Attachment 1

A1 Rules changes proposed by NEMMCO – review of system restart arrangements

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.3 amend clause	 3.11.3 Procedure for determining quantities of non-market ancillary services NCAS (a) NEMMCO must develop and publish a detailed description of each-non-market ancillary services NCAS. (b) NEMMCO must develop and publish a procedure for determining the quantities y of each kind of-non-market ancillary services NCAS required for NEMMCO: (1) to achieve the power system security and reliability standards; and (2) where practicable to enhance network transfer capability whilst still maintaining a secure operating state when, in NEMMCO's reasonable opinion, the resultant expected increase in-non-market ancillary services NCAS in the provide state when the non-market ancillary services NCAS is not non-market ancillary services in the spot market. 	 Non-market ancillary services comprise NCAS and SRAS. SRAS is dealt with in this context by new clause 3.11.4A. This amended clause maintains the effect of the current Rules for NCAS.
3.11.4 amend clause	 3.11.4 Acquisition of <u>non-market ancillary services NCAS</u> (a) NEMMCO must use reasonable endeavours to acquire the following <u>non-market</u> <u>ancillary services NCAS</u> in accordance with the remaining provisions of this clause 3.11.4 and clauses 3.11.5, 3.11.5C, 3.11.5D, and 3.11.5E. (1) NCAS; and (2) system restart. 	 Non-market ancillary services comprise NCAS and SRAS. SRAS is dealt with in this context by new clause 3.11.4A. This amended clause maintains the effect of the current Rules for NCAS.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.4A insert clause	 3.11.4A Guidelines and objectives for acquisition of SRAS (a) NEMMCO must use reasonable endeavours to acquire SRAS in accordance with the remaining provisions of this clause 3.11.4A and clauses 3.11.5B, 3.11.5C, 3.11.5D, 3.11.5F, 3.11.5G and 3.11.5H. (b) NEMMCO must, in accordance with Rules consultation procedures, develop and publish, and may from time to time amend, a detailed description of each type of restart service being either a primary restart service or a secondary restart service. The description must include, without limitation, the technical and availability requirements of each type of restart service. (c) NEMMCO must, in accordance with Rules consultation procedures, determine and publish, and may from time to time amend; (1) guidelines for undertaking: (i) modelling and assessment of technical capabilities of offered restart services; and (ii) physical testing of SRAS or restart service if required to do so; and facility is capable of delivering a restart service if required to do so; and (2) guidelines for establishing the number, type and location of restart services to be procured for each electrical sub-network, that may, without limitation, take into account any additional secondary service allowance determined under clause 3.11.5G(c) 	 Ahead of calling for expressions of interest (EOIs) to supply restart services, NEMMCO must clearly signal to the market: technical requirements for restart services, including expectations for adequate physical testing; the process for desktop assessment of offers and how "best value" services would be determined; and how the number and type of services to be procured would be determined. Guidelines of the nature indicated here need to outline a process of assessment and testing sufficient to provide a reasonable degree of certainty that the contracted services would perform in the manner warranted if and when required to do so. [Ref: Final report, introduction to Section 2.3] Guidelines for establishing the number of restart services to be procured relate to both a) the procurement process (see Section 2.2 of the Final report); and b) management of prospective restoration outcomes when secondary restart services are procured due to non-availability of suitable primary restart services (see Section 2.1 of the Final report). The descriptions and guidelines for acquisition of restart services must be consistent with the requirements of the system restart service standard.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.4A insert clause [continued]	 (d) Each of the guidelines developed and published pursuant to clause 3.11.4A(c) must be consistent with the objectives of the SRAS procurement process, which are as follows: (1) the system restart service standard is to be satisfied; (2) each restart service is to be assigned to at least one electrical sub-network; (3) the need for restart services in each electrical sub-network is to be met, to the extent that it is practicable and reasonable to do so, by contracting primary restart services are strategically located with respect to generation centres; and (4) achievement of economically efficient outcomes, wherever practicable and 	 In specifying objectives of the SRAS procurement process the objective is to limit the discretion NEMMCO is able to exercise in its establishment of procurement guidelines (see proposed clause 3.11.4A(c)(2) and Section 2.2 of the Final report). Procurement guidelines would be subject to consultation to ensure all stakeholders have the opportunity to provide input to the robustness and transparency of the decision making process. [Ref: Final report, Section 2.2]
	reasonable, by procuring a combination of services that minimise the overall cost of restart services, taking into account the need to meet the system restart service standard.	Guidelines relating to assessment / testing processes would be subject to full industry consultation.
3.11.4B insert clause	 <u>3.11.4B</u> Determination of electrical sub-network boundaries <u>NEMMCO</u> must determine and <i>publish electrical sub-network</i> boundaries in consultation with the <i>Jurisdictional Co-ordinators</i> and <i>Transmission Network Service</i> <u>Providers</u>. In making this determination <u>NEMMCO</u> must take account of, but is not limited by, the following: (a) the number and strength of transmission corridors, where strength is determined by thermal or stability (transient, voltage, oscillatory) limits, connecting one part of the power system to the remainder of the power system; (b) the electrical distance (length of transmission lines) between generation centres; (c) the amount of generation in each part of the power system; and 	 Boundaries for electrical sub-networks must be clearly signalled to the market ahead of NEMMCO calling for expressions of interest (EOIs) to supply restart services. The criteria for determining electrical sub- network boundaries should be understood and applied by all parties involved in their determination. Codified criteria ensure compatibility of sub-networks with the broader SRAS procurement process, including the system restart service standard.
	(d) the amount of <i>load</i> in each part of the <i>power system</i> .	 Consultation on electrical sub-network boundaries – a fundamental system security issue – is to be limited to parties without any commercial interest in the outcome as specified in the Final report, Sections 2.5.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.4C insert clause	3.11.4C Transitional provision for acquisition of non-market ancillary services On the date this clause 3.11.4C takes effect ("the commencement date"), any action taken by NEMMCO prior to the commencement date that directly or indirectly relates to the purpose of procuring and securing the provision of non-market ancillary services for a period ending after the commencement date is taken to have been taken by NEMMCO after the commencement date.	A transitional provision only.
3.11.5 amend clause	 3.11.5 Tender Process for non-market ancillary services NCAS (a) Except as provided in clause 4.8.9, if NEMMCO wishes to acquire a non-market ancillary service NCAS, then NEMMCO must call for offers, via a NMAS invitation to tender, from persons who are in a position to provide the non-market ancillary service-NCAS so as to have the required effect at a connection to a transmission network in an invitation to tender. (a1) NEMMCO may determine, without limitation, the terms and conditions for the NMAS invitation to tender, process. including but not limited to: (1) time frames over which NMAS tender assessment and physical testing of selected NCAS will occur; (2) the period for which each NCAS would be contracted; (3) any requirement for tenderers to provide data, models and parameters of relevant plant, sufficient to facilitate a thorough assessment of the network impacts and power station impacts of the use of the tendered service; and (4) the terms and conditions of the ancillary services agreement NCAS providers would be expected to enter into to be annexed to the NMAS tender. (b) A Registered Participant is not under any obligation to submit an offer NMAS tender in response to an call for offers under this clause 3.11.5NMAS tender or any offer-NMAS tender in response to a call for offers under this clause 3.11.5NMAS tender or any offer-NMAS tender. 	 Non-market ancillary services comprise NCAS and SRAS. SRAS is dealt with in this context by new clause 3.11.4A. This clause clarifies the current Rules provisions for NCAS New sub-clause (a1) reflects similar requirements inserted for optimal preparation for SRAS tenders – see proposed clause 3.11.5B(b)].

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5 amend clause [continued]	 (d) Where a <i>Registered Participant</i> submits an offer <u>NMAS tender</u> in response to a call for offers under this clause 3.11.5 <u>NMAS invitation to tender</u> and <u>NEMMCO</u> wishes to negotiate the terms of that offer <u>NMAS tender</u>, <u>NEMMCO</u> and the <i>Registered Participant</i> must negotiate in good faith. (d1) [Deleted] In ascessing any offers submitted in response to a call for offers under this clause 3.11.5, <u>NEMMCO</u> must seek to acquire the quantity of the relevant kind of <i>non-market ancillary service</i> determined in accordance with clause 3.11.3 by competitive tender in accordance with this paragraph (d1). A tender will be deemed to be a competitive tender for a particular <i>non-market ancillary service</i> determined in accordance with clause 3.11.3 by competitive tender for a particular <i>non-market ancillary service</i> if the required quantity of that <i>non-market ancillary service</i> determined in accordance with clause 3.11.3 can be supplied from the conforming offers received by <u>NEMMCO</u> with any one conforming offer discarded or all conforming offers from any one party discarded. If a tender process is not deemed to be a competitive tender for a particular <i>non-market ancillary service</i>, then <u>NEMMCO</u> and those <i>Registered Participants</i> that submitted conforming and non-conforming tenders selected by <u>NEMMCO</u>, must negotiate in good faith to agree reasonable terms and conditions for the supply of the relevant kind of <i>non-market ancillary service</i>, taking into account the need to: (1) subject to paragraph (2), so far as practicable minimise the overall cost of supply of those <i>non-market ancillary service</i>; and (2) appropriately remunerate the providers of the relevant <i>non-market ancillary service</i> after 21 <i>business</i> days from delivery to the <i>Registered Participant</i> of a written notice <i>to negotiate</i>, then oither <i>NEMMCO</i> or the <i>Registered Participant</i> and conditions for the supply of <i>non-market ancillary service</i> after 21 <i>business</i> days from delivery to the <i>Registered Pa</i>	 Dispute provisions for NCAS now combined with dispute provisions for SRAS in clauses 3.11.5C, 3.11.5D and 3.11.5E. See also Section A2.2 of Attachment 2.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5	(e) [Deleted] Subject to clause 3.11.5(f), NEMMCO must not acquire non-mar ancillary services from any person who is not a Registered Participant.	 Clauses (e) to (j) have been moved – contracting / notification provisions for NCAS
amend clause [continued]	(f) [Deleted] NEMMCO may enter into an agreement to acquire non-market a services with a person who is not a Registered Participant if that agreement includes a condition for the benefit of NEMMCO that no ancillary services v provided under the agreement until that person becomes a Registered Participant if the person becomes a Registered Participant.	now provided for in new clause 3.11.5D. nt will be
	(g) [Deleted] If NEMMCO calls for offers under clause 3.11.5(a) in respect of a of non-market ancillary service, then NEMMCO must notify Registered Participants when it believes that it has available, under ancillary services agreements, a sufficient quantity of that kind of non-market ancillary service determined by applying the procedure developed under clause 3.11.3).	
	(h) [Deleted] Within 5 business days of NEMMCO giving a notice under clause 3.11.5(g), NEMMCO must publish the total quantity of cach kind of non-ma ancillary service acquired by NEMMCO pursuant to ancillary service agree under this clause 3.11.5.	arkot
	(i) [Deleted] A Registered Participant must comply with an ancillary services agreement between the Registered Participant and NEMMCO under which Registered Participant provides one or more non-market ancillary services.	

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5A insert clause	 3.11.5A Expressions of interest for the provision of restart services (a) Prior to issuing a NMAS invitation to tender for an electrical sub-network for the provision of restart services, NEMMCO must call for SRAS expressions of interest, the terms and conditions and timeframes of which are to be determined by NEMMCO consistent with: the quidelines established under clause 3.11.4A; and. the determination of electrical sub-network boundaries pursuant to clause 3.11.4B. (b) Prior to responding to any call for SRAS expressions of interest for the provision of restart services, prospective respondents should engage in discussions with relevant Network Service Providers and other relevant parties to identify and resolve, where possible, issues that would prevent the delivery of effective restart services by that prospective respondent. (c) Network Service Providers must negotiate in good faith with prospective respondents to resolve, and must resolve where it is reasonable and practicable to do so, any issues raised by the prospective respondents. (d) Network Service Providers must negotiate in good faith with prospective respondents to resolve, where it is reasonable and practicable to do so, any issues associated with the conduct of testing required by NEMMCO pursuant to clause 3.11.4A(c)(1)(i). Network Service Providers must agree to participate in, or facilitate, testing of a restart service where it is reasonable and practicable to do so. (e) A Registered Participant is not under any obligation to submit a proposal in response to a call for SRAS expressions of interest. (f) If at least one proposal received pursuant to a SRAS expression of interest, in NEMMCO must create a short-list of proposals following its assessment of proposals. Short-listed proposals will receive a NMAS invitation to tender under clause 3.11.5B. 	 Prospective service providers should ensure their EOI represents a fully developed package. Ideally, prospective service providers will have engaged in discussions with all relevant parties prior to submitting their EOI. NSPs would be expected to assist prospective restart service providers where it is reasonable to do so in the development of EOIs and required restart service testing programs. The intent of the EOI process is to give NEMMCO an opportunity to undertake an initial high level assessment of offers – by applying guidelines developed under 3.11.4A – and to create a short-list of offers eligible to proceed to detailed assessment in the formal tender process. [Ref: Final report, Section 2.3.1]

Affected clause Cla and nature of change	ause with proposed amendments	Reason
3.11.5B <u>3.1</u> insert clause (a) (b) (c) (d) (e)	 who submitted the proposals short-listed pursuant to clause 3.11.5A(f). Subject to complying with the guidelines developed pursuant to clause 3.11.4A(c). NEMMCO may determine the terms and conditions for the NMAS invitation to tender including, but not limited to: (1) time frames over which tender assessment and physical testing of selected restart services will occur; (2) the period for which each of primary restart services and secondary restart services would be contracted; (3) any requirement for tenderers to provide data, models and parameters of relevant plant, sufficient to facilitate thorough assessment of the network impacts and power station impacts of the use of the tendered service; and (4) the terms and conditions of the ancillary services agreement the prospective SRAS providers would be expected to enter into to be annexed to the NMAS invitation to tender. The persons identified in clause 3.11.5B(a) are not under any obligation to submit a NMAS tender in response to an NMAS invitation to tender under this clause 3.11.5B. NEMMCO is not under any obligation to accept the lowest priced NMAS tender or any NMAS tender in response to a NMAS invitation to tender. 	 Short-listed EOIs would proceed to formal tender and detailed assessment of offers, consistent with the guidelines for assessment and determination of the appropriate number of services to be procured as established via clause 3.11.4A. Subject to adhering to general (consulted on) guidelines for the conduct of the tender process, NEMMCO needs to have discretion to manage the scope and timing of the tender process to meet the emerging needs of the market and system security considerations. [Ref: Final report, Sections 2.3.2 and 2.3.4]

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5C insert clause	 3.11.5C Reasonable terms and conditions for <i>non-market ancillary services</i> (a) In assessing any <i>NMAS tenders, NEMMCO</i> must seek to acquire the relevant <i>non-market ancillary services</i> on terms and conditions consistent, to the extent practicable, with the following guiding principles: (1) remuneration reflecting efficiently incurred long-run incremental costs of providing the <i>non-market ancillary services</i>; (2) remuneration (excluding any <i>primary service premium</i>, if applicable) being sufficient (but need not be more than sufficient) to encourage efficient investment in the relevant <i>non-market ancillary services</i> and innovation in the provision of those services; (3) remuneration (excluding any <i>primary service premium</i>, if applicable) for providers of the <i>non-market ancillary services</i> providing a return on capital adjusted for risk, that is equal to, or close to equal to, the opportunity cost of the capital employed; and (4) the terms and conditions of the agreement to be entered should not be inconsistent with the terms and conditions of the draft <i>ancillary services agreement</i> annexed to the <i>NMAS invitation to tender</i>. (b) If, at any time after the closing date for the lodgement of <i>NIMAS tender</i> pursuant to either clause 3.11.50 or clause 3.11.5B, <i>NEMMCO</i> may issue a <i>NMAS notice of clarification</i> will include an explanation by <i>NEMMCO</i> of the aspects of the <i>NMAS tender</i> to which the <i>NMAS notice</i> of <i>clarification</i> applies. (c) If <i>NEMMCO</i> issues a <i>NMAS notice of clarification</i> to a tenderer, <i>NEMMCO</i> is not obliged to inform any other tenderer of that notice, or to issue a similar notice to any other tenderer. 	 This new clause 3.11.5C provides a revised means of identifying and working through circumstances where competitive disciplines may not be apparent in the tender process. It replaces clauses 3.11.5(d1) and 3.11.5(d2) in the existing Rules. Refer to Section 2.7.2 of the Final report, for further detailed discussion on this matter.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5D insert clause	 Notice of intention to contract for non-market ancillary services and execution of agreement (a) Subject to clause 3.11.5D(b), NEMMCO must not acquire non-market ancillary services from any person who is not a Registered Participant. (b) NEMMCO may enter into an agreement to acquire non-market ancillary services with a person who is not a Registered Participant if that agreement includes a condition precedent for the benefit of NEMMCO that the agreement does not commence until that person becomes a Registered Participant. (c) Subject to clause 3.11.5D(e) and 3.11.5D(f), if 30 business days have elapsed from the closing date by which tenders were to be lodged for either NCAS or SRAS, as the case may be, NEMMCO may either; (1) deliver a NMAS notice of intention to contract to any one or more tenderers; or (2) execute an ancillary services agreement with any one or more tenderers. (d) If NEMMCO executes an agreement pursuant to clause 3.11.5D(c)(2), NEMMCO must advise the counterparty to it of NEMMCO's execution as soon as is practicable following execution. (e) NEMMCO and a tenderer may agree to a lesser period than the period specified in clause 3.11.5D(c). (f) At any time prior to the delivery of a NMAS notice of intention to contract or receipt of notification under clause 3.11.5D(d) a party can withdraw its NMAS tender. (g) Once a tenderer has received a NMAS notice of intention to contract or notification of NEMMCO's execution of the agreement under clause 3.11.5D(d), that tenderer cannot withdraw its NMAS tender. 	 Clause 3.11.5D replaces old clauses 3.11.5(e) to (j) and provides timeframes for either executing a contract or advising an intention to contract. Further discussion on the arrangements set out here regarding the opportunity for participants to withdraw offers is provided in Section A2.2 of Attachment 2.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5D insert clause [continued]	(h) If NEMMCO has received tenders for non-market ancillary services, NEMMCO must notify Registered Participants when it believes that it has available, under ancillary services agreements, a sufficient quantity of the relevant non-market ancillary services.	Proposed clauses 3.11.5D(h) to (j) reflect existing Rules clauses 3.11.5(g) to (i), which are to be deleted.
	 (i) <u>Within 5 business days of NEMMCO's notice under clause 3.11.5D(h), NEMMCO</u> <u>must publish the total quantity of the relevant non-market ancillary services</u> <u>acquired.</u> 	
3.11.5E insert clause	 Non-market ancillary service notice of dispute (a) If NEMMCO has issued a NMAS notice of intention to contract and a NMAS notice of clarification, and if at least 20 business days have elapsed from the date of issue of the NMAS notice of clarification, NEMMCO may serve an Adviser referral notice in accordance with clause 8.2.5, whereupon the dispute resolution mechanisms in clause 8.2 shall apply, notwithstanding that the prospective non-market ancillary service provider may not be a Registered Participant. 	• Dispute can only be invoked in order to process the matter further if NEMMCO has formed a view that the tenderer's service is required in order for the standard to be effectively met, and after issue by NEMMCO of a notice of intention to contract. Prior to issuing a notice of dispute, there has already been an opportunity for at least 20 business days of negotiation following the issue of a notice of clarification.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5E insert clause [continued]	 (b) For the purposes of resolving the issues raised by the Adviser referral notice issued under clause 3.11.5E(a), clause 8.2 shall apply subject to the following variations: clause 8.2.4 shall not apply: clause 8.2.5(b) is amended by replacing the words "5 business days" where they appear with "2 business days"; clause 8.2.5(c) is amended by replacing the words "10 business days" where they appear with "4 business days"; clause 8.2.5(e) shall not apply; clause 8.2.6(c) is amended by replacing the words "10 business days" where they appear with "4 business days"; clause 8.2.6(c) is amended by replacing the words "to the Stage 1 dispute resolution process" where they appear with "to the dispute"; clause 8.2.6A(c) is amended by replacing the words "to the Stage 1 dispute resolution process" where they appear with "to the dispute"; clause 8.2.6A(h)(1) is amended by replacing the words "Registered Participant" where they appear with "a party to the dispute"; clause 8.2.6B(a) is replaced it with "(a) The parties to the dispute before the DRP are the parties named in the Adviser referral notice as being parties to the dispute; clause 8.2.6D(c)(2) shall not apply; clause 8.2.6D(c)(2) shall not apply; clause 8.2.9(c) and 8.2.9(d) are amended by replacing the words "A Registered Participant" where they appear with "A party to the dispute"; and (11) clause 8.2.14 shall not apply. 	 Should the contracting process go so far as entering a formal dispute phase, there will be an imperative to resolve the matter quickly. To continue management of the system without suitable contracts in place, will put at risk the security of the power system and its ability to recover from major system disturbances. Due to the process leading up to initiation of a dispute by NEMMCO, it is proposed to enter the dispute resolution process at Stage 2 with appropriate guidelines for the dispute adviser to determine an outcome. Some aspects of clause 8.2 should not be applicable – for instance, it would not be appropriate for other ancillary service providers or potential providers to be present at the dispute. Clause (b)(10) deals with the circumstances where NEMMCO has entered into a contract with a person who does not become a Registered Participant.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5E insert clause [continued]	 (c) Notwithstanding anything in clauses 3.11.5E(a) and (b), the resolution of a dispute pursuant to clause 3.11.5E must be such that remuneration for a non-market ancillary service provider closely approximates the outcome that would be obtained in a competitive market and, to the extent practicable, that: (1) remuneration reflects efficiently incurred long-run incremental costs of providing the non-market ancillary service; (2) remuneration (excluding any primary service premium, if applicable) is sufficient (but need not be more than sufficient) to encourage efficient investment in the non-market ancillary service and innovation in the provision of that service; (3) remuneration (excluding any primary service premium, if applicable) for providers of non-market ancillary services provides a return on capital, adjusted for risk that is equal to, or close to equal to, the opportunity cost of the capital employed; and (4) the terms and conditions of the agreement to be entered into should not be inconsistent with the terms and conditions of the draft ancillary services agreement annexed to the NMAS invitation to tender. 	 Unlike existing Rules provisions, there is no opportunity for a prospective service provider to invoke a dispute. NEMMCO has clear obligations to conduct an assessment process that is as transparent as possible and it would be inappropriate for NEMMCO to be placed in a position where it was forced to contract with a party NEMMCO considers unable to provide an effective restart service. See Section A2.2 in Attachment 2 for further detail regarding the ability for a tenderer to withdraw an offer if a dispute is invoked.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5F insert clause	 3.11.5F Contracting requirements for SRAS An ancillary services agreement for SRAS must contain the following terms and conditions as a minimum: (a) the testing requirements for the restart service; (b) a term that states that the testing requirements for a particular period must be successfully completed prior to any payment that is contingent upon that testing being made for the provision of SRAS; and (c) a term requiring the counterparty to pay liquidated damages to NEMMCO if it fails to register as a Registered Participant, perform in accordance with the agreement, or fails to satisfy the testing requirements. The quantum of liquidated damages determined is to be an agreed genuine pre-estimate of the damage that may be suffered by NEMMCO as a result of the restart service not being provided when stipulated in the ancillary services agreement. (d) the remuneration to be paid to the service provider to include, but not be limited to, payment comprising the following: agreed amounts in respect of restart service testing; and agreed amounts in respect of restart service usage; and any applicable primary service premium. 	 Although testing requirements for contracted restart services must be incorporated in ancillary services agreements, where appropriate, specific testing arrangements for individual restart services could incorporate requirements that vary from published guidelines (by agreement between successful tenderer and NEMMCO). A contractual requirement for tests to be conducted prior to any payment being made is consistent with the arguments advanced in the Final report, Sections 2.3.3 and A1.3.3. Provision for liquidated damages is in accordance with the Final report recommendations at Section 2.3.3. Specification of the remuneration structure of SRAS contracts provides some guidance to the tender process, negotiation and potential dispute resolution. [Ref: Final report, Section 2.7.1]

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5G	3.11.5G Primary service premium and additional secondary restart services allowance	Given the justification for both:
insert clause	(a) The purpose of the primary service premium is to:	 the primary service premium; and
	(1) <u>encourage competition for highly dependable primary restart services; and</u>	 the allowance for the acquisition of
	(2) provide an incentive for prospective respondents to the SRAS procurement process to strive for status as a highly dependable primary restart service	secondary restart services
	provider.	each rely on an interpretation of community expectations regarding the volume of
	(b) <u>As soon as practicable, the AEMC must determine either the amount of, or a methodology for establishing, the primary service premium, which is to be paid to contracted primary restart service providers in addition to any agreed amounts for restart services.</u>	additional funds the market should allocate for robustness of restart services, a regulatory / policy making body such as the AEMC (guided by any advice from jurisdictional governments) may be best placed to make
	(c) As soon as practicable, the AEMC must determine an additional secondary service allowance, as an amount that may be paid by NEMMCO for the acquisition of secondary restart services over and above the restart services required to meet the system restart service standard, subject to the following conditions:	such judgements on behalf of the community. [See also Section A2.3 in Attachment 2; and Section 2.7.1 of the Final report .]
	 (1) <u>in determining this allowance, the AEMC shall take account of the value to</u> <u>the community encompassed by all participating jurisdictions, of having</u> <u>available to NEMMCO the additional security and certainty provided by</u> <u>additional secondary restart services, and</u> (2) <u>without limitation, the allowance may include specific amounts that may be</u> <u>paid by NEMMCO for additional restart services for any, or each, electrical</u> <u>sub-network.</u> 	
((d) In determining either:	
	(1) <u>a primary service premium pursuant to clause 3.11.5G(b); or</u>	
	(2) <u>an additional secondary service allowance pursuant to clause 3.11.5G(c)</u> ,	
	the AEMC must consult the Ministers for each of the participating jurisdictions.	
	(e) <u>The AEMC may, from time to time review and amend the <i>primary service premium</i> and the <i>additional secondary service allowance</i>.</u>	

Affected clause and nature of change	Clause with proposed amendments	Reason
3.11.5H insert clause	3.11.5H Tendering for a specific restart service If, after completion of assessment of tenders received pursuant to a NMAS invitation to tender for SRAS, NEMMCO has not been able to contract sufficient restart services to meet the system restart service standard, NEMMCO may, following consultation with relevant Ministers, determine to conduct a call for SRAS expressions of interest and NMAS invitation to tender for the installation, at a suitable location, of facilities to provide a suitable restart service. The process to do this shall replicate the process followed in the procurement of SRAS pursuant to clauses 3.11.4A, 3.11.5A, 3.11.5B, 3.11.5C, 3.11.5D, 3.11.5E and 3.11.5F.	This clause gives effect to recommendations of the Final report , Section 2.8.

Affected clause and nature of change	Clause with proposed amendments	Reason
3.15.6A	3.15.6A Ancillary service transactions	These provisions seek to recover SRAS costs
replace clauses	 (d) In each trading interval, in relation to each Market Generator in each region, an ancillary services transaction occurs, which results in a trading amount for each region determined by NEMMCO in accordance with the following formulae: $TAG_j = -1 * TSRP_j * GSH_j$ and	on a regional basis. Costs would continue to be equitably shared between generators and retailers in a region consistent with the recommendations contained in Section 2.7.3 of the Final report . Progression of regional recovery at this stage, rather than a later stage as considered in the Final report , is discussed in Section A2.1 in Attachment 2.
	$TSRP_{j} = \left[\sum_{x} (TSRP_{x} * ESH_{x,j})\right]$ $GSH_{j} = TGE_{j} / (ATGE_{j} + ATCE_{j})$ $ESH_{x,j} = (ATGE_{x,j} + ATCE_{x,j}) / (ATGE_{x} + ATCE_{x})$ where	
	TSRP; (in \$) = the total amount in respect of the trading interval to be recovered from all Generators and all Market Customers in region "j"; GSH; = the share of TSRP; determined annually by NEMMCO to apply for the 12 months after each 1 July, a Generator in region j is liable to pay in respect of the trading interval;	
	TAG _i (in \$)=the trading amount for a Market Generator in region "j" in respect of the trading interval to be determined (which is a negative number);TODD (in \$)If the trading interval (in the trading interval (in the trading interval);	
	TSRP_x (in \$)=the total of all amounts payable by NEMMCO in respect of the trading interval in electrical sub- network "x" under ancillary services agreements to provide restart services;	

Affected clause and nature of change	Clause with proposed amen	dments	Reason
3.15.6A replace clauses [continued]	<u>ESH_{x.i}</u>	the share of "the sum of aggregate generator energy and aggregate customer energy" located in electrical sub-network "x", that is also located in region "j";	
	<u>TGE_i (in MWh)</u>	the generator energy in region "j" for the Market Generator for the 52 weeks ending on or before the immediately preceding 31 March;	
	<u>ATGE_x (in MWh)</u>	the aggregate of the generator energy figures in electrical sub-network "x" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March;	
	<u>ATGE_j (in MWh)</u>	the aggregate of the generator energy figures in region "j" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March;	
	<u>ATGE_{xj} (in MWh)</u>	the aggregate of the generator energy figures in both electrical sub-network "x" and region "j" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March;	
	<u>ATCE_x (in MWh)</u>	the aggregate of the customer energy figures in electrical sub-network "x" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March;	
	<u>ATCE_i (in MWh)</u>	the aggregate of the customer energy figures in region "j" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March; and	
	<u>ATCE_{x,i} (in MWh)</u>	the aggregate of the customer energy figures in both electrical sub-network "x" and region "j" for all Market Generators for the 52 weeks ending on or before the immediately preceding 31 March.	

Affected clause and nature of change	Clause with proposed amendments	Reason
3.15.6A replace clauses [continued]		 See comment above on replacement clause 3.15.6A(d) and Section A2.1 in Attachment 2.
	where	
	$\frac{TAC_{i} (in \$)}{ESH_{x,i}} = \frac{\text{the trading amount for a Market Customer in}}{i \text{region "j" in respect of the trading interval to be}}$ $\frac{ESH_{x,i}}{ISRP_{x} (in \$)} = \frac{\text{has the meaning given in paragraph (d);}}{ISRP_{x} (in \$)} = \frac{\text{has the meaning given in paragraph (d);}}{ICE_{i} (in MWh)} = \frac{\text{the customer energy in region "j" for the Market}}{Customer for the 52 weeks ending on or before}$ $\frac{ISRP_{x} (in \$)}{ISRP_{x} (in \$)} = \frac{I}{ISRP_{x} $	
	ATCE _i (in MWh) = has the meaning given in paragraph (d).	

Affected clause and nature of change	Clause with proposed amendments	Reason
4.2.6 amend clause	4.2.6 General principles for maintaining power system security	"Black start-up facilities" would no longer be a defined Rules term.
	 (e) Sufficient black start-up facilities <u>SRAS</u> should be available so as to allow the restoration of power system security and any necessary restarting of generating units following a black system condition major supply disruption, in accordance with the system restart service standard. 	 There is merit in ensuring contracted restart services are available to assist in power system restoration regardless of whether or not the supply failure is sufficiently widespread for NEMMCO to declare a black system condition. Although a similar effect could probably be achieved via contractual arrangements, amending this provision in the Rules removes any doubt that restart services could be used in this way. Major supply disruption would be a new term
		 Major supply disruption would be a new term for a supply failure <u>that may or may not be</u> sufficiently widespread for NEMMCO to declare a black system condition.
		[Ref: Final report, Section 2.7.5]

Affected clause and nature of change	Clause with proposed amendments	Reason
4.3.1 amend clause	 4.3.1 Responsibility of NEMMCO for power system security The NEMMCO power system security responsibilities are: (p) to procure adequate system restart ancillary services <u>SRAS</u> in accordance with clause 3.11.4A to enable NEMMCO to co-ordinate the <u>a</u> response to a partial or total black system condition major supply disruption;	 There is merit in ensuring contracted restart services are available to assist on power system restoration regardless of whether or not the supply failure is sufficiently widespread for NEMMCO to declare a black system condition. Although a similar effect could probably be achieved via contractual arrangements, amending this provision in the Rules removes any doubt that restart services could be used in this way. Major supply disruption will be the new term for a supply failure that may or may not be sufficiently widespread for NEMMCO to declare a black system condition. [Ref: Final report, Section 2.7.5]

Affected clause and nature of change	Clause with proposed amendments	Reason	
4.8.3	4.8.3 NEMMCO's advice on power system emergency conditions	Given a major supply disruption – as distinct	
amend clause	(a) NEMMCO must publish all relevant details promptly after NEMMCO becomes aware of any circumstance with respect to the power system which, in the reasonable opinion of NEMMCO, could be expected to materially adversely affect supply to or from Registered Participants.	from a black system condition – could be the trigger for the deployment of SRAS, the circumstances in which NEMMCO should provide advice should be broadened accordingly.	
	(b) Without limitation, such circumstances may include:		
	 electricity supply capacity shortfall, being a condition where there is insufficient generation or supply options available to securely supply the total load in a region; 		
	(2) unexpected disruption of <i>power system security</i> , which may occur when:		
	(i) an unanticipated major <i>power system</i> or <i>generation plant contingency event</i> occurs; or		
	 significant environmental or similar conditions, including weather, storms or fires, are likely to, or are affecting the <i>power system</i>; or 		
	(3) a-black system condition major supply disruption.		
4.8.12	4.8.12 [Deleted] Local black system procedures	To be replaced by new (and more	
delete clause	(a) Each Generator and Market Network Service Provider must develop draft local black system procedures for each of its power stations and each of its network elements which contribute to the provision of market network services and must submit those procedures for approval by NEMMCO.	comprehensive) clause 4.8.12A. Existing clause 4.8.12 does not adequately define the requirements of the system restart plan and local black system procedures.	
	(b) NEMMCO may request amendments to draft local black system procedures or any proposed changes as NEMMCO reasonably considers necessary by notice in writing to a Generator or Market Network Service Provider.		
	(c) If NEMMCO and a Generator or Market Network Service Provider are unable to agree on the amendments, the matter may be dealt with under the dispute resolution procedures in clause 8.2.		

Affected clause and nature of change	Clause with proposed amendments	Reason
4.8.12A Insert clause	 4.8.12A System restart plan and local black system procedures (a) <u>NEMMCO</u> must prepare, and may from time to time amend, a system restart plan for the purpose of managing and coordinating system restoration activities during any major supply disruption. (b) The system restart plan is confidential information. (c) The system restart plan must be consistent with achievement of the system restart service standard. (d) Each Generator and Network Service Provider must develop local black system procedures in accordance with the guidelines established pursuant to clause 4.8.12A(e). On request from NEMMCO, or as a result of a significant change of circumstances, a Generator or Network Service Provider must review, and amend if appropriate, its local black system procedures. (e) Subject to clause 4.8.12A(f), NEMMCO must develop and publish guidelines for the preparation of local black system procedures in consultation with Generators and Network Service Providers. (f) Local black system procedures must, without limitation: (1) be consistent with any ancillary services agreement to provide restart services a Generator may be party to; and (2) provide sufficient information to enable NEMMCO to understand the likely condition and capabilities of plant following any major supply disruption such that NEMMCO is able to effectively coordinate the safe implementation of the system restart plan; and (3) appropriately incorporate any relevant customer specific energy support arrangement a Generator or Network Service Provider may be party to. 	 Replaces old clause 4.8.12. The requirements for the suite of system restart plans and procedures was set out in the Fina report Section 2.6. A clear purpose for both the system restart plan and local black system procedures needs to be established. An explicit relationship between the system restart plan and the system restart service standard should be established. As a result of system security considerations, the system restart plan cannot be a public document. These provisions give NEMMCO the ability to effectively manage the integrity of the restoration process. The requirement for NEMMCO to develop and publish guidelines for the preparation of local black system procedures, and to subsequently approve those procedures, gives effect to recommendations as discussed in the Final report Section 2.4 and 2.6. Sub-clause (f), in combination with subclauses (h) and (i), gives effect to recommendations for management of offmarket agreements as discussed in the Final report Section 2.4 and 2.6.

Affected clause and nature of change	Claus	se with proposed amendments	Reas	on
4.8.12A insert clause [continued]	(i) (i) (i) (i) (i) (i) (i) (i)	 Each Generator and Network Service Provider must submit its local black system procedures, including any amendments, to NEMMCO for approval. In considering whether to approve these, NEMMCO will take into account the consistency of the local black system procedures with: the guidelines established pursuant to clause 4.8.12A(e); and relevant components of the system restart plan. NEMMCO may request amendments to local black system procedures, including, without limitation, variation or addition of conditions to any customer specific energy support arrangement, as NEMMCO reasonably considers necessary to ensure the integrity of the system restart plan. When requesting amendments, NEMMCO must provide reasons for those amendments. Requests by NEMMCO for amendments under clause 4.8.12A(h) must be by notice in writing to a Generator or Network Service Provider. Reasonable equests by NEMMCO for amendments under clause 4.8.12A(h) must be by notice in writing to a Generator or Network Service Provider. NEMMCO must ensure NEMMCO and Network Service Providers jointly develop communication protocols to facilitate the exchange of all information relevant to he roles played by NEMMCO, Network Service Providers, Generators and Customers in the implementation of the system restart plan. 	•	The ability for NEMMCO to request amendments to draft local black system procedures reflects the need for local black system procedures to be consistent with the requirements of the system restart plan. NEMMCO will be responsible for the development of communication protocols that ensure an understanding by all key parties (including specific major customers where appropriate) of their role and expectations in the system restoration process. [Ref: Final report , Section 2.6, p.49]

Affected clause and nature of change	Clause with proposed amendments	Reason
4.8.13	4.8.13 [Deleted] Testing of black start-up facilities and local black system procedures	Detailed requirements for testing of
delete clause	(a) Each Generator providing black start-up facilities must arrange for the testing of:	facilities involved in providing SRAS is most effectively dealt with in contract
	(1) its <i>black start-up facilities</i> which are the subject of an <i>ancillary services</i> agreement; and	arrangements. The nature of contract arrangements will be clearly
	(2) the approved local black system procedures, to be carried out in accordance with NEMMCO's reasonable requirements at intervals nominated by NEMMCO, not exceeding 12 months to demonstrate that:	communicated (and subject to consultation) via proposed new clause 3.11.4A. Clause 3.11.5F requires testing provisions to be noted in SRAS contracts.
	(3) each of the black start-up facilities is capable of start-up from a condition where it is disconnected from external power supplies; and	
	(4) the arranged black start up facilities can actually start up the nominated generating units without assistance from the power system.	
	(b) Each Generator providing black start-up facilities must ensure that the auxiliary plant associated with those black start-up facilities is fully tested at intervals not exceeding three months.	

Affected clause and nature of change	Clause with proposed amendments	Reason
4.8.14 insert/amend clauses	 4.8.14 Power system restoration Black system start-up (a) NEMMCO must advise notify a Registered Participant if, in NEMMCO's reasonable opinion, there is a black system condition major supply disruption which is affecting, or which may affect, that Registered Participant. (b) [Deleted] If a Generator or Market Network Service Provider is bound to provide system rostart to NEMMCO under an ancillary services agreement, then the local black system procedures for that Generator or Market Network Service Provider must be consistent with that ancillary services agreement. (c) [Deleted] NEMMCO may by notice in writing to the relevant Generator or Market Network Service Provider require such amendments to the local black system procedures for a Generator or Market Network Service Provider which, in its reasonable opinion, are needed for consistency with: (1) actual power system requirements; or (2) if the Generator or Market Network Service Provider is providing system requires agreement the relevant approximation of the relevant approximation of the relevant approximation of the relevant of the relevan	 New title better reflects the (remaining) purpose of this clause. Changes reflect the adoption of new terms major supply disruption and restart service. Paragraph (b) is more appropriately included within clause 4.8.12A(f). Market Network Service Providers would not of themselves be in position to provide restart services, although they could be contracted to assist generating units in the provision of a service. Existing clause (c) duplicates the provisions of (to be replaced) clause 4.8.12 – these provisions will be effected under new clause 4.8.12A.
	restart under an ancillary services agreement, the relevant ancillary services agreement.	T.U. 127.

Affected clause and nature of change	Clause with proposed amendments	Reason
4.8.14 insert/amend clauses [continued]	 (d) If NEMMCO advises a Generator or-Market Network Service Provider of a-black system condition major supply disruption, and/or if the terms of the relevant local black system procedures require the Generator or-Market Network Service Provider must comply with the requirements of the local black system procedures as quickly as it is reasonably able to. (d1) Implementation of the system restart plan may be varied by NEMMCO as is necessary in accordance with actual power system conditions. (d2) If there is a major supply disruption, a Generator or Network Service Provider must comply with NEMMCO's instructions regarding the restoration of the power system. (e) If there is a -black system condition major supply disruption, then a Market Customer must comply with NEMMCO's instructions with respect to the timing and magnitude of load restoration. 	 The consultation process conducted through the SRAS review revealed concern that parties would only be required to act in accordance with time frames expressed in the system restart service standard notwithstanding an ability to act more quickly. Adding a requirement to act "as quickly as [a party] is reasonably able to do", is intended to remove any doubt. The circumstances of any major supply disruption may dictate the need to be flexible in the implementation of the system restart plan. The requirement that Generators and Network Service Provider comply with NEMMCO's instructions regarding the implementation of the system restart plan removes any doubt as to NEMMCO's authority in such circumstances. Such a requirement parallels that imposed on Market Customers.
8.8.1 insert clause	 8.8.1 Purpose of the Reliability Panel (a) The functions of the Reliability Panel are to: (1a) on the advice of NEMMCO, determine the system restart service standard; (2) review and, on the advice of NEMMCO, determine the power system 	 A system restart service standard will not be part of the power system security and reliability standards as a result of proposed changes to the definition of the latter. This clause makes it clear that determination of a system restart service standard is a responsibility of the Poliability Panel.
	security and reliability standards;	responsibility of the Reliability Panel, consistent with the recommendations of the Final report , Section 2.1.

 8.8.3 Reliability review process (a) As soon as practicable, the <i>Reliability Panel</i> must determine: (1) the power system security and reliability standards; (1) the power system security and reliability standards; (1) the power system restart service standard; (2) the guidelines referred to in clause 8.8.1(a)(3); and (3) the policies and guidelines referred to in clause 8.8.1(a)(4), in accordance with this clause 8.8.3. (aa) The purpose of the system restart service standard is to provide a benchmark against which the adequacy of procurement options for restart services; (2) be capable of being applied to electrical sub-network's peak demand from the transmission network within a specified number of hours to be determined by the <i>Reliability Panel</i> on the advice of <i>NEMMCO</i>. (b) At least once each calendar year and at such other times as <i>NECA</i> may request, the <i>Reliability Panel</i> on the advice of <i>NEMMCO</i>. (c) At least once each calendar year and at such other times as <i>NECA</i> may request, the <i>Reliability Panel</i> on the advice of <i>NEMMCO</i>. (b) At least once each calendary service standard, the guidelines referred to in clause 8.8.1(a)(3) and the policies an guidelines referred to in clause 8.8.1(a)(4) in accordance with this clause 8.8.3. 	Affected clause and nature of change	Clause with proposed amendments	Reason
	insert/amend	 (a) As soon as practicable, the <i>Reliability Panel</i> must determine: (1) the power system security and reliability standards; (1a) the system restart service standard; (2) the guidelines referred to in clause 8.8.1(a)(3); and (3) the policies and guidelines referred to in clause 8.8.1(a)(4), in accordance with this clause 8.8.3. (aa) The purpose of the system restart service standard is to provide a benchmark against which the adequacy of procurement options for restart services can be assessed. The system restart service standard must at least: (1) be such that it can be used to guide the procurement of restart services; (2) be capable of being applied to electrical sub-networks; and (3) require restoration outcomes in terms of restoring a certain percentage of the supply capability of an affected electrical sub-network's peak demand from the transmission network within a specified number of hours to be determined by the Reliability Panel on the advice of NEMMCO. (b) At least once each calendar year and at such other times as NECA may request, the Reliability Panel must conduct a review of the performance of the market in terms of reliability of the power system, the power system security and reliability standards, the system restart service standard, the guidelines referred to in clause 8.8.1(a)(3) and the policies and guidelines referred to in clause 8.8.1(a)(4) in accordance with this clause 8.8.3. 	 having a separate system restart service standard is a requirement and not an option. Clause (aa) gives effect to the recommendations of the Final report, Section 2.1 regarding the purpose and form of the standard. Amendment to sub-clause (b) ensures the system restart service standard is subject to the same level of review as other standards associated with the security of the power

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary – insert definition of "additional secondary service allowance"	additional secondary service allowance An amount determined pursuant to clause 3.11.5G(c).	 A new term used in clauses 3.11.4A(c) and 3.11.5G.
Chapter 10, Glossary – replace definition of " black start capability "	 black start capability <u>A capability whereby, following disconnection of a generating unit from the power system, the generating unit is subsequently able to deliver electricity to either:</u> a) <u>its connection point</u>, or b) <u>a suitable point in the network from which supply can be made available to other generating units</u>, without having taken supply from any part of the power system since disconnection. 	 New definition to replace existing, inadequate definition. [Ref: Final report, introduction to Section 2]
Chapter 10, Glossary – delete definition of " black start- up facilities "	[Deleted] <i>black start-up facilities</i> The <i>facilities</i> described as such in clause 4.8.11.	 The definition of "black start-up facilities" can be deleted subject to deleting / amending the Rules as follows: amending clause 4.2.6(e) as proposed; deleting clause 4.8.13 as proposed; amending Chapter 10, Glossary definition of "facility" as proposed.
Chapter 10, Glossary – amend definition of " black system"	<i>black system</i> The absence of <i>voltage</i> on all or a significant part of the <i>transmission system</i> or within a <i>region</i> following during a major supply disruption, affecting one or more power stations and a significant number of customers.	 This definition is amended to take account of the newly defined term "major supply disruption"

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary – insert definition of "customer specific energy support"	<u>customer specific energy support</u> <u>A contractual arrangement whereby facilities not subject to an ancillary services</u> <u>agreement for provision of SRAS are used to assist supply to a customer during a</u> <u>major supply disruption affecting that customer.</u>	A new term used in clause 4.8.12A.
Chapter 10, Glossary – insert definition of "electrical sub- network"	electrical sub-network A part of the national grid determined by NEMMCO pursuant to clause 3.11.4B.	A new term.
Chapter 10, Glossary – amend definition of " facilities "	 <i>facilities</i> A generic term associated with the apparatus, equipment, buildings and necessary associated supporting resources provided at, typically: (a) a <i>power station</i> or <i>generating unit</i>, including <i>black start-up facilities</i>; (b) a <i>substation</i> or <i>power station switchyard</i>; (c) a control centre (<i>control centre</i>, <i>NEMMCO</i> or <i>distribution</i> or <i>transmission</i> control centre); (d) facilities providing an <i>exit</i> service. 	• The term "black start-up facilities" is to be deleted. The generic term "facilities" can still be applied in the context of facilities used to provide black start capability.
Chapter 10, Glossary – amend definition of " <i>local black</i> <i>system</i> <i>procedures</i> "	<i>local black system procedures</i> The procedures, described under clause 4.8.12 <u>A</u> applicable to a <i>local area</i> as approved by <i>NEMMCO</i> from time to time.	• Clause 4.8.12 would be deleted. Previous reference to clause 4.8.12 needs to be changed to reference new clause 4.8.12A.
Chapter 10, Glossary – insert definition of " major supply disruption"	<u>major supply disruption</u> The unplanned absence of voltage on a part of the transmission system, affecting one or more power stations.	• A new term that, in some instances, replaces references to "black system condition" where appropriate.

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary –	<i>network control ancillary services or NCAS</i> A service identified in clause 3.11.3(a) which provides <i>NEMMCO</i> with a capability to	
amend definition of " network control	 control the real or <i>reactive power</i> flow into or out of a <i>transmission network</i> in order to: (a) maintain the <i>transmission network</i> within its current, <i>voltage</i>, or stability limits 	
ancillary services"	following a <i>credible contingency event</i>, or(b) enhance the value of <i>spot market</i> trading in conjunction with the <i>central dispatch</i> process.	
Chapter 10, Glossary – amend definition of " non-market ancillary services"	non-market ancillary services <u>Network control ancillary services and system restart ancillary services.</u> A service identified in clause 3.11.4(a).	 Non-market ancillary services comprise NCAS and SRAS. NCAS and SRAS are now dealt with via separate clauses.
Chapter 10, Glossary – insert definition of "NMAS invitation to tender"	<u>MMAS invitation to tender</u> In respect of non-market ancillary services, a document issued by NEMMCO calling for <u>NMAS tenders pursuant to clauses 3.11.5(a) and 3.11.5B(a).</u>	A new term.
Chapter 10, Glossary – insert definition of " <u>NMAS</u> notice of clarification"	<u>MMAS notice of clarification</u> <u>A notice issued pursuant to clause 3.11.5C(b).</u>	A new term.
Chapter 10, Glossary – insert definition of " <u>MMAS</u> notice of intention to contract"	<u>MMAS notice of intention to contract</u> <u>A notice issued pursuant to clause 3.11.5D(c)(1) stating that NEMMCO intends to</u> <u>contract with the recipient of the notice subject to any matters stated in the notice.</u>	A new term.

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary – insert definition of "NMAS tender"	<u>MMAS tender</u> An offer submitted by a person in response to an NMAS invitation to tender.	A new term.
Chapter 10, Glossary – amend definition of "power system security and reliability standards"	power system security and reliability standards The standards <u>other than the system restart service standard governing power system</u> security and reliability of the power system to be approved by the Reliability Panel on the advice of NEMMCO, but which may include but are not limited to standards for the frequency of the power system in operation, contingency capability <u>capacity</u> reserves (including guidelines for assessing requirements), short term capacity reserves <u>and</u> medium term capacity reserves.	 System restart service standard is to be a new standard dealt with separately to power system security and reliability standards. Existing definition refers, in error, to contingency capability reserves.
Chapter 10, Glossary – insert definition of "primary restart service"	primary restart service A restart service that is highly likely to perform in the manner intended if called upon to do so, and that meets the technical and availability requirements of a primary restart service specified by NEMMCO pursuant to clause 3.11.4A(b).	 A new term – distinction is to be formally drawn between primary restart services and secondary restart services. [Ref: Final report, Section 2.2]
Chapter 10, Glossary – insert definition of "primary service premium"	primary service premium An amount determined pursuant to clause 3.11.5G(b).	A new term. [Ref: Final report, Section 2.7.1]
Chapter 10, Glossary – insert definition of " restart service "	restart service A service provided by facilities with black start capability whereby: (a) energy is supplied; and (b) a connection is established; sufficient to restart large generating units following a major supply disruption.	 New definition to replace existing, inadequate definition of "system restart". [Ref: Final report, introduction to Section 2]

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary – insert definition of "secondary restart service"	<u>secondary restart service</u> <u>A restart service that is more likely than not to perform in the manner intended, if called upon to do so, and meets the technical and availability requirements of a secondary restart service specified by NEMMCO pursuant to clause 3.11.4A(b).</u>	 A new term – distinction is to be formally drawn between primary restart services and secondary restart services. [Ref: Final report, Section 2.2]
Chapter 10, Glossary – insert definition of "SRAS expression of interest"	SRAS expression of interest The response to a call by NEMMCO, pursuant to clause 3.11.5A, for expressions of interest to provide restart services.	A new term.
Chapter 10, Glossary – delete definition of "system restart"	[Deleted] system restart In respect of a generating unit, means the service of generating in order to assist other generating units to start during a black system condition.	 Existing, inadequate definition of "system restart" to be replaced by new term "restart service". [Ref: Final report, introduction to Section 2]
Chapter 10, Glossary – insert definition of "system restart ancillary service or SRAS"	<u>system restart ancillary service or SRAS</u> <u>A restart service, available for deployment on instruction from NEMMCO under to an</u> <u>agreement entered into pursuant to clause 3.11.5D, that can assist in the response to</u> <u>a major supply disruption.</u>	• Existing Rules references to "system restart ancillary service" are compound references to "system restart" and "ancillary service". the new term system restart ancillary service is to have specific meaning.
Chapter 10, Glossary – insert definition of "system restart plan"	<u>system restart plan</u> The plan described in clause 4.8.12A(a).	A new term.

Affected clause and nature of change	Clause with proposed amendments	Reason
Chapter 10, Glossary – insert definition of "system restart service standard"	system restart service standard The standard as determined by the Reliability Panel pursuant to clause 8.8.3(a)(1a), for the acquisition of system restart ancillary services.	A new term.

Attachment 3

A3 Rules changes proposed by NEMMCO – pricing during market suspension

Affected clause and nature of change	Clause with proposed amendments	Reason
Amend clause 3.14.5(c)	(c) <u>Subject to clauses 3.14.5(d), (f) and (g), if the <i>market</i> is suspended in a <i>region</i> then In a region or regions where, in NEMMCO's reasonable opinion, it remains possible to do so, <i>dispatch</i> and the determination of <i>spot prices</i> and <i>ancillary service prices</i>, in the <i>region</i> where the <i>market</i> is suspended, are to continue in accordance with clauses 3.8 and 3.9.</u>	This sub-clause has been redrafted to be consistent with changes in subsequent sub- clauses but retains the intent of the original sub- clause 3.14.5(c) in that pricing should if possible continue in the normal manner in accordance with clauses 3.8 and 3.9.

Affected clause and nature of change	Clause with proposed amendments	Reason
Replace old clause 3.14.5(d) and insert a new clause 3.14.5(d1)	 (d) If, on suspension of the <i>market</i> or, if the <i>market</i> is already suspended, at sometime thereafter; (1) NEMMCO forms the reasonable opinion it is not possible to continue, in the region where the <i>market</i> is suspended, <i>dispatch</i> and the determination of <i>spot prices</i> and <i>ancillary service prices</i> in accordance with clauses 3.8 and 3.9; and (2) the region in question is connected by an <i>unconstrained interconnector</i> to another <i>region</i>; and (3) in that other <i>region dispatch</i> and <i>spot price</i> and <i>ancillary service</i> price determination is continuing in accordance with clauses 3.8 and 3.9; and (4) local market ancillary service requirements do not apply in the <i>region</i> where the market is suspended; <i>NEMMCO</i> may determine the <i>spot price</i> in the suspended <i>region</i>, by application of the method set out in clause 3.14.5(d1) but <i>ancillary service prices</i> will continue to be determined in the suspended <i>region</i> in accordance with clauses 3.8 and 3.9. (d1) The <i>spot price</i> is determined by application of an appropriate <i>inter-regional loss factor</i> to the <i>spot price</i> in the <i>region</i> connected to that suspended <i>region</i>, such <i>inter-regional loss factor</i> being determined by <i>NEMMCO</i> in accordance with the principles in schedule 3.2 and the actual flows on the <i>unconstrained regulated interconnectors</i>. 	Sub-clause 3.14.5(d) retains the intent of the old sub-clause 3.14.5(d) that in circumstances where pricing in an adjacent can still be determined in the normal manner and an interconnector between that region and the region in question is unconstrained then pricing in the region in question will be determined by reference to the prices in that adjacent region. Sub-clause 3.14.5(d1) indicates that for energy pricing will be determined by application of the inter-regional loss factor to the energy price in the adjacent region. This retains the intent of the old sub-clause 3.14.5(d). In addition the new sub-clause clarifies how ancillary service prices would be determined in these circumstances.

Affected clause and nature of change	Clause with proposed amendments	Reason
Insert a new clause 3.14.5(e)	 (e) If the spot price in the suspended region is being determined by application of clause 3.15.4(d1) it must continue to be determined by application of that clause until the earlier of the following; (1) the time that the market is no longer suspended in the region; and (2) the time that the spot price in the suspended region is determined by application of the method of determination detailed in either clause 3.14.5(f1), or clause 3.14.5(g). 	 This sub-clause is intended to ensure that once pricing in the region in question in determined in accordance with sub-clause (d1) then it will remain determined in this manner until either market suspension ceases; or the situation further deteriorates such that the use of this method is no longer possible. This change is proposed as NEMMCO considers that it operationally impractical due the significantly abnormal events that would be associated with Market suspension for NEMMCO to be able to make a "what-if" prediction as to whether an pricing under normal conditions would be feasible.

Affected clause and nature of change	Clause with proposed amendments	Reason
Insert new clauses 3.14.5(f) and (f1)	 (f) If, on suspension of the market or, if the market is already suspended, sometime thereafter; (1) either; (A) dispatch and the determination of spot prices and ancillary service prices is being effected in accordance with clauses 3.8 and 3.9; or (B) the spot price and ancillary service prices in the suspended region are being determined by application of clause 3.14.5(d1); and NEMMCO forms the reasonable opinion that it is no longer practical to continue, in the region where the market is suspended, dispatch and the determination of spot prices and ancillary service prices in accordance with clauses 3.8 and 3.9 if they were being determined by application of these clauses, or, in accordance with clause 3.14.5(d1) if they were being determined by application of these clauses, or that clause (as the case may be); and (2) In NEMMCO's reasonable opinion a current pre-dispatch schedule exists; NEMMCO may determine the spot price and ancillary service prices by application of clause 3.14.5(f1). (f1) The spot price and ancillary service prices in the suspended region are set at NEMMCO's forecast regional reference price and ancillary service prices determined in accordance with the most recently published and current pre-dispatch schedule. 	Sub- clauses (f) and (f1) require that where normal pricing and pricing under sub-clause (d1) are not possible then pricing should be determined on the basis of a current pre- dispatch schedule if possible. This approach is consistent with the intent of the original sub- clauses 3.14.5(g)(1) and (g4)(1).

Affected clause and nature of change	Clause with proposed amendments	Reason
Insert a new clause 3.14.5(f2).	 (f2) If the spot price and ancillary service price in the suspended region are being determined by application of clause 3.15.4(f1) both must continue to be determined by application of that clause until the earlier of the following; (1) the time that the market is no longer suspended in the region; and (2) the time that the spot price or the ancillary service price (as the case may be) in the suspended region is determined by application of clause 3.14.5(g). 	 This sub-clause is intended to ensure that once pricing in the region in question in determined in accordance with sub-clause (f1) then it will remain determined in this manner until either market suspension ceases; or the situation further deteriorates such that the use of this method is no longer possible. This change is proposed as NEMMCO considers that it operationally impractical during the significantly abnormal events that would be associated with Market suspension for NEMMCO to be able to make a "what-if" prediction as to whether a pricing under normal conditions or sub-clause(d1) would be feasible.

Affected clause and nature of change	Clause with proposed amendments	Reason
Delete the existing 3.14.5(g) and insert a new clause 3.14.5(g)	 (g) If on suspension of the market or, if the market is already suspended, at sometime thereafter; (1) <u>either;</u> (A) <u>dispatch and the determination of spot prices and ancillary service prices is being effected in accordance with clauses 3.8 and 3.9; or</u> (B) <u>the spot price and ancillary service prices in the suspended region are being determined by application of either clause 3.14.5(d1) or clause 3.14.5(f2); and</u> (2) <u>NEMMCO forms the reasonable opinion that it is no longer practical to set the spot price and ancillary service price in the suspended region in accordance with either clauses 3.8 and 3.9, clause 3.14.5(d1) or clause 3.14.5(f1) (as the case may be);</u> <u>NEMMCO may set the spot price and ancillary service price in the suspended region to be the prices set out in the relevant market suspension pricing schedule being a schedule developed under the Rules consultation procedures that reflects NEMMCO's reasonable estimate of typical market prices during the period to which the schedule relates.</u> 	pricing, pricing under sub-clause (d1) and pricing on the basis of a current pre-dispatch schedule are not possible then pricing should be in accord with a predetermined price schedule. This approach is consistent with the intent of the original sub-clauses $3.14.5(g)(2)$ and $g4(2)$. This sub-clause sets out that such a schedule should be determined through consultation with the aim of it reflecting typical market prices. This consistent with the intent of the original sub- clauses (g)(2) and g4(2).
Insert a new clause (gA)	(gA) If the spot price and ancillary service price in the suspended region are being determined by application of clause 3.15.4(g), both must continue to be determined by application of that clause until the market is no longer suspended in the region.	This sub-clause is intended to ensure that once pricing in the region in question in determined in accordance with sub-clause (g) then it will remain determined in this manner until market suspension ceases. This change is proposed as NEMMCO considers that it operationally impractical during the significantly abnormal events that would be associated with Market suspension for NEMMCO to be able to make a "what-if" prediction as to whether an pricing under normal conditions , sub-clause (d1) or sub-clause (f1) would be feasible.

Affected clause and nature of change	Clause with proposed amendments	Reason
Delete the existing clause 3.14.5(g1) and insert a new clause 3.14.5(g1)	(g1) NEMMCO must publish the schedule developed under clause 3.14.5(g) at least 14 days prior to the first day to which the schedule relates.	This sub-clause requires NEMMCO to provide appropriate notice any change to the pricing schedule, which is the same requirement, set out in the original sub-clause 3.14.5 (g1).
Amend clause 3.14.5(g2)	(g2) If a regional reference <u>spot price</u> is set pursuant to clause 3.14.5(g)(<u>f1</u>) or clause <u>3.14.5(g) at a regional reference node ("suspension node") then spot prices at all</u> other regional reference nodes connected by an <u>regulated interconnector</u> er <u>regulated interconnectors</u> that have <u>has an actual energy</u> flow towards that regional reference node the <u>suspension node</u> must not exceed the product of that regional reference price the <u>spot price</u> in the <u>suspended region</u> multiplied by the average loss factor for that trading interval between that regional reference node and the <u>regional reference suspension</u> node for that trading interval. at which regional reference prices have been set in accordance with clause <u>3.14.5(g).</u> <u>NEMMCO must use reasonable endeavours to ensure that the price capping process in this clause 3.14.5(g2) is undertaken no later than one <u>business day</u> following the day on which the <u>market</u> in the <u>region</u> ceased to be suspended.</u>	This sub-clause retains the intent of the original sub-clause 3.14.5(g2) to apply caps to prices in adjacent regions to minimise the risk of negative residues arising if the pricing in a region is determined in accordance with sub-clauses (f1) and (g). This new clause also reflects that the reality that in some causes of suspension (eg SCADA or IT failure) NEMMCO would need to undertake such a capping process through post event manual calculations. Reference to the plural form of some phrases has been deleted on the basis that clause 1.7.1(b) says: "words importing the singular include the plural and vice versa". Further, references to "regulated interconnectors" in the this clause have been amended by deleting the reference to "regulated", as this more clearly reflects the belief that both regulated and non-regulated interconnectors should be treated in the same manner in these circumstances.
Delete clause 3.14.5(g4)	Delete clause 3.14.5(g4)	Determination of ancillary service pricing in this proposed change has been dealt with along with energy pricing and so separate clauses to address determination of ancillary service pricing is no longer required.