NATIONAL GENERATORS FORUM

Energy Retailers Association of Australia Limited

19 November 2010

Mr Rory Campbell,
Senior Director
Australian Energy Market Commission
PO Box A2449
Sydney South NSW 1235

Dear Mr Campbell,

Review of the RERT - Request for further information

We refer to your recent requests for further information to assist the Reliability Panel as part of the Review of the Reliability and Emergency Reserve Trader (RERT). The Reliability Panel in particular sought further information in relation to the issue of market distortions.

This submission responds to the AEMC's requests on behalf of the National Generators Forum (NGF), Energy Retailers Association of Australia (ERAA) and Loy Yang Marketing Management Company (LYMMCo).

General concerns with the RERT

As you may recall our earlier submissions indicated, amongst other issues, that:

- the RERT (and previously the Reserve Trader) has not increased the actual supply reliability in 10 years, making a case that its retention is not necessary;
- the size of any possible closure of large scale base-load plant in the near term due to climate change policy would dwarf any capacity which AEMO will be able to procure under the long, medium and short-term RERT mechanisms;
- AEMO has very extensive powers to direct participants when system security is at risk. These powers can be used to address shortfalls as a last resort and have the potential to have a much greater impact than a RERT at the time of the problem;
- by keeping the RERT, the market marginalises the activities of non-active participants into a reserve market;
- it creates an inconsistency in the implied value of achieving a secure operating state; and
- the RERT creates additional costs, is not transparent and distorts the market.

Not possible to measure market distortions empirically

As it pertains to market distortions the NGF notes that it is difficult to empirically outline market distortions for a number of reasons.

First, market participants whose actions are affected or impacted by the RERT are not readily identifiable and do not identify to the wider market.

Second, those participants who are contracted by AEMO or have been contracted in the past are not identified by AEMO.

Third, the price at which the market would clear in the absence of price cap arrangements is difficult to establish and the existence of price caps is a driver of support for the RERT in some jurisdictions.

Fourth, non-market participants who may be induced into the market in the absence of a RERT are unlikely to be identifiable.

Economic efficiency implications of the RERT

As a consequence of these hurdles to measuring the impact of the RERT, the NGF has engaged ACIL Tasman for the purpose of outlining the shortcomings of the RERT from an economic efficiency perspective. The ACIL Tasman paper is attached.

The ACIL Tasman analysis outlines the economic inefficiencies associated with the RERT. The NGF, ERAA and LYMMCo support this analysis and concur with ACIL Tasman's position as it pertains to dead weight losses and distortions.

As it concerns ACIL Tasman's position on price capping mechanisms we agree that the existence of the RERT is to a large extent a consequence of the MPC/CPT. However, we note that we retain our fundamental concerns that in the absence of these price caps a series of remaining risks identified by the Reliability Panel will not be appropriately managed.

Nevertheless, we agree with ACIL Tasman's position that the objectives of the current MPC/CPT are mixed and we suggest there are a number of alternative measures which may be better suited to managing or minimising unmitigated risks in the market. Until such a time as those concerns are addressed our position on price caps is unlikely to change.

We also retain the view, supported by the ACIL Tasman analysis, that the RERT does not improve market outcomes overall.

Evidence that the RERT is required moving forward

We maintain our position that the RERT is not needed, has a number of undesirable features, is not transparent and distorts the market. Further, the RERT is inefficient and distortionary because the rates are set in advance when any RERT costs are unknown, and the RERT costs cannot be readily passed on by retailers to customers.

We also suggest that given the RERT is scheduled to expire on 30 June 2012 that the AEMC needs to make a case to retain the RERT beyond that date. As it stands, in the absence of a compelling case to retain the RERT, the status quo position of allowing the RERT to lapse on that date remains appropriate.

If you wish to discuss this submission please contact Mr Jamie Lowe of LYMMCo on (03) 9612 2236.

We appreciate your request for further information.

Yours faithfully,

Cameron O'Reilly
Executive Director
Energy Retailers Association of Australia

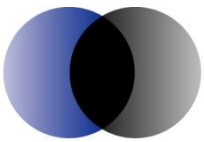
Malcolm Roberts
Executive Director
National Generators Forum

NEM Reliability and Emergency Reserve Trader

Assessment of distortions arising from RERT arrangement

Prepared for the National Generators Forum

19 November 2010



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1 Introduction

The National Generators Forum has contracted ACIL Tasman to assess potential National Electricity Market (NEM) distortions from the Reliability and Emergency Reserve Trader (RERT) provisions of the National Electricity Rules.

The RERT provisions were introduced in 2008 replacing the Reserve Trader provisions, which had been in place since the NEM commencement. ACIL Tasman understands that a single entity has joined the RERT panel operated by AEMO and that AEMO has not exercised the RERT mechanism. As the RERT allows for payment only on usage, no costs have yet been incurred.

ACIL Tasman also understands that the older Reserve Trader provisions were exercised only twice by AEMO (as NEMMCO) in the summers of 2005 and 2006 for the South Australian and Victorian regions. This allowed NEMMCO to procure additional reserves (generation and demand side response) by paying availability charges to the additional reserve. The total cost of availability charges have been estimated by AEMO as $1.035 million in 2005 and $4.4 million in 2006. Although the reserves were contracted, NEMMCO did not use the additional reserves in either summer as forecast conditions that formed the basis of entering into reserve contracts did not eventuate.

As the NEM arrangements have always included some form of facility for AEMO to step in and purchase additional reserves, it is difficult to quantitatively assess any market distortions associated with the arrangements. In addition, the purchased reserves have never been dispatched even when contracted under the older Reserve Trader provisions.

Hence, this report approaches the assessment of potential NEM distortions from the RERT provisions by applying qualitative economic analysis to the existing market arrangements.

The report is structured as follows:

- Section 2 sets out the existing reliability framework from an economic theory perspective in order to identify potential issues and inefficiencies in those arrangements
- Section 3 extends the application of economic theory to the RERT arrangements in order to assess how the existence and application of RERT might alter or change the inefficiencies identified in Section 2
- Section 4 considers how the identified distortions in Section 3 might extend to the secondary contract market

2 The existing reliability framework

In considering the potential distortions introduced to the NEM associated with both the existence and use of the RERT it is important to consider how the existing reliability arrangements operate from an economic perspective and identify any resulting inefficiencies.

The NEM is a so called energy only market in which fixed operating cost and returns to capital (both debt and equity) are solely derived from revenues received for energy sold in each half hour of the year after deducting variable operating costs[1]. Hence, unlike some markets around the world, which operate as both capacity and energy markets, returns to cover fixed costs and investment in capacity within energy only markets are derived from payments for energy sold at a price above a generators variable cost base, which is usually called the short run marginal cost (SRMC).

In the following discussion, it is important to recognise that prices perform three major functions in a market system. First, they call forth supply. Second, prices ration supply when it is scarce. Third, they allocate supply among various competing uses usually in order of the uses that value the supply most highly.

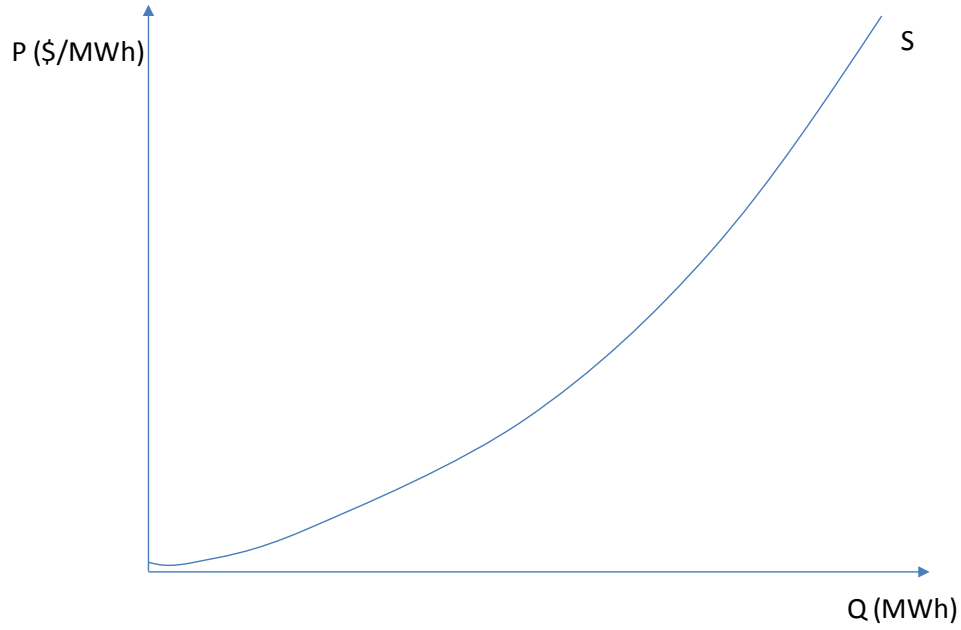
The perfectly competitive market

In the idealised market, there are many homogenous suppliers, each supplier's contribution is relatively small and unable to affect price, and the industry supply curve rises in a continuous fashion reflecting rising costs of incremental output (refer Figure 1). In this idealised world, each supplier earns "normal profits", including an appropriate risk-adjusted rate of return on capital,but no economic profits representing higher rates of return on capital. This is disciplined by entry of new suppliers whenever economic profits arise and exit of existing suppliers whenever normal profits are not able to be achieved.

Importantly, for the idealised market to operate efficiently, producers should not face restrictions in the manner in which they offer product to the market.

[1] In reality in the NEM, generation investors may also receive some revenues from selling ancillary services and from selling risk management services through electricity derivative contracts. Ancillary services are ignored in this report because they are complimentary to energy prices. Selling risk management services, revenues for which are recovered through contract premiums, may at times be a significant source of revenue. However, any such revenues are inextricably linked to the energy market design being generally related to the underlying supply/demand outlook, expected energy market price volatility and the risk tolerance of counterparties, and in essence are energy market revenues.

Figure 1 **Idealised supply curve with perfect competition**

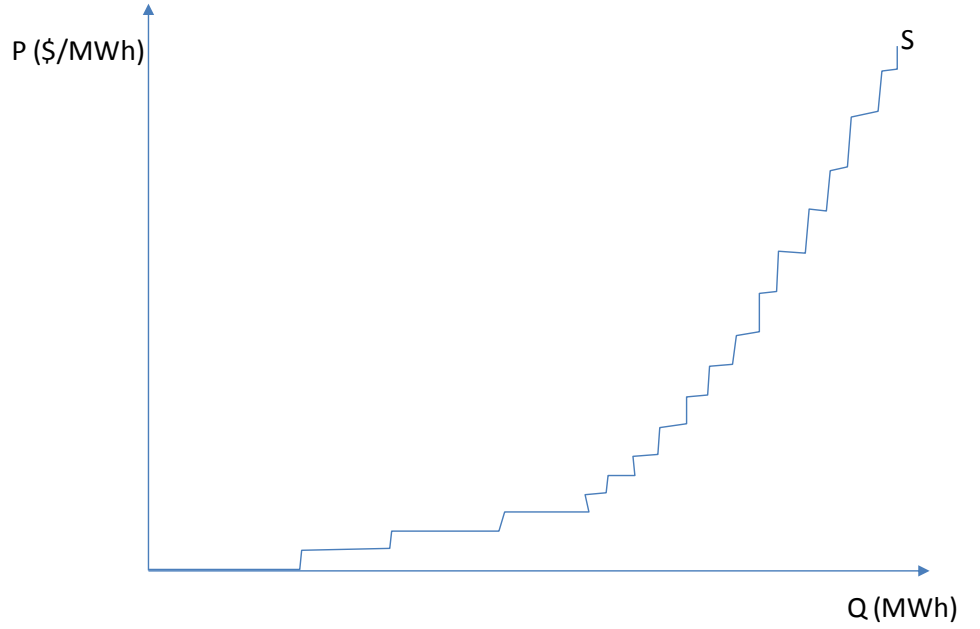


Workable competition

The reality of the NEM is that it is not an idealised, perfectly competitive market. Suppliers are not homogenous as they use a variety of technologies and source different fuels from varying locations. The nature of economies of scale within generation technologies means that the number of suppliers will also be relatively few, and the best outcome is one in which the market is "workably" competitive.

The typical mix of technologies underpinning the supply curve, if offered at marginal cost (coal, gas, hydro and renewable, along with some limited active demand side participation) would result in most existing generators being unable to earn normal profits to service efficient capital structures and in some cases fixed operating costs. This means that price offered by each generator at the margin will not only reflect the generator's SRMC but will generally include an amount reflecting the generator's desire to recover fixed costs and its view of the value of capacity at that time. Hence, a stylised typical supply curve is shown in Figure 2.

Figure 2 **Stylised typical electricity supply curve**



The value placed on capacity is related to scarcity, which means that a generator's marginal offer during periods of peak demand would be expected to be considerably higher than during off-peak periods. Returns to capital may be zero or close to zero during off-peak periods for most generators, with the majority of the returns to capital concentrated during the more extreme peak periods. So called price spikes are expected in an energy only market (particularly one dominated by low cost coal fired power stations) as generators seek to make an economic return. Hence, price spikes consistent with achieving an economic return broadly represents an efficient market outcome particularly because sub-economic returns will dissuade investment and increase the likelihood of significant amounts of demand not being met (lower reliability).

MPC and CPT

As noted in discussion with respect to perfect competition, imposing restrictions on the manner in which suppliers offer product to the market inhibits efficient allocation/use of resources (economic efficiency) through market forces. Economic losses or economic waste resulting from intervention in markets are referred to as "deadweight losses" in the economics literature.

Because electricity demand tends to be characterised by low price elasticity of demand (low responsiveness of quantity demanded to price changes) relatively small shifts in demand can lead to relatively large changes in market clearing prices. This is particularly notable at times of peak demand when supply also

tends to be characterised by low elasticity (at least in the short term). This has led to a policy of applying price caps in the NEM.

The NEM market price cap (MPC) and cumulative price threshold (CPT) limit upward short-term movements in prices. Subsequent discussions focus on the MPC, because the CPT when applied is a more restrictive MPC. The MPC/CPT has been justified as a risk management device, with the Reliability Panel arguing that the cost to reliability through otherwise economic supply not brought forth and potential rationing of demand, is balanced by the lower risk to participants associated with placing a cap on market prices. However, the MPC and CPT involve economic costs that should be compared with benefits. Moreover, those costs and benefits should be compared with those of alternative market mechanisms for managing price risk.

In ACIL Tasman's view, the merits of government intervention to provide a risk management device has not been reasonably justified[2]. On economic grounds, government intervention can be justified to correct market failures or to rectify policy failures.[3] However in this instance, market failure does not seem to apply, because there are various mechanisms available commercially to help limit exposure to prices, including but not limited to the use of derivative hedge contracts to cap risk to a specific price. There also does not appear to be any pre-existing policy failure that would be rectified by the MPC and CPT. However, the MPC and CPT may have caused unnecessary economic inefficiencies (economic waste or deadweight losses), leading to a policy response to establish the Reliability and Emergency Reserve Trader (RERT) scheme and its predecessor, the Reserve Trader.

Government intervention to constrain price movements, as in the case of the price cap regime applying to wholesale electricity prices, interferes with the market system's performance of its important functions of inducing supply, rationing supply, and allocating that supply among the competing uses to which it could applied.

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2 It is noted that some market participants have concerns with regard to the lack of financial incentives on transmission providers to minimise the cost of congestion and hence expose expose affected participants to significant financial loss.

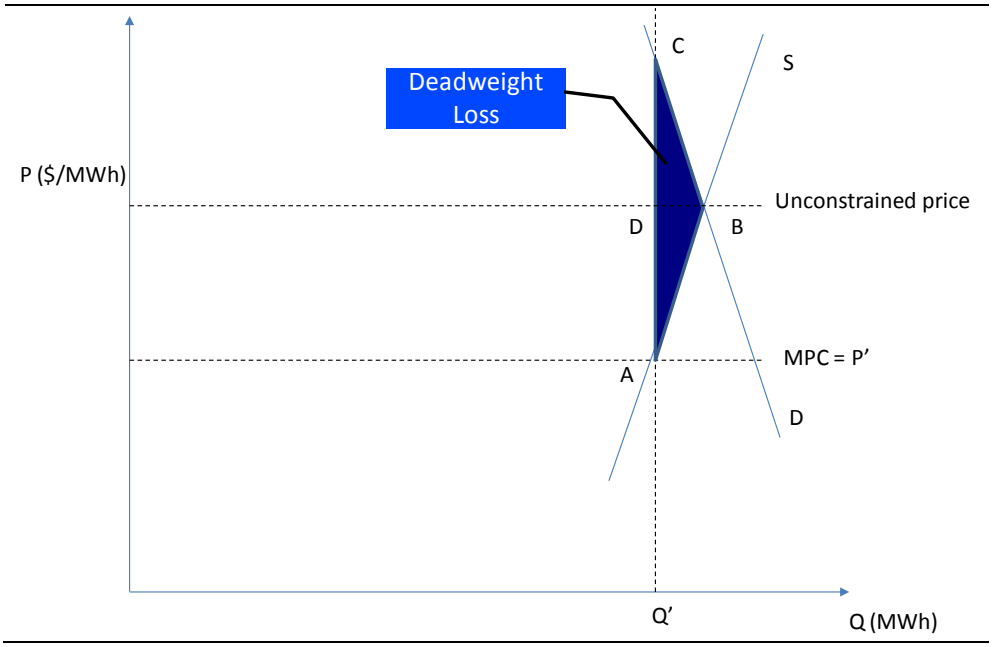
3 Market failures refer to circumstances in which markets fail to allocate resources efficiently. This can occur because of missing markets, monopoly power in some markets, and the phenomena of external costs and external benefits, including the extreme case of public goods that are characterised by a very high proportion of benefits being external, Policy or government failure refers to government intervention that causes unnecessary inefficiencies in resource allocation because of misguided intervention, poor policy selection and design, or unintended consequences of pursuit of political objectives. These government-induced economic inefficiencies are often referred to as deadweight losses.

If the price is capped at a level below the price that would result from unfettered market forces, quantity demanded does not fall sufficiently and/or quantity supplied does not rise sufficiently to ration demand and equate quantity demanded and quantity supplied. Excess demand and/or a shortage of supply would prevail at the capped price.

The most common method of dealing with excess demand in the electricity market is to engage in load shedding - denial of supply to some customers. This rationing device is arbitrary in its application. It is also economically inefficient, giving rise to deadweight loss. This deadweight lossis the difference between the value to consumers of consumption beyond the quantity supplied at the capped price and the opportunity cost of the extra resources that would otherwise be utilised in the provision of additional supply beyond the amount offered at the capped price

The burden of the economic waste or deadweight loss is shared by consumers sacrificing consumption valued higher than price (consumers' surplus) and producers sacrificing output that would yield a surplus (producers' surplus) above the opportunity cost of resources involved in that extra output. The deadweight loss (assuming that the lowest value demand is load shed) associated with the application of the MPC, where the MPC is set such that there is excess demand (or shortage of supply), is shown in Figure 3 with the constrained equilibrium of (P',Q').

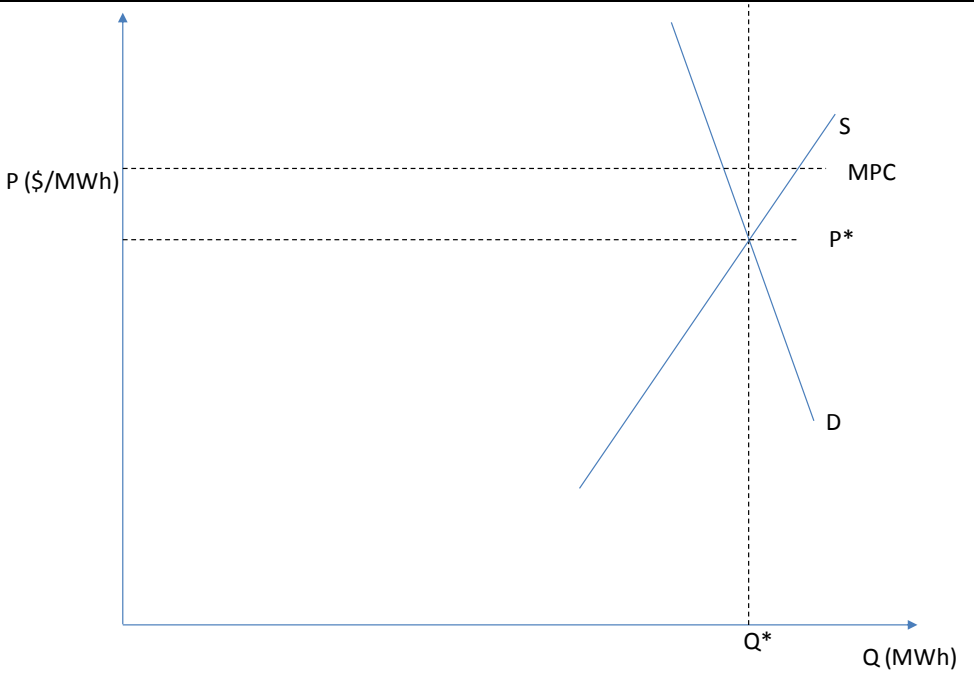
Figure 3 **Deadweight loss with MPC – limiting supply**



The deadweight loss is bounded by the triangle ABC, which is made up of lost consumers' surplus bounded by triangle BCD and lost producers' surplus bounded by triangle ABD.

Of course, it is possible that the MPC is set at a high enough level such that demand is equated with supply and rationing of supply is not required. This circumstance is shown in Figure 4 with the market equilibrium of (P*, Q*). There is no deadweight loss in this case.

Figure 4 **No deadweight loss with MPC – not limiting supply**



The Reliability Panel's deliberations leading to the release of the report *Reliability Standard and Reliability Settings Review* dated 30 April 2010 considered this issue in some detail. The Reliability Panel noted that an increase in the MPC to around $16,000/MWh was warranted in July 2012 in order to limit unmet demand (unserved energy) to 0.002% which equates to loss of supply from somewhere between 10 and 30 minutes per year depending on the time of day and time of year that the supply is lost.

However, the Reliability Panel recommended the MPC to be held to $12,500/MWh multiplied by 1 plus the proportional change in one year's Producer Price Index with subsequent years to be escalated similarly. Hence, while the MPC will increase from July 2012, at least for the foreseeable future, it is likely to be at a level below the maximum price for the market to clear naturally in all trading intervals and consequentially deadweight loss would be expected. This means that the circumstances shown in Figure 3 are likely to eventuate.

3 RERT

The Reliability and Emergency Reserve Trader (RERT) scheme was formulated to minimise arbitrary denial of supply to some customers in the context of constraints on upward price movements as a consequence of the application of the MPC and CPT. It could reasonably be seen as government intervention to address potential consequences of the price capping regime. In other words, the RERT scheme can be regarded as a policy response to policy failure, rather than to market failure.

It is important to note that the RERT scheme does not eliminate the deadweight loss arising from the capped price. Indeed, there is evidence to suggest that the RERT scheme is likely to increase the magnitude of the economic waste. However, the RERT scheme may also significantly change the composition of the deadweight loss.

Under the RERT scheme, arbitrary denial of supply in the context of the price cap aims to be avoided by either or both:

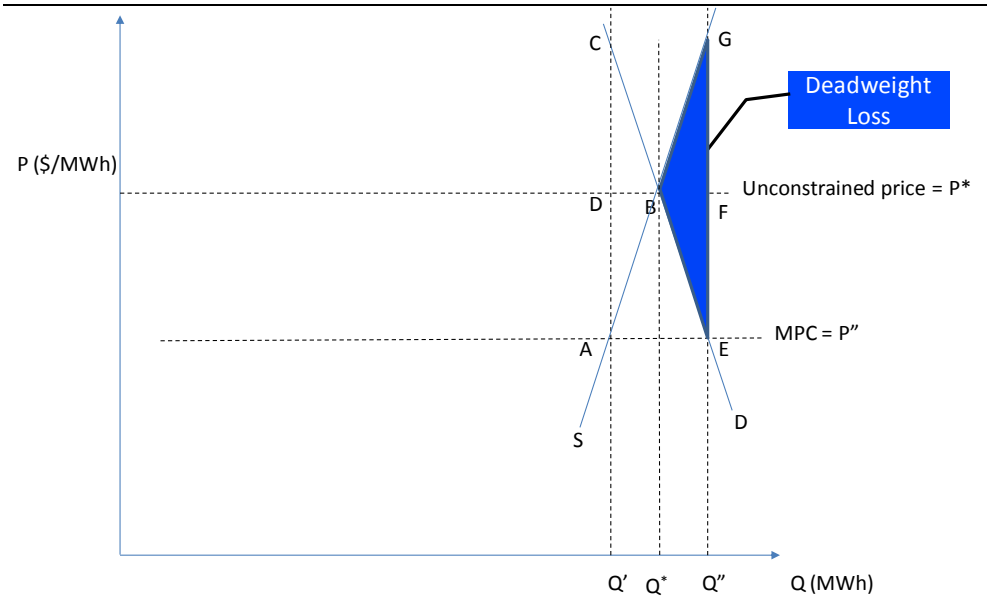
- paying for incremental production at prices above the constrained and potentially unconstrained market clearing price; and/or
- paying some consumers more than they value incremental consumption to decrease their demand temporarily.

The resulting deadweight loss in the former case is the difference between the opportunity cost of the extra resources applied to increase production above the level that would apply in an unfettered market and the value to consumers of the extra production. In the latter case, the deadweight loss is the difference between the value to consumers of sacrificed consumption and the resources saved by producing less than in an unfettered market.

RERT using supply enhancement

Figure 5 shows the deadweight loss assuming that all electricity user demand seeking to be supplied at the MPC is supplied (is in excess of the efficient level of demand). In this case RERT supplies all excess demand by contracting to call forth the next lowest cost form of supply (above the MPC) assuming that it is available. Hence, the deadweight loss directly associated with dispatch under the RERT scheme in this circumstance is bounded by the triangle BEG, which is made up of an increase in producer opportunity costs bounded by Q^*BGQ" less the gain to consumers bounded by Q^*BEQ".

Figure 5 **Deadweight loss with MPC – RERT tapping lowest cost supply**

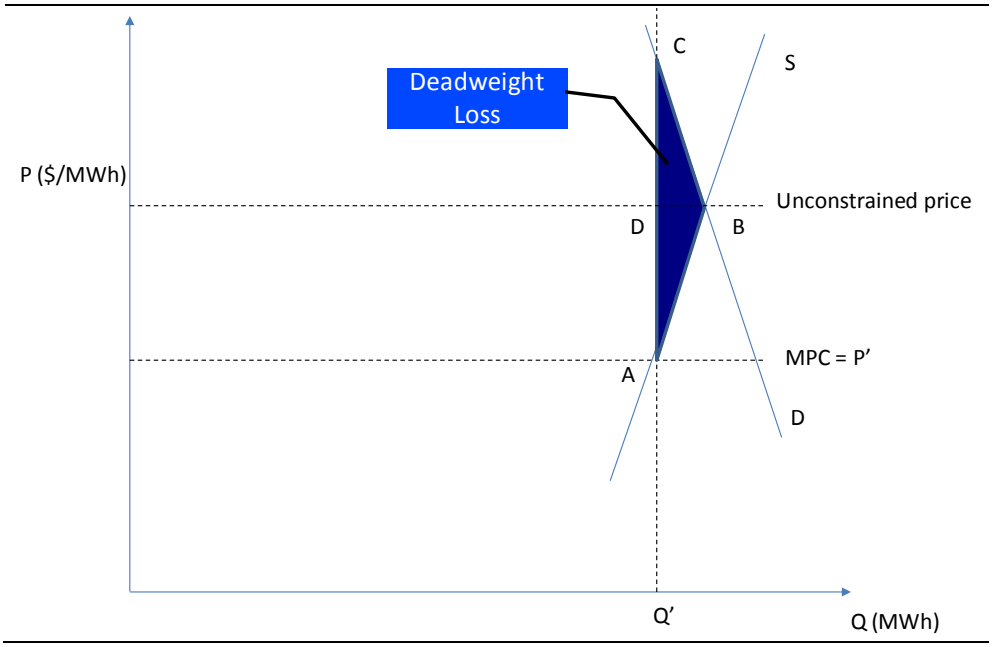


However, there is additional economic damage associated with the RERT scheme through the recovery of costs. The NER requires AEMO to recover the costs of using the RERT from all electricity consumers in affected regions in proportion to their electricity usage between 8 am and 8pm on the day that the RERT is used. This is levied *ex post*, unlike spot prices, which are set *ex ante*. Hence the levy is effectively a tax on consumption across all hours and would cause an additional deadweight loss over and above that shown in Figure 5 above.

RERT using demand reduction

Similarly, Figure 6 shows the deadweight loss if it is assumed that no supply is available and instead only demand is contracted and this applies to consumption with the lowest value. Therefore, the deadweight loss is bounded by the triangle ABC, which is the same as for the case of load shedding (refer Figure 3), assuming that both are able to tap the lowest value demand. However, as the RERT is required to recover costs of procuring demand across electricity consumers between 8 am and 8pm on the day of usage and the cost is determined *ex post* and is effectively a tax, additional economic damage would be caused by additional deadweight loss associated with the levying of the tax across those hours. Hence, prime facie, where the difference in the value of demand that is reduced is negligible between load shedding and the use of RERT, load shedding has a lower deadweight loss and hence less cost to society.

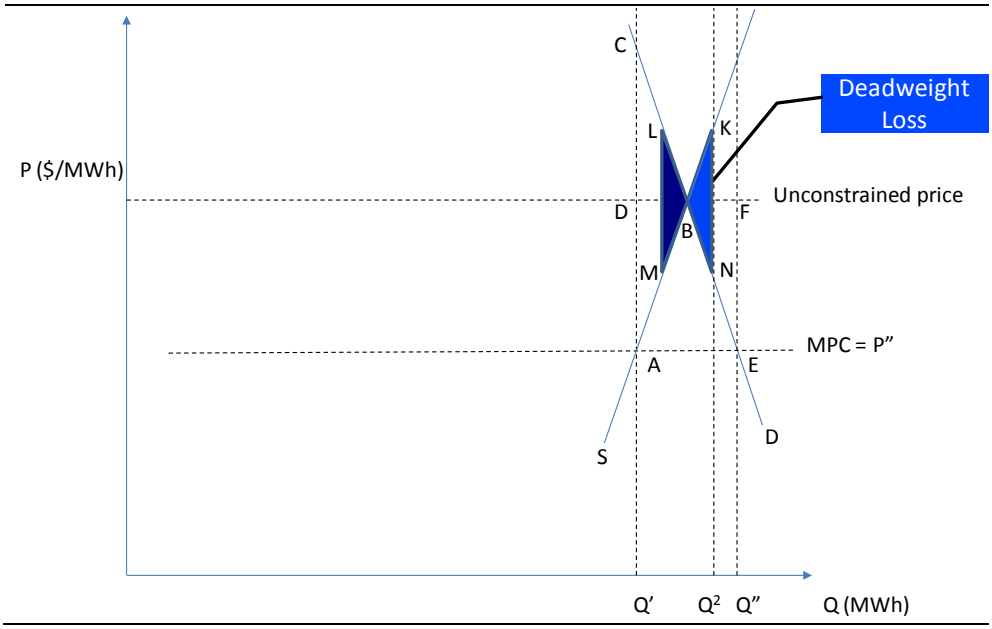
Figure 6 **Deadweight loss with MPC – RERT tapping lowest value demand**



RERT using supply and demand adjustments

For the case of a combination of lowest cost supply and lowest value demand being accessed by RERT, the deadweight loss is shown in Figure 8. The deadweight loss in this case is the sum of the two triangles BLM and BKN. Again the *ex post* recovery of costs will be in effect a tax and will create an additional deadweight losses beyond those shown in the figure.

Figure 7 **Deadweight loss with MPC – RERT tapping mixture of lowest cost supply and lowest value demand**



Taxation effects

As discussed above, the inbuilt funding mechanism under the RERT scheme for payments to provide supply or reduce demand during extreme peak periods is a tax on consumption of electricity. This adds to the deadweight losses associated with the RERT scheme. These extra losses are the aggregate of changes in consumers' surplus and producers' surplus associated with the incidence of the tax.

Consequently, the price cap and RERT scheme run counter to the economic logic of peak load pricing. The price cap encourages extra consumption in super-peak periods, and RERT facilitates that additional consumption. Then depending on how the costs are recovered, the RERT tax may discourage consumption at times of lower demand by raising the price of electricity above the social marginal cost of supply.

Source of deadweight losses

An important point is that the ultimate source of the deadweight losses in both the unplanned load shedding case and RERT scheme cases is the price cap mechanism. When supply is rationed by denial of supply to some arbitrarily determined consumers, the amount of the deadweight losses is determined by the rationing mechanism. When entities are paid to reduce demand or increase supply, the amount of the deadweight losses is determined by the subsidy and tax arrangements comprising the RERT scheme.

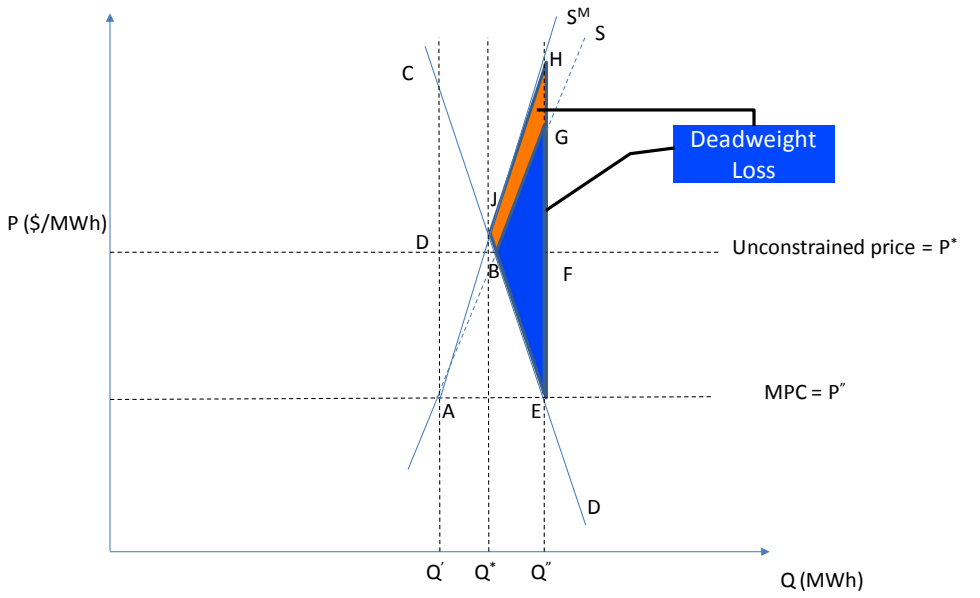
Administrative inefficiency

The above analysis assumes that the RERT scheme is efficient in implementation and either brings forth the next increment of supply that would be available in an unconstrained market and/or procures the least cost demand abatement. Neither of these is likely to be the case in reality, because of informational deficiencies and asymmetries, and institutional and technical barriers.

The informational problems are obvious. The AEMC has widely canvassed a variety of institutional and technical barriers in reviewing demand side participation in the NEM.. Hence, in practical terms the RERT scheme is likely to source more costly supply and demand options.

The effects of this with respect to operating the RERT with higher cost supply than would be expected in an unconstrained market are shown in Figure 8. In this case, the RERT scheme meets all demand through acquiring additional supply but not the lowest cost supply that would have been available without the MPC. The higher supply costs are represented by supply curve S^M diverging from the lowest cost supply curve that would be available without the MPC. As before there would be additional deadweight losses associated with the incidence of fees to recover the costs of operating the RERT.

Figure 8 **Deadweight loss with MPC – RERT tapping higher cost supply**



The administration of the RERT scheme has a cost to AEMO which they have estimated at $70,000 per tender panel. These costs must also be recovered

from electricity users and although relatively small also reflect a source of additional deadweight loss.

Investment effects and Objective Targeting

The price capping and RERT mechanisms are likely to inhibit investment decisions. This is particularly the case because of the long lead times in developing supply.

The price cap reduces producers' surplus in extreme peak periods. The RERT scheme eats into producer surpluses in other periods on the day of the extreme peak.

The Reliability Panel's *Issues Paper: Review of the Reliability and Emergency Reserve Trader (RERT),* stated (p. 16) that the Panel considered that the MPC and CPT had been set at a sufficiently high level to deliver investment to meet the Reliability Standard notwithstanding advice from ROAM Consulting to the contrary, but also "considered that the current reliability framework may be reaching the point where it is no longer adequate to achieve the multiple objectives of meeting the Reliability Standard, managing financial risk and meeting consumers' value of reliability." It is not clear that the MPC and CPT are sufficiently high to avoid inefficient impediments to investment. Also, it could reasonably be argued that the reliability framework already is not adequate to achieve the multiple objectives targeted.

It has long been widely understood by economists that it is important to carefully match policy instruments with objectives or targets. This involves:

- deploying at least the same number of instruments as objectives
- ensuring that instruments have been well designed to achieve objectives and are the best available for targeting those objectives
- implications of each instrument for all objectives are taken into account, not just implications for the particular objective at which an individual instrument was primarily targeted.[4]

The current policy package of the price capping regime and the RERT appears to violate these principles. The result has been creation of the economic inefficiencies or deadweight losses discussed above.

All of the sources of deadweight loss discussed above have become more important over time as excess capacity that was available at the commencement of the NEM in late 1998 has been run-down. In the context of declining

[4] Tinbergen, J., *The Theory of Economic Policy*, Amsterdam: North Holland, 1952; Hansen, B,, *Economic Theory of Fiscal Policy*, London George Allen and Unwin, 1955 (translated into English 1958).

excess capacity, activation of RERT processes would tend to occur more often. In the absence of the RERT system, the probability of load-shedding would tend to be higher when excess capacity has been run-down. In this context, the impediments to investment from the price cap arrangements and the RERT scheme would tend to be more serious.

Estimating incremental deadweight losses

Estimating incremental deadweight losses associated with the RERT arrangements requires the ability to estimate the deadweight losses associated with involuntary load shedding caused by the MPC and subtract this from the estimated deadweight losses for the planned RERT process.

The deadweight loss associated with load shedding depends upon the amount of load that is required to be shed and the price elasticity of demand shed and supply not shed. While broad estimates using rules of thumb are possible, there is considerable uncertainty as to whether they could be considered to accurately reflect the actual deadweight loss.

Apart from uncertainty with respect to demand and supply elasticity, the somewhat arbitrary nature of involuntary load shedding means that the load that is shed is unlikely to all be sourced from the lowest value supplied. While involuntary load shedding protects some high value and sensitive loads such as hospitals, the shedding process is likely to source a range of loads with widely varying values.

In contrast, at least in theory, the RERT process could potentially source the lowest value loads to reduce consumption or the lowest cost additional supply options to meet the excess consumption. However, in practice, informational constraints, institutional barriers and practical limits on aggregation of smaller loads means that this is unlikely for demand. Hence, just as there is considerable uncertainty as to the actual value of the load that would be shed under the load shedding approach, there is also considerable uncertainty as to the value of the load or cost of supply that may be offered to AEMO under the RERT arrangements. There is no obvious method of calculating the deadweight losses for either of these approaches or ranking one ahead of the other.

However, one area of deadweight loss is unique to the RERT approach, being the deadweight losses associated with recovering the costs of using the RERT arrangement. If all other deadweight losses were equivalent between the load shedding and RERT approaches, the RERT approach would have greater deadweight losses because of the effective tax effect..

Finally, it is noted that it is anomalous that the RERT scheme has been subjected to considerable criticism, but the price cap has not. This may be because the RERT scheme is under review whereas the price cap has become an accepted limitation on the market with the level subject to regular review. However, it has been shown above that this asymmetric scrutiny of the two schemes is inappropriate. The deadweight losses associated with the RERT scheme arise not only because of the design of that scheme, but also more fundamentally, because of the existence of the price capping arrangements which have been put in place to meet a variety of competing objectives. It is ACIL Tasman's assessment that in the absence of the current price cap regime, the RERT scheme would be redundant.

4 Contracting

NEM participants trade in electricity hedging contracts to trade risk, particularly offsetting price risk which may include:

- swapping floating price payment or revenue exposure to the pool for a fixed price
- selling or buying floating exposure beyond a benchmark or strike price for a fixed consideration or premium
- various combinations of both of the above.

To the extent that the existence of the RERT lowers NEM participants, particularly market customers, perceptions of risk and actual risk can lower their willingness and desire to enter into electricity contracts.

RERT may lower actual and perceived risk in two ways:

- Market customer obligations to the pool at times of extreme demand that require RERT intervention may be reduced through RERT process with the costs of acquiring the intervention allocated across the regions affected. Any reduction would depend upon one or more of the market customers demand obligations being reduced (note that market customers gain a similar benefit under involuntary load shedding where their obligations are curtailed).
- Market customers may choose to enter into a lower level of contracts, particularly with respect to extreme peaks, therein potentially making it more difficult for new entrants to enter the market, on the basis that AEMO will step in to reduce load to match available supply under the RERT scheme or through involuntary load shedding as a fallback.

An analysis of electricity contracts over time indicates a strong correlation with expected pool prices[5] (as theory would suggest), although contracts often incorporate premiums over expected pool prices reflecting a willingness to pay a premium for transferring risk.

Apart from risk management, electricity contracts play an important role in bringing forth new supply, as they provide some comfort with respect to forward earnings prior to committing to a new supply option. Hence, any reduction in willingness to contract would likely have an impact on supply seeking to enter the market.

[5] Notably there is little or no correlation with historical pool prices which also have little or no correlation with expected or future pool prices.

However, it should be noted that any such effect caused by RERT would be expected to be second order when compared with the impact of the price cap on inhibiting new entrant supply.