Dr John Tamblyn
Chairman
Australian Energy Market Commission
PO Box A2449
Sydney South NSW 1235

24 April 2009

Dear Dr Tamblyn,

During the Public Forum held on 16th April regarding the Review into the Role of Hedging Contracts in the Existing NEM Prudential Framework, the AEMC asked Forum participants for comments relevant to questions including those listed below. d-cyphaTrade has previously provided substantial public comment and detailed analysis to the AEMC with regards to Futures Offset Arrangements (FOAs) via two Rule Change Request workflows (dating back to 2006) and provides additional comments below in response to the AEMC's most recent request.

The AEMC's Review into the Role of Hedging Contracts is timely. Current developments threatening to undermine the financial stability of NEM hedging arrangements and the high profile failure of global Over the Counter (OTC) derivative markets make the NEM's exclusive reliance on an unregulated OTC-based market for spot market prudential offsets increasingly precarious.

Any undue delay in the introduction of an alternative offset mechanism such as FOAs, whose prudential strength is underpinned by best practice daily margined exchange-traded products ignores the obvious lessons learned from the global credit crisis and perpetuates unnecessary industry concentration risks within the existing NEM prudential arrangements.

As a response to the systemic defaults risks that contributed to the global meltdown in OTC derivative markets, The US Secretary of the Treasury Timothy F. Geithner recently affirmed the necessity of moving unregulated OTC derivative arrangements towards centrally cleared exchange traded instruments: **".. we should establish a comprehensive framework of oversight, protections and disclosure for the OTC derivatives market, moving the standardized parts of those markets to central clearinghouse, and encouraging further use of exchange-traded instruments."[1]**
dcypha SFE Electricity Futures are daily margined by a central counterparty clearer and traded via a licensed and transparent exchange, keeping credit default risks between participants to a minimum. These futures products are already actively traded by NEM Participants and would provide immediate alternative credit support to NEM retailers and the NEM prudential framework under the proposed "Direct Retailer FOA". **Under the Basel II framework, daily margined futures products cleared by a central counterparty clearer attract a zero credit risk rating.[2]**

[1] Statement by Timothy F. Geithner U.S. Secretary of the Treasury before the Committee on Financial Services U.S. House of Representatives, March 26, 2009. http://www.ustreas.gov/press/releases/tg71.htm

[2] Basel II: International Convergence of Capital Measurement and Capital Standards: a Revised Framework, Annex 4, 2006. www.bis.org

Current developments affecting NEM OTC hedging arrangements which create negative implications for the financial integrity of the NEM prudential framework are now obvious:

1. The Energy Supply Association of Australia (ESAA), National Generators Forum, Energy Retailers Association of Australia and the Australian Pipeline Industry Association joint submission to the CPRS Green Paper cited the heightened risk of financial distress of NEM generators under the proposed CPRS and the potential for OTC electricity hedge "trigger events" to cause cascading defaults and systemic failure throughout the market;

2. The proposed privatisation of NSW energy businesses would eliminate a significant proportion of tax-payer-funded credit support from the NEM, from both the OTC electricity market and from spot market credit support provided to NEMMCO by the NSW government on behalf of NSW government-owned retailers. Private sector banks will be required to provide large bank guarantee credit support lines to NSW retailers immediately upon privatisation. Even prior to the contraction of global financing liquidity, concerns had been expressed that private sector banks may not have been as responsive as the State Treasury Crop in providing additional credit support to NEMMCO (on behalf of NEM retailers). It was noted that it was the rapid response from State Treasury Corp providing additional guarantees for government owned retailers that contributed to managing a potential prudential issue (caused by high pool prices)[3];

3. A recent ESAA survey[4] suggested that up to $20 billion is required over the next 5 years just to refinance existing generation assets. In the current economic environment this is an ambitious target;

4. According to the ESAA survey, another $20 billion in credit facilities will be needed by NEM generators to finance costs associated with carbon permit liabilities if the proposed ETS is introduced.

Reduced credit availability, increased financing costs and increased cash flow stress on NEM generators increase the embedded counterparty default risks in the OTC electricity hedge market. In this environment, the exclusive reliance on generator reliability and/or generator credit worthiness (via reallocation swap derivatives) to underpin spot market credit support offsets unnecessarily exposes the NEM prudential framework to extreme concentration risk while providing no protection by way of daily mark to market margining.

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[3] NEMMCO Participant Advisory Committee minutes 32nd meeting 10 June 2004

[4] Electricity Supply Association of Australia, "Global Financial Crisis Survey", 14 April 09. www.esaa.com.au

d-cyphaTrade's comments or suggestions in response to the AEMC's questions are listed in bullet points below:

Reallocations

How widely are they used?

- According to NEMMCO[5], reallocations are equivalent to 9% of the NEM system demand. To better gauge the efficiency benefits (relevant to supporting competition) of reallocation, it would be useful for NEMMCO to also provide additional analysis including the proportion of reallocations transacted by vertically integrated retailers who can internalise the credit default risk created by reallocation between the generator and retailer. It would also be interesting to ask smaller independent retailers if they have access to reallocation swaps in each region and how competitively priced any such reallocation swaps might be (inclusive of the cost of additional off-market credit support required by the reallocated generator)[6].
- Although being a monopoly supplier of offset arrangements, why is the NEMMCO reallocation market only achieving 9% coverage? Possible reasons include:
    - No price transparency in reallocation market to attract new entrants;
    - High counterparty credit default risk (and costs) because the risk of retailer's payment default is merely transferred from NEMMCO to the reallocated generator rather than eliminating credit risk via daily margining and central clearing;
    - Reallocation fees, inflated OTC derivative prices or credit costs charged/imposed by reallocated generators must compensate a commercially astute generator for assuming the credit default risk transferred from NEMMCO;
    - Reallocation suppliers (regional generators) are not subject to competitive price pressure from the much more liquid and internationally traded Australian electricity futures market.
  - Observations about SA futures liquidity are irrelevant unless futures liquidity is compared equally to liquidity in the alternative SA reallocation swap market. If such a SA reallocation market exists, how accessible, transparent and competitively priced is this reallocation liquidity to non-incumbent and independent NEM retailers?
  - Is there any retailer other than vertically integrated retailers involved in reallocations for TAS?
  - **The absence of TAS FOAs does not negate (nor is it a logical reason to deny) the substantial FOA-related efficiency benefits to be achieved in other NEM regions.**

Improvements that could be made to reallocation arrangements

- NEMMCO could outsource the operation of the reallocation market to an experienced Australian Market License (AML) and Clearing and Settlement Facility license (CSFL) holder such as the SFE and SFECC;
- A potential impediment to such an outsourced market operator arrangement is that an AML and CSFL license holder is unlikely to agree to clear derivatives that are reliant on non-firm generation delivery, in the absence of best practice market risk management processes such as daily cash margining of forward contract value.

[5] NEMMCO comment to the AEMC Public Forum, 16 April 2009.

[6] d-cyphaTrade understands that the Financial Markets Working Group has conducted a survey of NEM retailers which may provide some relevant analysis of this issue.

ASIC licensing

- Could the *existing* (i.e. not proposed reallocations) NEMMCO reallocation arrangements be deemed to be a financial market under Corporations Law?
- What are the potential legal and contractual enforcement implications for NEMMCO and NEM participants who *currently* trade NEMMCO reallocations, if the existing reallocation arrangements are deemed to have been unlicensed, particularly if an alternative compliant offset mechanism (such as FOA) is not made available?

FOA

The Direct Retailer FOA model (as described in detail in d-cyphaTrade's submission to the Futures Offset Rule Change Request), is the most efficient of the two FOA Models and most likely to be embraced by SFE Clearers and Retailers. The Direct Retailer FOA model has the following advantages over the original FOA model:

1. **Not capable of being terminated without NEMMCO's consent;**
2. Is preferred by SFE Clearing Participants because it is administratively simple to implement and does not require SFE Clearing Participants to commit additional legal, regulatory and risk management resources (these cost savings would be seamlessly passed onto retailers);
3. Is capable of being implemented by SFE Clearing Participants for their retailer clients immediately (pending NER and NEMMCO procedure implementation);
4. **Would be entirely supported by the National Electricity Rules and NEMMCO procedures** (including dispute resolution) without additional legal contracting between NEMMCO and the SFE Clearing Participant.

How do FOA models impact on the surety of payment?

- Generator outages or other generator breaches of prudential requirements cannot indirectly force the termination of a FOA by NEMMCO as it can under reallocation.
- Direct Retailer FOA Model: payment and access to SDA funds governed by the Rules; daily payment obligation of retailer created by upward futures price moves and governed by Rules. Confirmation email by Clearing Participant to NEMMCO will ensure that retailer holds required futures position, non-payment of FOA daily obligation by retailer results in same process as currently under the existing Rules (i.e. as per current rules governing breach of prudential requirements or Trading Limit by a retailer or generator).
- Original FOA Model: payments created by upward futures price moves, governed by contract between NEMMCO and Clearing participant (e.g. similar to existing bank guarantee contracts), payment and access to SDA funds governed by the Rules; non-payment by Clearing Participant would result in contractual claim by NEMMCO against Clearing Participant (as per existing dispute resolution process between NEMMCO and an existing bank guarantee provider). Termination of arrangement by Clearing Participant would require retailer to meet any prudential shortfall as per existing Rules (i.e. as per current Rules governing breach of prudential requirements or Trading Limit by a retailer or generator).
- Both FOA models are supported by a daily margined futures position held by the retailer which automatically creates daily cash flows which precisely match the FOA cash payment commitment owed to NEMMCO. The Direct Retailer FOA reduces termination risk in comparison to the Original FOA model, as it can only be terminated by NEMMCO (not by the SFE Clearing Participant) and the retailer is required to lodge alternative credit support with NEMMCO prior to NEMMCO agreeing to any termination;

Risk mitigation

The Direct Retailer FOA is governed by the Rules, hence any short payment would be governed by the same process under the Rules as is currently used by NEMMCO.

- FOA non-payment risk to NEMMCO is likely to be smaller than current reallocation due to:
    - The size of potential payment obligations under FOA would be less because FOA payment commitments arise only above the Futures Lodgement Price (i.e. the original fair market value of the futures contract), whereas reallocation swap commitments arise above $0.00/MWh representing a much larger payment obligation (and hence size of potential default). In addition, under FOA, NEMMCO retains bank guarantees up to the level of the FOA futures lodgement price.
    - Off-market OTC default risk exposure borne by a reallocated generator is eliminated under FOA, because unlike a reallocation, no generator is required to *sell* a derivative under a FOA. **Unlike a reallocation, the retailer's default risk is not merely transferred to the reallocated generator (from NEMMCO), it is <u>actually reduced</u> due to the process of daily margining.**
    - daily margining of the underlying futures contract avoids off-market OTC reallocation default exposures (between generators and retailers) building up over time as unrealised forward contract profits and losses escalate.

Licensing

- Legal advice should be sought to clarify that NEMMCO can register FOA arrangements on request of retailers:
    1. without NEMMCO holding an AFSL to "deal" in FOAs (given that NEMMCO would be dealing on its own behalf and such dealing will not constitute a significant part of NEMMCO's business);
    2. only with an AFSL or with a Ministerial Exemption from the requirement to hold an AFSL, in which case NEMMCO should seek the relevant license or Ministerial Exemption; and/or
    3. only if NEMMCO holds an AML to operate a deemed FOA market, in which case NEMMCO should seek a Ministerial Exemption from holding an AML for FOAs on similar grounds that NEMMCO obtained a Ministerial Exemption to operate the NEMMCO SRA auction without an AML.
- **d-cyphaTrade suggests that the AEMC obtains legal advice on these matters as soon as possible to clarify if NEMMCO is required to be licensed (or exempted) under Corporations Law in order to facilitate the registration of FOAs. If legal advice suggests that NEMMCO requires a license or exemption to register FOAs, that application process should commence as soon as possible given the potentially long license approval processing time.** Simultaneous legal advice may also be sought to determine if NEMMCO needs an AML, CSFL or AFSL (or relevant exemptions) to operate the *existing* reallocation market.

Benefits

- Lower operating costs and reduced barriers to both entry and expansion for existing and prospective NEM retailers. These cost savings have been proven previously showing worked cost saving calculations (inclusive of SFE initial margin costs). Furthermore, many retailers already hold futures positions and any associated SFE margining and transaction costs of holding these positions are already "sunk". **Hence, many FOAs could be immediately registered (and new prudential offset efficiencies achieved) for zero cost**.

- Efficiency gains because FOAs will compete with reallocations and this should result in lower premiums charged by generators for reallocation swaps.
- Reduced systemic risk (with associated efficiency benefits) to the NEM prudential system because **"Direct Retailer FOAs" avoid non-firmness risk of generation-backed OTC reallocation swaps by avoiding the risk of cascading participant defaults triggered by a large generator outage and/or OTC hedge default**.
- FOAs would also increase liquidity in the underlying futures markets in SA, VIC, NSW and QLD and hence deliver increased competition-based pricing benefits to retailers and electricity consumers. Improved futures market liquidity and transparency will result in hedge cost savings and availability and investment signalling benefits for new entrants and existing NEM Participants.
- Other significant efficiency gains from the introduction of FOAs have been described extensively in previous public submissions.

Yours Sincerely,

Thomas Schmitz
Executive Manager
Product Development & Sales