish to cancel the solar offer. In these circumstances, we recommend allowing the DSNP to abolish the DER register data, until the customer's representative makes another application. 2. DNSP submits solar offer data to the DER register, the installer completes the installation outside of the DER Register (AEMO Webinteface). Refer to our comments below in respect to the draft determination report section 4.2 Collection Actors – Suggestions. The allowed connection timeframe should allow the installer and DNSP to provide DER register information in these scenarios.
6	Views from DNSPs on how the designation of data fields editable or read-only should work.	Read only: • NMI • Connection Agreement 'job number'; • Inverter device capacity; - note this field is not permitted to vary from the system size the connection applicant has had approved in connection offer) • Connection point net export limit (agreed with the DNSP in the connection agreement); - note this is new field that AusNet Services recommends be

		included in the DER register guideline. • Inverter power quality response modes - Voltage response modes and volt-watt response settings • Inverter power quality response modes - Voltage response modes – volt-var response settings • Other inverter settings that we require to be set in accordance with AS/NZS4777 standards
7	How would DNSPs and installers wish to receive notifications?	AusNet Services would prefer to receive notifications via standard APIs.
8	Are there additional post-submission validation checks that would be of value in step 1.11	No, post submission validation checks should be avoided, because it creates difficult situation for the DNSP to resolve with either the installer or customer. The DNSP attempts to compel either party to provided updated information would either be ineffective or create a consumer backlash against the DNSP and AEMO in the case of the DNSP suggesting their connection alteration is voided by the data quality issue.

Draft DER register information guidelines

Section	Subsection	Issue	Suggestions
4.4	Format of Data submission	In making the DER Register rule, the AEMC establish 6 months for DSNPs to implement the process and IT system requirements that are defined in the "DER Register Information Guideline". However, it did not appear to envisage that further process design and system requirements could also be specified in a document referred to in the DER Register Information Guideline. This appears to be exactly the case: This information will be submitted through an API	AusNet Services strongly recommends that the DER Register Information Guideline is drafted to provide DNSPs with enough information to complete process design and system builds. However, if this isn't possible the "Guide to the DER Register – how to submit and receive information" must also be completed by 1 June 2019.

		or Web interface, and the format will be specified in a companion guideline "Guide to the DER Register – how to submit and receive information". It would appear this additional guide will make changes or new requirements relating to the DER register after 1 June 2019 giving DNSPs less than 6 months to comply with obligations. Also it is not clear whether this approach is compliant with the National Electricity Rules or whether AEMO has the powers to add obligations in the "Guide to the DER Register – how to submit and receive information" that have powers under electricity law.	
8	Protection of information	AusNet Services considers solely relying on privacy by design is not adequate in meeting privacy act obligations.	AEMO should conduct or commission a risk assessment prior to go-live
Appendix A	Data Model	Additionaly, we recommend the inclusion of a new field to record the connection point's export limit, as defined in the customer's connection agreement. This information is important to establish whether a customer is compliant with the terms and conditions of their connection agreement.	We recommend the inclusion of critical information that defines the maximum agreed and hence permit features impacting the grid, including connection point net export limit; • Connection point net export limit (agreed with the DNSP in the connection agreement);
Appendix A	Data Model	The draft guildeline refers to fields being mandatory, where relevant.	AusNet Services considers the following fields to be mandatory: • NMI • Connection Agreemenr 'job number' • Inverter device capacity; • Connection point net export limit (agreed with the DNSP in the connection agreement); - note this is new field that AusNet Services recommends be included in the DER register

			guideline. • Number of phases available • Number of phases with DER installed • Central protection and control (modes) • Inverter/small generating unit manufacturer • Solar Inverter Model Number • Inverter power quality response modes - Voltage response modes – volt-watt response • Inverter power quality response modes - Voltage response modes – volt-var response • Other inverter settings that we require to be set in accordance with AS/NZS4777 standards. We assume the remain fields are not mandatory as they are not relevant to DNSP's when completing the solar connection application and offer.
Appendix A	Data Model	New Fields added in the draft determination: • **Installer Details –** is not adequately described to uniquely indentify the installer • **Non Inverter small generating unit protection modes** – incorrectly assigns the responsibility for populating this to the NSP	• **Installer Details** We suggest using the installers 'ACN - Australian Company Number' as the identifier. • **Non Inverter small generating unit protection modes** This information is to be populated by the installer and not the NSP. The installer will access this information from the non-inveter equipment data sheet and will be required to populate within the DER Register.

Appendix A	Data Model	• **AC Connection group count & Number of AC Connections** – deleted field and new field appear to be the same, they only appear in the draft determination report	• **AC Connection group count & Number of AC Connections** Please confirm if fields are requesting the same information; appears to be a conflict between the DER Register Information Guidelines and the Draft Determination report.
Appendix A	Data Model	Data Model that is represented in the draft DER Register Infromation Guidelines DER Installation (NMI) – AC Connection (NMI/ACConnectionID) - DER Device (NMI/ACConnectionID/DeviceID)	The proposed data model hierarchy is onorus on DNSPs. Maintaining the AC connection to DER device mapping will be difficult to maintain in the long term. We suggest grouping AC Connection together with DER device. Doing so, would better enable batteries with combined inverter energy systems to be characterised, and simply data management for DNSPs and AEMO.

Section	Subsection	Issue	Suggestions
4.2 Collection Actors	4.2.1 Issue Summary and Submission	There are several scenarios whereby DNSPs do not appear to have control over the provision or maintenance of DER register data. When the value of small scale carbon credits is likely to become immaterial	Where Installers do not use the DER Register, or do not submit the complete DER Register data set; AusNet Services suggests the DNSP would populate the DER Register fields where

4.3 Use of default valyes and auto poulation	The DER Register rule provides that DNSPs are responsible for providing DER information to the DER Register. 4.3.2 AMO intends to utilise CEC approved product list to auto-population of data.	in the short term, the DNSP's connection agreement will be the only regulatory requirement for the connection. • Outside of the DSNPs connection agreement process, there are limited incentives to manage Installers compliance with their accountabilities for using the DER Register to populate, update/edit data when completing solar installation, replacement, alteration of decommission. • What will occur when Installers either: (a) Do not use the DER Register when completing solar works, or (b) Do not complete all required information within the register. • When Installers/Customers amend setting within the inverters without approval from the DSNP it becomes difficult for the DNSP to determine whether the information is correct. Once a customer has a valid connection agreement with the DSNP it would be very difficult for the DSNP to require that customer or the installer to provide any additional or updated DER register information. Attempts to collect this data from the customer have the potential to cause reputational damage to the industry, including AEMO and DNSPs.	data has been collected from the installer during the solar connection application and agreement process only. We recommend allowing the DNSP to provide the following fields: • NMI • Connection Agreement 'job number' • Number of phases available • Number of phases with DER installed • Inverter device capacity • Connection point net export limit (agreed with the DNSP in the connection agreement); - note this is new field that AusNet Services recommends be included in the DER register guideline. • Central protection and control (modes) • Inverter/small generating unit manufacturer • Solar Inverter Model Number • Inverter power quality response modes - Voltage response modes – volt-watt response • Inverter power quality response modes - Voltage response modes – volt-var response • Other inverter settings that we require to be set in accordance with AS/NZS4777 standards. Our interpretation of the published draft DER

			register guideline is that the remaining fields are not mandatory as they are not relevant to DNSP's connection alteration offer and agreement. We are concerned that DNSP's would be required to duplicate AEMOs manufacturer and model number validation and provision process to otherwise populate these remaining fields, e.g. the Inverter/small generating unit manufacturer, Solar Inverter Model Number, and default settings that are not mandated by DSNP or AS/NZS4777 standards.
4.9 Data Content	Data Model	• **AC Connection group count & Number of AC Connections** – deleted field and new field appear to be the same, they only appear in the draft determination report	• **AC Connection group count & Number of AC Connections** Please confirm if fields are requesting the same information; appears to be a conflict between the DER Register Information Guidelines and the Draft Determination report.
4.9 Data Content	Data Model	Data Model that is represented in the draft DER Register Infromation Guidelines DER Installation (NMI) – AC Connection (NMI/ACConnectionID) - DER Device (NMI/ACConnectionID/DeviceID)	The proposed data model hierarchy is onorus on DNSPs. Maintaining the AC connection to DER device mapping will be difficult in the long term. We suggest grouping AC Connection table together with DER Device table. Doing so would better enable batteries with combined inverter energy systems to be characterised, and simply data management for DNSPs and AEMO.
4.9 Data Content	Data Model	Historical DER Infromation	How are historical solar connections expected

			to be managed within the DER Register? AusNet Services does not maintain historical records of specific information requested as per the DER Regsiter. It would be unmanageable to map existing AC Connections to DER devices.
F.2 Overview of DER Register functions and user interaction	Installer extracts existing site information (Task 1.5, 1.6 and 3.1)	How will installers manage DER Regsiter technology issues or enquiries (i.e. troubleshooting when registering and using the DER Register)?	AEMO to provide a contact/support process for installers. DNSPs will not be able to provide support to installer experiencing DER Register systems issues, because the installers app interface directly with AEMO's API.