Submission to the Department of Climate Change

Green Paper on Carbon Pollution Reduction Scheme

10 September 2008

ABOUT AIP

The Australian Institute of Petroleum (AIP) was established in 1976 as a non-profit making industry association. AIP's mission is to promote and assist in the development of a sustainable, internationally competitive petroleum products industry, operating efficiently, economically and safely, and in harmony with the environment and community standards.

AIP member companies play various roles in each segment of the fuel supply chain. They operate all of the petroleum refineries in Australia and handle a large proportion of the wholesale fuel market. However, AIP member companies directly operate and control only a relatively limited part of the retail market.

AIP is pleased to present this submission on behalf of the AIP's four core member companies:

BP Australia Pty Ltd
Caltex Australia Limited
Mobil Oil (Australia) Pty Ltd
The Shell Company of Australia Pty Ltd

Contact Details

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SUMMARY OF KEY POINTS IN SUBMISSION

Emission intensive trade exposed (EITE) industry eligibility

- The rationale for EITE status is that a facility is entitled to assistance to offset the loss of international competitiveness when it competes against facilities that have no similar carbon costs.
- The Australian refining industry is trade exposed.
    - There are significant imports of all petroleum products into the Australian market and there are no meaningful barriers to entry for these imports.
    - Australian refineries price their product reflecting import parity prices and have no ability to pass additional costs through to customers.
    - Australian refineries compete against countries that do not impose carbon costs such as, Singapore, India, Taiwan and South Korea, which together supply around 25% of Australia's liquid fuel needs.
- Carbon leakage from the Australian economy will occur with the loss of future capital investment and transfer of Australian production to competitors located in nations that do not have carbon constraints and that appear very unlikely to introduce a carbon constraint in the foreseeable future.

<u>Calculating emission intensity eligibility</u>

- The Australian refining industry is emissions intensive.
- AIP believes the transition path to a global carbon price should be seeking to maximise the economic benefits to the Australian economy by ensuring that changes can be efficiently accommodated in a reasonable timeframe by affected businesses.
- The metric for EITE assistance should reflect the individual value of the activity to the Australian economy
    - value added or net revenue metrics would be appropriate
    - gross revenue would not be appropriate as it distorts eligibility away from high input cost processes and late chain processes.
    - AIP considers that it is possible to construct the required data from audited company accounts and income tax returns.
- AIP proposes this metric should be calculated on an industry basis taking account of the full business profitability cycle.
- AIP believes the eligibility for EITE assistance should be reviewed every 3-5 years to ensure that there are no unintended adverse outcomes of EITE policies that are implemented.

<u>The quantum of EITE assistance</u>

- There should be 100% assistance for EITE industries to avoid underutilised capital and other economic losses.
- AIP does not support the concept of differentiating the level of assistance for EITE industries by the proposed 60% and 90% levels in the Green Paper.
    - Because of the highly cyclical nature of petroleum refining and many other potential EITE businesses, the determination of eligibility for EITE assistance should be based over a period of time sufficient to cover the normal business cycle and not 2 years as proposed in the Green Paper.
- The allocation of permits to EITE industries should not be limited to 30% of the total permit pool
    - The total volume of permits should be a function of the required permits to meet the government's stated election policy principles (refer Labor' Plan for a Stronger Resources Sector) to not disadvantage EITE industries with the introduction of an emission trading scheme.
    - The linkage of low income household assistance and low emission technology financial support to the CPRS revenue/permit stream is not valid, as successive governments have funded these measures from general revenue.
- Any decay of EITE assistance should be matched to the uptake of carbon constraints by regional competitor nations and not to the national emission trajectory.

  - The approach proposed in the Green Paper will impose costs on Australian business that it would not face if all nations imposed equivalent carbon costs on business
- Permits should be allocated to individual facilities on the basis of actual emissions.
  - AIP does not consider that a benchmarking process can feasibly ensure equity and certainty between facilities.
- AIP advocates that the actual allocation of permits for refineries should be based on an index of emissions per unit of input, averaged over a number of years.
- AIP believes that the base index should be calculated for each refinery so that the multiple design and operating differences between refineries do not advantage or disadvantage particular refineries.

Consequences of insufficient EITE assistance

- If sufficient EITE assistance is not provided Australian refineries will face significant additional costs not faced by competitors and there may be a rapid decline of the Australian refining sector.
- If the Australian refinery industry closes, there will be adverse impacts on Australia's liquid fuels supply security, loss of petrochemical industry feedstock, loss of engineering and other technical expertise and significant localised losses in economic activity.
  - Box 1 provides a summary of the broader benefits of the refining industry.

CPRS Coverage

- All Kyoto protocol gases should be covered where it is administratively efficient to do so.
- An upstream point of acquittal for liquid fuels is the most administratively efficient option, with the point of acquittal for all liquid fuels being at the point at which fuel excise is imposed on fuels entering the Australian market. This approach will ensure that all liquid fuels used in Australia (including for stationary energy as well as for transport purposes) are subject to an appropriate carbon price.
  - All fuels produced in Australia as well as all fuels imported into Australia should be covered by this approach, subject to specified exemptions for very small volumes of imported fuels where it is clear those imported fuels will not enter the general Australian fuels market
- In principle, large emitters should be responsible for the emissions associated with the liquid fuels they use, however, given the Government's preferred approach of upstream acquittal for liquid fuels, liquid fuel self-acquittal by large users should be subject to the establishment of appropriate mechanisms to enable the emissions liability to be transferred from the fuel supplier to the fuel user, and the liability transfer recorded by the CPRS Regulator
  - These mechanisms would be dependent on fuel suppliers being able to set up the necessary accounting etc systems to track fuel sales without carbon prices, and there being clearly established links between sales by fuel suppliers and fuel used by large emitters.

Fuel excise offsets

- The Government has proposed to offset the impact of carbon prices on some liquid fuel users for various periods of time by providing a 'cent-for-cent' reduction in the fuel excise rate for those liquid fuel users.
- The key issues are how to exactly match the fuel excise reduction with the expected daily fluctuations in the carbon permit price at the bowser. Consideration will also need to be given to how the options to deliver the excise offset will impact on the development of the Australian carbon market and liquidity in that market.
- Potential options for delivering the excise offset are
  - Adjust the excise rate on a regular, and frequent, basis to reflect the prevailing carbon costs associated with the use of those liquid fuels, with fuel suppliers being liable for upstream acquittal of those fuel emissions
  - Maintain the current fuel excise rate, with Government hypothecating a portion of the excise revenues to the CPRS fund, and the Government retiring/issuing the appropriate number of emissions permits associated with the fuel use.

  - Other options may be identified by Government and industry stakeholders for further consideration.
- These options would require consideration of adjustments to the fuel tax credits and the energy grants credits which are paid to various businesses to establish their net excise liability related to fuel use
- The Henry Taxation review considerations of the fuel excise arrangements will also need to be finalised at an early stage in order to be integrated into the CPRS design features for an orderly start of the CPRS in mid 2010.

Other CPRS design features

- AIP generally supports the preferred positions 3.1 to 3.6 outlined in Chapter 3 of the Green Paper on design of the carbon market, but suggests that there should be some additional flexibility in permit borrowing limits in the initial years of the CPRS.
- AIP emphasises the importance of matching the CPRS reporting and assurance design features with those currently applying under the fuel excise arrangements. In particular, the creation of differing regulatory regimes under the fuel excise and CPRS systems should be avoided in the interests of administrative efficiency and regulatory certainty.
- Where upstream acquittal of emissions is to be used in the CPRS, reporting requirements will need to be adjusted in the CPRS and NGERS legislation to ensure that either Scope 1 emissions are separated into emissions to be acquitted and emissions already acquitted by an upstream entity, or the definitions for Scope 2 emissions will need to be adjusted to include emissions for which there has been upstream acquittal, such as liquid fuels.
- Taxation and accounting rules associated with carbon emissions permits should be very clearly defined before the commencement of the CPRS. AIP is particularly concerned that international and Australian accounting standards remain very unclear and ambiguous about the treatment of carbon emissions permits.

1 INTRODUCTION

The issues addressed in this submission are those which have a direct link to fuels/refinery issues in the Government's proposed Carbon Pollution Reduction Scheme (CPRS).

There are a broader range of issues associated with the design features of the CPRS which AIP member companies will be addressing through their contributions to other industry association submissions, such as submissions from the Business Council of Australia and the Australian Industry Greenhouse Network, as well as through their own submissions on company specific issues.

As flagged in the body of the submission, AIP expects to be making further submissions to Government on aspects of the Green Paper, in light of clarification of key issues through discussion with the Department of Climate Change on point of acquittal, excise offsets and EITE policy.

2 ASSISTANCE FOR EITE INDUSTRIES (Green Paper Chapter 9)

The rationale for EITE assistance

Maximising economic benefits

The general approach of the Green Paper concentrates on managing the transition to a low carbon economy without sufficient consideration of the impacts on economic growth and industrial development. Without the economy wide modelling results that are expected to be delivered by Treasury in October, it is very difficult to assess the overall economic benefits. Even then, AIP does not consider that the Treasury modelling will deliver sufficient guidance to provide a full picture of the range of economic impacts, particularly detailed sectoral impacts. AIP member companies will be presenting information on the impacts on individual facilities in their responses to the Green Paper.

The main purpose stated in the Green Paper (p. 295) of providing EITE assistance "is to provide assistance to those industries that face the greatest material impact of the carbon cost and that are constrained in their ability to pass through these costs because of international competition". This approach recognises that Australian based businesses compete with similar businesses located in countries with no prospect of introducing a carbon price in the foreseeable future. AIP supports this approach to EITE assistance and expects that the Australian Government will provide sufficient EITE assistance to ensure that Australian industry is not disadvantaged.

These expectations were reinforced in the election platform of the Rudd Government that stated in Labor's Plan for a Stronger Resources Sector that the government would:

- Ensure that Australia's international competitiveness is not compromised by the introduction of emission trading
- Consult with industry about the potential impact of emissions trading on their operations to ensure they are not disadvantaged
- Establish specific mechanisms to ensure that Australian operations of emissions intensive, trade exposed industries are not disadvantaged by emissions trading.

If Australian based businesses are subject to a carbon price and there is open trade in the product concerned, then the locally based business will lose market share to the imported product which is not subject to a carbon constraint. **Australian production will decline over time leading to a decline in Australian carbon emissions. However, this will not lead to a reduction in global carbon emissions, as Australian based emissions will be replaced by the carbon emissions associated with the foreign production.**

On this basis, AIP had expected the Green Paper to propose an EITE mechanism which sought to remove all risk of a decline in Australian businesses due to emissions trading while ever import trade competitors are not subject to equivalent carbon emissions costs. AIP does not believe, based on the Government's election commitments, that it is appropriate to dismiss the case for full EITE assistance by contending that changes in the cost structure of industries are not unusual and that it is not unusual for government policy to change cost structures. While AIP recognises that it is the prerogative of the government to reflect the priorities and values of the government, there is also a natural justice argument that industry investments were made in good faith with an expectation of no radical changes in government policy that might undermine the competitiveness of the industry.

In particular, AIP does not agree with the argument on p.292 of the Green Paper that changes in cost structures do not elicit a government response or that assistance is not usually provided to offset the changes in domestic policies. There is a long history of Australian Governments providing transitional assistance to industries that have been adversely affected by an external shock, such as agriculture (particularly drought assistance), motor vehicles, textiles and film making. The claims of government not providing assistance to offset domestic policy are also not correct as is evident from the tariff reduction debate and sectoral plans since the 1990s, as

well as actions taken on national competition policy impacts (such as offset payments to State Governments and phased introduction and adjustment periods in numerous government policies).

Box 1 Broader economic benefits of the Australian refining industry

The Australian refining industry provides energy security for Australia:

- The refining sector provides a diversity of domestic fuel supply options in addition to those available through imports of petroleum products.
- There is greater national sovereignty over a range of important policy settings, such as fuel and emission standards, climate change policy, transport policy and the management of liquid fuel supply disruptions.
- The ability to convert domestic oil production into useable product provides a "production of last resort" for both fuel supply security and national security objectives.

While the Australian refining industry contributes a relatively modest 0.2% of GDP, the industry underpins the competitiveness of liquid fuel intensive industries such as mining, agriculture and transport.

- Australia has among the lowest pre-tax and post-tax fuel prices in the OECD.
- Refinery production underpins supply chain efficiencies and responsiveness to changes in demand.
- Fuel supply infrastructure is usually a key component of any infrastructure development. Uncertainty surrounding the sourcing of ongoing fuel supplies would require greater sizing of fuel storage and distribution infrastructure, making the central infrastructure asset less economic.

The Australian refining industry contributes the benefits of a high value added industry

- A highly skilled workforce of around 9,000 people.
- Domestic expertise on fuels issues and fuel technology assessments.
- Expertise from international affiliates flows readily into Australian policy debates and commercial practice.
- Domestic management of the liquid fuel supply chain.
- A considerable economic activity in its own right contributing significantly to the Australian economy and local communities. In 2007, the Australian refining industry generated the following financial contributions
    - o $47 billion in revenue (excluding excise payments)
    - o $15 billion in excise taxation collections
    - o Almost $1 billion tax payments (excluding excise)
    - o $1 billion in direct investment in Australia
    - o $400 million of wages and salaries payments.

<u>If the refining industry was to reduce significantly in capacity</u>, or to close down in Australia, these benefits would be lost and the following consequences would need to be addressed:

- The loss of a major competitive advantage for liquid fuels intensive business and higher costs for Australian consumers.
- The Australian liquid fuels supply system would be more vulnerable to fuel supply disruptions probably leading to:
    - o Reduced ability of Australian governments to deal with supply disruptions
    - o Additional risk premiums for industries exposed to liquid fuels supplies
    - o Additional storage requirements and costs though the supply chain.

In assessing the economic benefits of emission trading, a central policy question is whether the industry has the capacity to adjust. From a practical point of view, any government action that leaves underutilised capital (ie outmoded before its proper time) will result in an unnecessary loss to the Australian economy. The issue of underutilised assets is particularly pertinent for capital intensive industries with long lived assets.

Australian refineries can be competitive under a global carbon price and managing the transition path when most competitors do not have a carbon constraint is a central policy challenge.

AIP considers that Government policies that provide a clear transition path while taking adequate account of the transitional issues such as the lack of a global carbon constraint will maximise the economic benefits for Australia. In this context, AIP considers that EITE policy must fully recognise the disadvantage faced by Australian industry when competing with imports from countries with no carbon emission constraints.

Carbon leakage

Carbon leakage should be a serious concern for policy makers as it reduces Australian production and jobs and, depending on the industry, adds to global carbon emissions.

The Green Paper defines "carbon leakage" as an industry relocating to another jurisdiction and utilising higher emissions technologies, thereby increasing the net amount of emission as carbon leakage. AIP does not consider this to be an adequate definition because leakage also occurs when Australian production is transferred to a country that has no emission constraints.[1,2] If Australian production is transferred to a country that has no emission constraint, the associated emissions reduction in Australia will be taken up by some other Australian industry inside the overall Australian emissions cap and as a result, global emissions will increase.

AIP considers a more appropriate and realistic definition of carbon leakage would be the transfer of Australian production to facilities that do not face equivalent carbon constraints.

This definition would also be more reflective of the Government's election commitments on the treatment of EITE industries within an Australian ETS.

Limiting EITE to 30% of permits

The preferred position in the Green Paper is that the maximum level of assistance to EITE industries should be 30% (including agriculture) of the total emissions permits. The rationale appears to be that this level allows for the funding of household and low emission technology support. AIP considers that this approach contravenes several principles enunciated in the Green Paper, particularly the EITE objective of offsetting the adverse competitive effects while major competitors have no prospect of any carbon cost for the foreseeable future.

The initial calculation of EITE assistance, and any decay in the level of EITE assistance, needs to be based on a sound understanding of the capital investment cycles, the technology deployment and emissions abatement opportunities of each particular industry. This will ensure the efficient use of capital and in particular the efficient retirement of capital, that is, the transition path for the industry should seek to ensure that there is no underutilised capital.

The action to limit the amount of EITE assistance to an arbitrary 30% (including agriculture) of emissions permits clearly does not accord with the comments on p.294 of the Green Paper that give priority for assistance towards existing industries, particularly those with significant sunk capital investments, few opportunities to reduce emission profiles and a limited capacity to pass through the carbon cost.

AIP is strongly of the view[3] that the Australian emissions cap needs to be set on the basis of what other countries are prepared to do as well as the performance of those countries in maintaining their emissions within their cap. If Australia moves beyond the performance of other countries it will lead to premature shutdown of industries that

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[1] European draft directives define the criteria for carbon leakage as "whether it is possible for the sector or sub sector to pass on the costs of the required allowances in product prices without significant loss of market to **less efficient carbon installations outside the community**".

[2] The European Petroleum Industry Association (EUROPIA) has argued that a correct definition could be, "whether it is possible for the sector or the sub sector to pass on to **end users** the costs of the required allowances for production without significant loss of market share to installations outside the community **not subject to equivalent CO2 emissions constraints, or to bear those costs without significant deterioration in profitability and loss of international competitiveness."**

[3] See AIP submission to Garnaut Review

would have survived under a global carbon price and result in potentially significant underutilised capital.

In addition, the arbitrary limit of 30% cap (including agriculture) seems to be counter intuitive to other proposals in the Green Paper to adequately compensate industries that will be disproportionately disadvantaged by the introduction of an emissions trading scheme.

AIP is concerned that the allocation of the revenue stream between various categories is arbitrary and the funding to EITE appears to be a residual amount after the other priorities are funded. There is no cost benefit analysis of the relative merits of proceeding in this manner. The Green Paper has presented no modelling to support the revenue requirement to compensate low income households. In addition, there are no reasons given as to why it is now appropriate to hypothecate emissions trading revenue to support low emissions technologies which are currently funded out of consolidated revenue.

In setting a 30% limit on EITE assistance, there also appears to be an underlying assumption that industries have a potential emissions reduction path that can ameliorate the impacts of the cost disadvantage imposed by the proposed framework. In the refining and other capital intensive industries this is not the case; the emission profile is largely fixed by the capital equipment that is installed. While there are some investments and process actions that can be employed to reduce emissions, these reductions are marginal in the Australian refining industry and in most cases have already been made (see Box 2).

AIP also has serious reservations about the argument that increasing EITE assistance will place an excessive burden on the rest of the economy, particularly households. This argument can only hold where the Australian cap decreases significantly faster than international competitors. If other nations do not commit to and deliver significant emissions decreases there is no case for significantly ratcheting down the Australian cap. AIP believes that increasing the available permits for allocation to EITE industries from 20% to 45% (excluding agriculture) as proposed by AIGN would not have a significant impact on households or other sectors of the economy, particularly in comparison to the alternative economic impact of losing some of these EITE industries altogether. AIP looks forward to scrutinising the Treasury modelling to assess whether this question has been accurately examined.

It is also important to recognise that any negative impacts on EITE businesses from the CPRS, including premature closure, will have potentially much greater impacts on households through loss of employment and financial losses through shareholdings and superannuation.

The government does not have to limit assistance to the amount collected by EITE and has the option to fund other expenditures from consolidated revenue. Given the scale of the reform proposed with the emission trading scheme, there is a strong case to provide significant transitional assistance to affected industries. Such assistance outside the carbon trading revenue could be linked to the further examination of abatement opportunities or offsets for the particularly industry.

AIP is also concerned that the proposals for a significant decay of the EITE assistance will quickly undermine the impact of any assistance and contravenes the principles of the EITE assistance. As long as Australian industries are competing against countries that have no carbon constraints, the stated principles of the EITE assistance mean that the EITE assistance should offset this competitive disadvantage. To do otherwise, will cause Australian industries that could survive under a global carbon price to unnecessarily close.

Box 2 - Australian refining emission reduction opportunities

The greenhouse emissions from a petroleum refinery are largely determined by the configuration of the process units within the refinery, for example, a crude distillation unit, fluidised catalytic cracker and hydro-desulfurisation unit. Each unit will utilise a particular category of technology (vintage and type) that has an associated level of energy usage. As an energy intensive industry there are strong incentives for refineries to examine any opportunities for improvements in energy efficiency. Ongoing assessment of energy efficiency opportunities are a key refinery management activity. However, the energy efficiency and therefore the resultant greenhouse emissions are constrained by the type and the age of equipment installed at the particular refinery.

It follows that any major reductions in emission intensity from refinery production will be associated with new equipment probably embodying new technologies. In most cases this will entail a major retrofit of the refinery and probably a significant period of scheduled shut down followed by re-commissioning period. Given the relatively fixed configurations of refineries there are also limited opportunities for large scale fuel switching, for example, between fuel oil and natural gas, even if alternative fuel sources are available.

Nonetheless there exist a range of improvements that can be undertaken by the refinery that include:

- Process heat efficiencies, such as air pre heaters, heat exchangers and co-generation
- Process gas capture and re-use
- Regular upgrading of catalysts
- Regular maintenance of operating units.

These energy efficiency opportunities are actively pursued by refineries as part of normal management strategies. However, it needs to be recognised that such changes take time to implement (in some cases up to 2 to 4 years depending on available maintenance windows) even with attractive investment incentives.

While a cost of carbon would make these abatement activities more economical viable, it is unlikely that Australia refineries will be subject to major rebuild or retrofit programs. The fundamental reason is that the construction costs in Australia and ongoing operating costs work strongly against Australia as a future refinery investment location.

The Australian refining industry

There are seven operating refineries in Australia located in Melbourne, Brisbane, Sydney and Perth. These refineries supply about 75% of Australia's petroleum products demand through a distribution system to major customers and almost 6,000 service stations. The refineries were constructed in the 1950s and 1960s but have been extensively modified since then. Australian refineries are small by international standards and compete against larger and more efficient refineries in the Asia-Pacific region. Imports are landed in most Australian markets and almost exclusively supply northern Australia. For a more detailed description of the Australian refining industry see AIP's publication Downstream Petroleum 2007 http://www.aip.com.au/topics/new.htm .

Defining the petroleum refining sector for EITE purposes

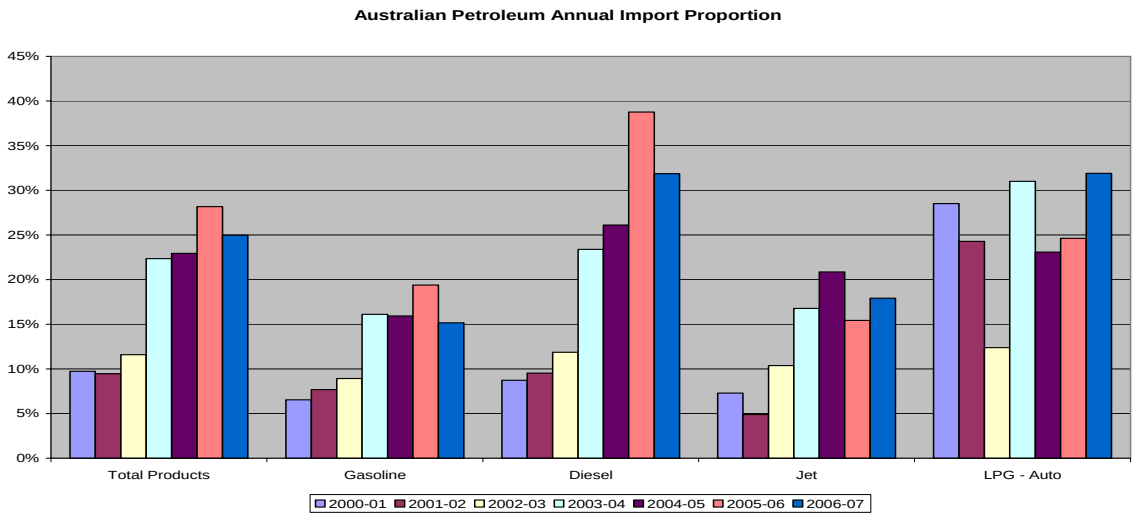
Petroleum refining involves the conversion of crude oil into marketable petroleum products. Petroleum products are defined in the National Greenhouse and Energy Reporting Scheme Regulations and include products such as petrol, diesel and jet fuel. Given the refinery process units are managed in an integrated manner (for example crude distillation units and cracking units produce key precursors for all products) it is not possible to separate the refining activity into separate product-based activities.

The boundary of the refining activity commences at the crude oil unloading facilities and includes all the processing units within the refinery. The refinery activity ceases when the marketable products are shipped from the location either at the refinery loading gantry or as the product leaves the refinery by pipeline. The refining activity does not include any distribution activities, such as terminals, nor does it include crude oil transport prior to the refinery unloading facilities. Blending of biofuels usually occurs at the terminal and is not part of the refinery activity.

The Australian refining industry is trade exposed

The Australian liquid fuels market is open and competitive. The proportion of imported products (including gasoline, diesel, jet and LPG) was just under 25% of total demand in 2006-07. With limited additional domestic refining capacity, growth in Australian demand will be met by imports.

The following figure shows the proportion of imports to total consumption for each major product. This shows that for all major products, imports have captured at least 15% of the Australian market. In some products such as diesel and LPG, the proportion of imports of total consumption exceeds 30% of the market. The significant level of imports indicates that the Australian fuels market is not only contestable in theory but that Australian liquid fuels production is in direct competition with imports.

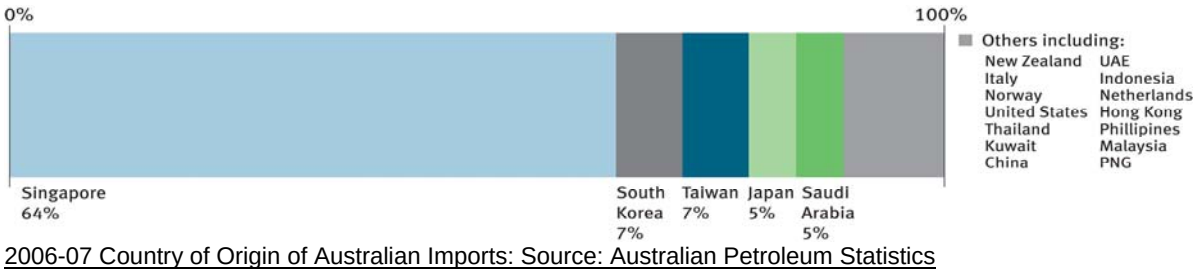


Source: Australian Petroleum Statistics

The liquid fuel import infrastructure is well matched to current demonstrated needs of importers (including independent importers). Additional capacity is likely to be constructed, particularly by import terminal operators such as Vopak, if there are clear long term needs and commitments by importers to use the facilities.

While there are a number of independent importers such as Neumann's Petroleum and Gull Petroleum that are successfully importing significant volumes of product into the Australian market, other independent importers have not been able to aggregate enough retail volume to justify an increase in the capital investment in terminals. The Department of Resources, Energy and Tourism in conjunction with Treasury and the ACCC will examine the extent to which the lack of import terminals creates a barrier to entry and will report in December 2008. This study will test the ACCC[4] assertion that there are potential barriers to entry for independent importers of petroleum products into Australia because of a lack of import terminals. AIP has strenuously opposed this assertion in the ACCC report and has continued to argue that the Australian fuels market is open to import competition.

Liquid fuel imports to Australia are sourced from a variety of destinations but the majority are sourced from the Asia-Pacific region. Import sources will vary from year to year, based on, among other things, production levels and the availability of appropriate grade fuels, cost of the fuels including any exchange rate movements, and the availability and costs of shipping. Nonetheless, the largest source of imports has been Singapore, with data for 2006-07 showing that fuel was also sourced from South Korea, Taiwan, Japan and Saudi Arabia. The majority of these imports come from large, very efficient, export oriented refineries.



2006-07 Country of Origin of Australian Imports: Source: Australian Petroleum Statistics

With the exception of Japan none of these countries currently has a cost of carbon for refinery emissions or any stated intention of introducing a cost of carbon. Japan has introduced a voluntary carbon trading system that effectively subsidises abatement opportunities in companies by Japanese Government funding. Japan is also considering a broader emissions trading system but the deliberations are at the initial stages and there is no indication as to when the scheme may be implemented.

Given the proximity of these supply sources and other new refineries in the region - such as Jamnagar (India) it is likely that the Asia Pacific region will remain the main marginal source of supply for the Australian liquid fuels market. It is also likely that none of the refineries competing for the Australian market will face a cost of carbon for the foreseeable future. Therefore, Australian refineries will face additional costs for carbon emissions that are not contemplated by regional competitors.

Import Parity Pricing

Australian petroleum products compete directly with imported product. More importantly, sales of Australian production reflect Import Parity Price (IPP) that includes:

- The international price of petroleum products (Mean of Platts Singapore - MOPS95 for petrol)
- Transport costs
- Wharfage
- Insurance

[4] ACCC 2007 Petrol Price Inquiry Report

The IPP concept is a landed price for imported product that provides a benchmark price for domestic product. Australian refineries cannot price above the IPP or they will lose market share to imported product. In other words, domestic refineries cannot pass on additional costs to consumers above the IPP and have to absorb these costs to remain competitive with imports.

Refinery emission costs are significant compared to profits

The direct and indirect refinery emissions in calendar 2007 were about 7.7 million tonnes of CO_2-e. This amounts to a cost disadvantage of $385 million for the total refining sector at $50 per tonne of CO_2-e. This equates to about 38% of the annual average EBIT for the downstream petroleum industry over the last ten years to 2007. Since the relationship is linear, each $1 increase in carbon price per tonne roughly equates to a reduction of about 0.75% of annual average EBIT over the last ten years for the downstream petroleum industry in Australia.

Table 1 Cost of refining direct emissions ($million)

Carbon Price	$20	$50	$80
Total Cost	$154 mill	$385 mill	$616 mill
Proportion of Average Net Profit	15%	$38%	60%

Note: 10 year average EBIT $1019

These impacts clearly demonstrate that there is a significant cost and risk to the refining sector of placing a cost of carbon on Australian refinery emissions. If Australian refiners sought to charge above the market price for domestic production there would be a loss of market share to the cheaper imported product. The future financial viability of the Australian refining industry can only be more accurately assessed once the emissions trajectories are set by government and related carbon prices become evident, and a judgement is made about the future course of historically volatile refining margins (see figure below). Refining margins have been relatively strong since 2003 driven by regional growth in demand and a sluggish supply response. In comparison, the period from 1998 through to 2002 was period of weak refining margins that was caused by excess supply in the region.

International refining margins

The Australian Refining Sector is Trade Exposed - Key Conclusions

- There are significant imports of all petroleum products into the Australian market.
- Most imports into Australia are sourced from the Asia-Pacific region.
- There are no meaningful barriers to entry for imported petroleum products.
- Australian petroleum products are priced reflecting import parity price.
- Most refineries in the Asia-Pacific region will not face a cost of carbon in the foreseeable future.
- In the absence of EITE assistance, the profitability of Australian refineries would be substantially reduced, increasingly so as carbon permit prices increase.

The Methodology for establishing eligibility for EITE assistance

Both the Green Paper and the Garnaut Review emphasised the difficulty in developing a metric for the assessment of emissions intensive activities, in particular, the comparability of any measure between sectors and the stability of the measure over the business cycle. The reports both conclude that the preferable method for assessing emission intensiveness is emissions per dollar of value added, but point to practical difficulties in obtaining this data.

In rejecting the possibility of using value added data, the Green Paper ignores the fact that the data will be contained within audited company financial statements, and could be extracted by those entities wishing to establish a case for EITE assistance. AIP is of the strong view that if industries are seeking EITE assistance then these industries should be willing to open their audited accounts to Government to verify their claims, subject to suitable confidentiality protections.

The preferred Green Paper compromise metric, emissions per unit of revenue, seems to be based solely on administrative convenience rather than reflecting the best interests of the Australian economy. This metric clearly disadvantages industries that have large input costs, such as the refining industry with significant crude oil input costs and late chain processes.[5] The inherent disadvantage to capital intensive businesses of the emissions per revenue metric is acknowledged in the Green Paper.

Apart from revenue and value added, the Green Paper does not consider any other metrics that could be utilised to measure emissions intensity. **AIP strongly believes that value added, gross operating surplus and revenue net of raw material and other input costs could be effective metrics for establishing eligibility for EITE assistance. Data for the Australian refining industry is set out in the following section of this submission.**

The Green Paper proposes that the EITE metric determines the eligibility of industry for EITE assistance as well as the specific proportion of assistance. Heavily emission intensive industries would receive a free allocation of 90% of their emissions permits and moderately intensive industries receive a free allocation of 60% of their emissions permits. **AIP considers that this framework contravenes the EITE assistance principles (even if it includes a sliding scale of benefits rather than a step change) and will unnecessarily cause businesses to close that otherwise would have survived under a global carbon pricing regime.**

Analysis of refining EITE metrics

An analysis by AIGN (Table 2) shows that the choice of metric can radically change the ranking of each industry in the measurement of emissions intensity. For example, the AIGN analysis shows that on the revenue metric petroleum refining is not entitled to any EITE assistance under the Green Paper's 30% cap. In comparison, the value added metric ranks the refining industry well within the 30% cap proposed by the Green Paper. **The broad disparity between the use of metrics suggest that there is a significant risk that the metric chosen will not be reflective of an industry's emissions intensity and may lead to some industries unnecessarily downscaling or closing because of artificially inadequate EITE assistance.**

[5] These costs are estimated to be around 90% of total refining revenue and in a period of volatile and rising oil prices will fundamentally affect any metric that is based on gross revenue

Table 2: AIGN industry ranking by emissions intensity metric

Sector Rank	Revenue	Value Add	Intermediate Input Cost	Intermediate plus Employee Cost	Gross Operating Surplus
1	272-273 Basic non-ferrous metal manufacturing	272-273 Basic non-ferrous metal manufacturing	12 Oil and Gas Extraction	12 Oil and Gas Extraction	272-273 Basic non-ferrous metal manufacturing
2	11 Coal Mining	253 Basic chemicals	11 Coal Mining	11 Coal Mining	262 Ceramics
3	262 Ceramics	263 Cement, lime, plaster and concrete	262 Ceramics	272-273 Basic non-ferrous metal manufacturing	263 Cement, lime, plaster and concrete
4	253 Basic chemicals	251 + 252 Petroleum and coal products	272-273 Basic non-ferrous metal manufacturing	262 Ceramics	271 Iron and steel manufacturing
5	263 Cement, lime, plaster and concrete	271 Iron and steel manufacturing	263 Cement, lime, plaster and concrete	253 Basic chemicals	253 Basic chemicals
6	271 Iron and steel manufacturing	11 Coal Mining	253 Basic chemicals	263 Cement, lime, plaster and concrete	264 Non-metallic mineral products nec
7	12 Oil and Gas Extraction	262 Ceramics	271 Iron and steel manufacturing	271 Iron and steel manufacturing	251 + 252 Petroleum and coal products
8	264 Non-metallic mineral products nec	264 Non-metallic mineral products nec	264 Non-metallic mineral products nec	264 Non-metallic mineral products nec	11 Coal Mining
9	261 Glass and glass products	12 Oil and Gas Extraction	261 Glass and glass products	261 Glass and glass products	261 Glass and glass products
10	251 + 252 Petroleum and coal products	261 Glass and glass products	251 + 252 Petroleum and coal products	251 + 252 Petroleum and coal products	12 Oil and Gas Extraction
11	13-15 Mining Non-energy	21 Food, beverages, tobacco	13-15 Mining Non-energy	13-15 Mining Non-energy	21 Food, beverages, tobacco
12	23-24 Wood, paper and printing	13-15 Mining Non-energy	23-24 Wood, paper and printing	23-24 Wood, paper and printing	22 Textile, clothing, footwear and leather
13	21 Food, beverages, tobacco	23-24 Wood, paper and printing	22 Textile, clothing, footwear and leather	21 Food, beverages, tobacco	23-24 Wood, paper and printing
14	22 Textile, clothing, footwear and leather	22 Textile, clothing, footwear and leather	21 Food, beverages, tobacco	22 Textile, clothing, footwear and leather	254-256 Other chemicals, rubber and plastic
15	254-256 Other chemicals, rubber and plastic	254-256 Other chemicals, rubber and plastic	254-256 Other chemicals, rubber and plastic	254-256 Other chemicals, rubber and plastic	13-15 Mining Non-energy
16	274-276 Other metal products	274-276 Other metal products	274-276 Other metal products	274-276 Other metal products	274-276 Other metal products
17	29 Other manufacturing	29 Other manufacturing	29 Other manufacturing	29 Other manufacturing	29 Other manufacturing
	20% of 450 million permits	30% of 450 million permits	40% of 450 million permits		50% of 450 million permits

The following data (Table 3) represents the current assessment of EITE metrics for the Australian refining industry. The data applies to the refining industry only and does not include distribution and marketing activities.

Table 3: Emissions intensity metrics

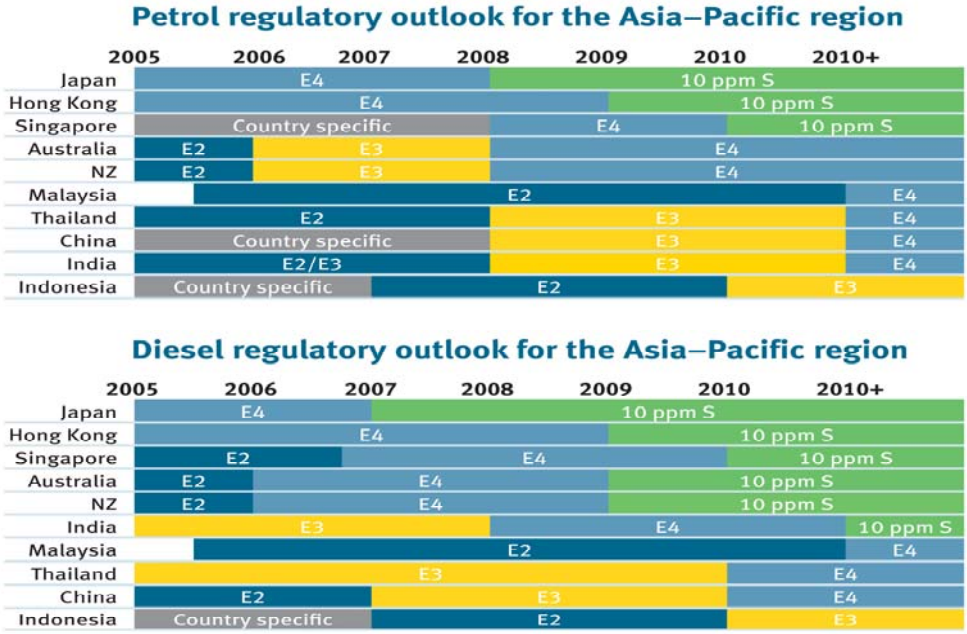
	2000	2001	2002	2003	2004	2005	2006	2007	Average 2000-2007	Average 2006-2007
Total Refinery Emissions										
Million Tonnes CO_2-e (Scope 1&2)	7.80	8.20	7.88	7.70	7.52	7.43	7.28	7.75	7.70	7.51
1. Revenue										
Total Revenue ($m)	14,687	14,417	13,510	13,706	17,246	20,863	25,462	25,986	18,234	25,724
Emissions per $million	531	569	584	562	436	356	286	298	453	292
2. Gross Operating Surplus										
EBITDA ($m)	175	351	155	698	1,243	1,610	1,752	1,507	936	1,629
Emissions per $million	44,571	23,390	50,713	11,023	6,053	4,617	4,157	5,139	18,708	4,648
3. Value Added										
EBITDA ($m)	175	351	155	698	1,243	1,610	1,752	1,507	936	1,629
Add Employee Costs ($m)	214	239	247	281	309	330	362	399	298	381
Total Value Added ($m)	389	590	402	980	1,551	1,940	2,113	1,907	1,234	2,010
Emissions per $million	20,073	13,905	19,607	7,857	4,848	3,832	3,446	4,062	9,704	3,754
4. Operating Costs										
Cash Operating Costs ($m)	561	849	867	849	898	965	1,054	1,131	897	1,093
Emissions per $million	13,901	9,663	9,090	9,070	8,371	7,701	6,906	6,849	8,944	6,878

Emissions intensity metric stability and assessment period

At first glance, Australian refinery emissions appear to be relatively stable, with the refining sector emitting between 7 and 8 million tonnes of greenhouse gases over each of the last eight years. However, the gross emissions numbers disguise some major developments in the industry over that period. Each of the Australian refineries has undertaken significant investments to maintain and improve the energy efficiency, and hence improve the emissions intensity of the facility. Over the same period the industry undertook significant investment associated with the introduction of cleaner fuels specifications in Australia commencing from 2002 (see Box 3). Cleaner fuels regulations were aimed at addressing urban air quality issues and facilitating the introduction of more fuel efficient vehicle technologies. The most significant changes in fuel quality standards, which occurred from 1 January 2006, significantly increased the energy intensity and greenhouse gas emissions from Australian refineries.

Box 3: Regional regulatory outlook for liquid fuels

The following diagram shows the regulatory framework for cleaner fuels for the Asia-Pacific region. It could be expected that the energy usage in Asia-Pacific refineries will increase as a direct result of the introduction of cleaner fuel standards across the region. A key contributor to increased energy usage will be the introduction of Euro 4 equivalent fuel standards that will require significant desulfurisation of fuels.



The production of cleaner fuels largely involves the removal of sulfur (and other pollutants) that requires greater levels of processing of the crude oil. More fuel processing requires more energy input and hence greater greenhouse emissions for each litre of fuel produced.

Each of the metrics listed in Table 3 shows a degree of variability over the period with emissions per revenue and emissions per operating costs varying by almost 100%. The emission per revenue metric is fundamentally influenced by the increasing price of crude oil.

Consequently, AIP members advocate an emissions intensity metric that relates to "materiality of financial impact", that is not distorted by the structure of the industry (eg large input costs or late chain processes). AIP considers that a metric based on value added or a close proxy such as revenue net of input costs would be more appropriate.

Contrary to the Green Paper conclusions, AIP considers that these metrics can readily calculated from existing company accounts and income tax returns. Normal auditing procedures of company accounts also provides third party verification.

Even though AIP strongly supports the use of a value added type metric to determine EITE eligibility, we note that such a metric will show significant variation across the business cycle. AIP believes that further work is required to make a judgement about the best way to translate the value added data into a suitable eligibility metric.

The refining industry is capital intensive and cyclical. Box 4 shows the large swings in the regional supply/demand balance that explains most of the movements in regional refiner margins and Australian refining profits. The excess demand cycle has a marked effect on the emissions intensity metric, for example, the value added metric was 20,000 tonnes per million dollars in 2000 (around the bottom of the business cycle for refiners) and 4,000 tonnes per million dollars in 2007. This variability reflects the significant changes in industry profitability over the period driven by substantial changes in refiner margins in the Asia-Pacific region (see Chart on page 15).

Given the variability of industry profits, AIP considers EITE should recognise variations in financial outcomes over the business cycle (2006 and 2007 being near the top of the cycle in terms of gross refiner margins). This means that assistance should not be based on a once-off eligibility test in 2008. At the very least, average industry profitability between the peak and the trough of the business cycle should be used to determine the EITE eligibility metric. Even more preferable would be a mechanism to ensure the eligibility mechanism is dynamic as circumstances change. For example, for the refining industry, from 1999 to 2001, the costs of a carbon price of $50 per tonne would have exceeded industry profits and in 2001 carbon costs would have been two and half times total refining industry profits. Since the Asia-Pacific regional refining industry appears to be heading back towards excess supply in the next decade, Australian refining profitability could see a repeat of the 1999-2001 financial outcomes. A similar cyclical occurrence would mean massive losses to the Australian refining sector even if there was partial EITE assistance under an emission trading scheme.

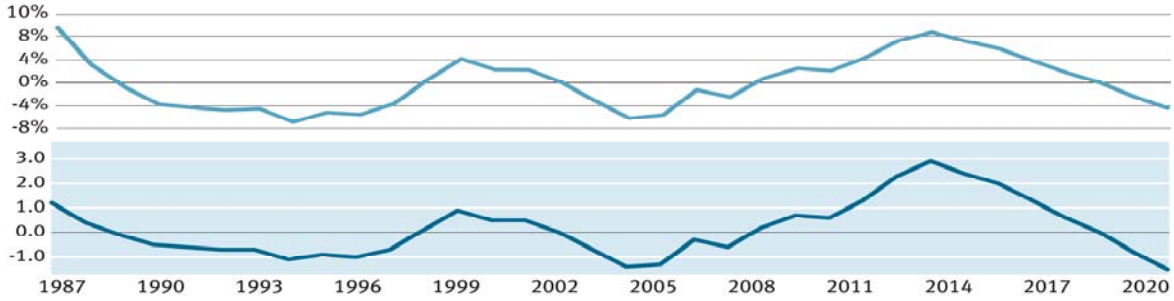
Box 4: Regional supply balance

The following figure shows an estimate of the Asia Pacific demand/supply balance to 2020. The Asia-Pacific regional fuels market has been in supply shortfall since 2003 driven by a rapid increase in demand, especially from China and India. The increase in refiner margins associated with this supply shortfall has provided a price signal for increased refinery construction for new facilities, expansions and upgrades. It is estimated that refinery construction will move the regional fuels market back into balance during the course of 2008.

The experience of the refining industry in previous cycles is that supply will overshoot demand leading to significant excess capacity. Excess refining capacity will lead to a softening of refining margins sending a price signal which slows the rate of refinery construction and may also mean the closure of less efficient refineries that are no longer viable. Increasing regional demand and the slowing of regional construction will inevitably reduce the excess supply in the fuels market and recommence the cycle. The Asia-Pacific fuels market is expected to move into supply surplus in the first half of the next decade and then returns to balance towards the end of the decade.

There is, of course, considerable uncertainty surrounding the supply/demand balance, particularly in the later years, because regional demand trajectories can be volatile and the rapid increase in refinery construction costs may mean refining projects are shelved or not completed on time. Nonetheless, similar patterns have been seen in the Asia-Pacific regional demand/supply balance over the last thirty years.

Asian region supply shortfall proportion of demand (Megalitres)



Australian refineries will be facing a softening in refiner margins just as the CPRS is being introduced thereby reducing the relative returns of the Australian operations. At their current performance, Australian refineries demonstrate a relatively better performance than comparable refineries in the Asia pacific region However, with the addition of a carbon price, Australian refineries would significantly reduce their commercial viability relative to other refineries in this class.

Establishing industry baselines to determine the actual allocation of permits

The Green Paper envisages that once eligibility for EITE assistance is established for an industry, the actual allocation of permits to particular facilities (or processes) should be calculated using an industry average base index (emissions per unit of input or output) multiplied by the future annual input or output of the facility. AIP considers that the base index for allocating permits to EITE industries should be based on the index for individual facilities rather than on the industry average. A facility based index will take account of the significant variations in design and operating features of the seven Australian refineries, and will avoid the need to resolve intra-industry equity issues which would otherwise arise from the use of an industry average index. AIP analysis indicates that facility based indices cover a spread of +/- 40% around the industry average index for refineries.

The Green Paper seeks industry views on options for calculation of the base index. AIP analysis suggests that across the refining industry there is not a significant difference between the use of an input or an output based index, and in contrast to the emission intensity metrics, there is not a large variability in the base index over the business cycle. The reason is that energy efficiency improvements have been largely offset by the additional processing energy required to produce cleaner fuels. Consequently, for simplicity of calculation, AIP proposes the index for refineries be based on emissions per unit of input. Although there is not a significant difference in the indices over the business cycle, AIP proposes further discussions with Government about the time period over which the average facility specific base index should be calculated.

Measuring Emissions Intensity - Key Conclusions

- The Australian refining industry is emissions intensive but emissions per unit of revenue is not an appropriate metric to determine eligibility for EITE assistance as it does not relate to the financial impact of carbon costs on the industry.

Eligibility for assistance

- AIP members advocate an emissions intensity metric that relates to “materiality of impact” such as value added, gross operating surplus and revenue less raw materials, that are not distorted by the structure of the industry (eg large input costs).
- AIP proposes this metric should be calculated on an industry basis taking account of the full business profitability cycle.
- AIP believes the eligibility for EITE assistance should be reviewed every 3-5 years to ensure that there are no unintended adverse outcomes for EITE policies that are implemented.

Quantum of assistance

- AIP does not support the concept of differentiating the level of assistance for EITE industries
- Any decay of EITE assistance should be matched to the uptake of carbon constraints by regional competitor nations and not to the national emission trajectory.
- Permits should be allocated to individual facilities on the basis of actual emissions.
    - AIP does not consider that a benchmarking process can feasibly ensure equity and certainty between facilities.
- AIP advocates that the actual allocation of permits for refineries should be based on an index of emissions per unit of input, using actual data for the relevant facility since 2006.
- AIP believes that the base index should be calculated for each refinery so that the multiple design and operating differences between refineries do not advantage or disadvantage particular refineries.

Alternative approaches to allocation of emissions permits to EITE industries

An alternative to calculating and implementing a metric in the way proposed in the Green Paper would be for all EITE industries to be eligible for assistance. EITE businesses would be required to make an equitable contribution to emissions reduction with the burden shared between businesses on the basis of the financial impact on each business.

An alternative methodology for calculating EITE assistance has been proposed by the Business Council of Australia (BCA). This proposal seeks to cap the financial impact on EITE industries by a similar amount for each industry. BCA proposes that total emissions liability in an EITE industry should be capped at 3-5% of value added to recognise the disproportionate impacts in some industries and the difficulties in equitably sharing the burden between industries. A preliminary comparison of this approach for the refining industry is contained in Table 4.

Table 4: Cost comparison between BCA and Green Paper proposal

	2000	2001	2002	2003	2004	2005	2006	2007
BCA Proposal Value Added Limits								
2% of Value Added ($m)	8	12	8	20	31	39	42	38
3% of Value Added ($m)	12	18	12	29	47	58	63	57
5% of Value Added ($m)	19	29	20	49	78	97	106	95
Proportion of Refinery EBITDA								
2% of Value Added	-4%	-3%	-5%	-3%	-2%	-2%	-2%	-3%
3% of Value Added	-7%	-5%	-8%	-4%	-4%	-4%	-4%	-4%
5% of Value Added	-11%	-8%	-13%	-7%	-6%	-6%	-6%	-6%
Green Paper Proposal Total Cost of Refinery Emissions								
$20 per tonne	156	164	158	154	150	149	146	155
$50 per tonne	390	410	394	385	376	372	364	387
$80 per tonne	624	656	631	616	602	595	583	620
Proportion of Refinery EBITDA								
$20 per tonne	-89%	-47%	-101%	-22%	-12%	-9%	-8%	-10%
$50 per tonne	-223%	-117%	-254%	-55%	-30%	-23%	-21%	-26%
$80 per tonne	-357%	-187%	-406%	-88%	-48%	-37%	-33%	-41%

As Table 4 shows, there are significant differences between the Green Paper proposals and the BCA proposals on the Australian refining industry. In particular, the large differences in impact between 2000 and 2002 coincide with the bottom of the business profitability cycle.

While AIP considers that the principles espoused in the Green Paper indicate that 100% EITE assistance is warranted, AIP notes the desire by Government for business to contribute to general carbon emission reductions in Australia. Therefore, AIP considers that this alternative approach should be further examined.

3 CPRS COVERAGE (Green Paper Chapter 2)

AIP agrees that all Kyoto Protocol gases should be covered, subject to the transaction costs and complexities associated with inclusion of the more specialised gases not outweighing the benefits of their inclusion.

AIP agrees that the proposed emissions threshold for direct obligations under the scheme should apply to entities with facilities which have direct emissions of 25,000 tonnes of CO_2 (e) a year or more. However, to avoid any confusion, we believe the CPRS rules need to explicitly indicate that this threshold figure includes emissions from use of liquid fuels by the entity, even though the entity may not be required to acquit the emissions from the use of those liquid fuels (as a result of up-stream acquittal of liquid fuel emissions). However, if the threshold only relates to emissions for which an entity has a direct acquittal obligation, it will be necessary for government to consider a lower threshold which excludes emissions for which there has been upstream acquittal.

Liquid fuels point of acquittal (domestic production and imports)

AIP is strongly of the view that the point of acquittal for all liquid fuels should be at the point at which fuel excise is liable to be remitted on all liquid fuels entering the Australian fuels market. As acknowledged in the Green Paper, the fuel excise arrangements are very well defined in legislation, and have highly accurate and well established measurement, reporting, acquittal and assurance arrangements. The fuel excise arrangements also include detailed mechanisms for the exclusion of fuel that is exported, used for international transport, sequestered in plastics, and supplied to visiting defence forces and consular vehicles – activities which are proposed to sit outside the CPRS or be subject to other specific arrangements under the CPRS, either now or in the future.

AIP supports the Green Paper proposal to apply this upstream point of acquittal to liquid fuels used in the transport sector, and we also strongly support the application of the same up-stream point of acquittal for liquid fuels used in stationary equipment. To do otherwise (as is proposed in the Green Paper – page 99) would impose a very high level of administrative complexity on the CPRS, as primary liquid fuel suppliers have no way of knowing what volumes of liquid fuels sold to customers will be used for stationary as opposed to transport purposes, and hence would not be in a position to apply a carbon price to liquid transport fuels but not to liquid fuels to be used in stationary equipment.

In order to ensure that no liquid fuels enter the Australian fuels market without being subject to a carbon permit liability, AIP supports the proposal for all fuel excise remitters to be subject to a carbon emissions permit liability for the emissions associated with the use of the liquid fuel they sell into the Australian market.

In relation to imports of liquid fuels, AIP strongly supports the proposal that all fuel which is subject to customs duty (or transferred under an excise manufacturer's licence) should have a carbon permit liability at the point of customs duty liability. The only exceptions to this proposal that could be supported by AIP would be specifically identified instances (identified in CPRS Regulations) involving very small volumes of fuel which would have no way of entering the general fuel market in Australia, such as the small volumes of fuel included in imported motor vehicles to enable those vehicles to be moved from import facilities to vehicle wholesaler facilities. AIP is of the view that specified exemptions on a case by case basis would be more administratively efficient than applying a liquid fuel volume threshold to fuel imports. AIP is happy to work with relevant Government agencies (DCC, Treasury and Customs) to develop appropriate, simple administrative arrangements to implement this point of acquittal arrangement for liquid fuel imports.

Net out and self acquittal by large users

AIP generally supports the principle that large emitters should be responsible for acquittal of permits covering their direct emissions, including emissions from the use of liquid fuels. However, given the Green Paper proposal for an administratively simple mechanism to apply a carbon price to all liquid fuels entering the Australian market, there are limitations on how volumes of liquid fuels can be 'netted out' of fuel sales at the upstream point of liquid fuel emissions acquittal. Potentially simple mechanisms exist for 'netting out' liquid fuel volumes where there are direct contractual relationships between the entity with primary liability for liquid fuel emissions acquittal and the fuel user (this would include direct supply contracts and fuel card contracts).

AIP supports, in principle, the establishment of a mechanism within the CPRS for the transfer of liability for liquid fuel acquittal from the upstream entity to the fuel user, provided

- **The fuel user is registered under the CPRS as being a 'liable entity'**
- **The upstream entity and the fuel user are in agreement on the specific volumes of fuel for which emissions liability will be transferred**
- **The CPRS Regulator has established a system for recording such liability transfers and for incorporating such information as is appropriate in reporting about emissions liabilities (either general or entity specific).**

Given the time required for AIP member companies to design, modify and test appropriate accounting and data tracking systems once detailed regulation is known with sufficient certainty, it is not possible for 'net out' arrangements to be in place from the start of the CPRS in mid 2010. A key issue is the establishment of the accounting systems to handle fuel sales with and without the associated carbon prices. AIP notes that the Green Paper proposes a twelve month delay before self acquittal mechanisms are available for use by large emitters.

The more widespread application of the concept of self acquittal by large emitters would be dependent on the establishment of robust, workable systems to enable any 'net out' volumes to be tracked through a series of fuel distributors and resellers who potentially do not have an emissions liability under the CPRS. AIP expects that such arrangements would need to be in place before the Government could consider the introduction of a mandatory requirement for self acquittal of liquid fuel emissions by large emitters.

AIP is committed to working with the Government to develop an administratively efficient and effective mechanism to enable large users to self acquit their emissions related to use of liquid fuels, including details related to the timing of eligibility and actual self-acquittal.

Coverage - Key Conclusions

- All Kyoto protocol gases should be covered where it is administratively efficient to do so.
- An upstream point of acquittal for liquid fuels is the most administratively efficient option, with the point of acquittal for all liquid fuels being the point at which fuel excise is imposed on fuels entering the Australian market. This approach will ensure that all liquid fuels used in Australia are subject to an appropriate carbon price.
    - This approach should apply to liquid fuels used for stationary and transport purposes
    - All fuels produced in Australia as well as all fuels imported into Australia should be covered by this approach, subject to specified exemptions for very small volumes of imported fuels where it is clear those imported fuels will not enter the general Australian fuels market
- In principle, large emitters should be responsible for the emissions associated with the liquid fuels they use, however, given the Government's preferred approach of upstream acquittal for liquid fuels, liquid fuel self-acquittal by large users should be subject to the establishment of appropriate mechanisms to enable the emissions liability to be transferred from the fuel supplier to the fuel user, and the liability transfer recorded by the CPRS Regulator
    - These mechanisms would be dependent on fuel suppliers being able to set up the necessary accounting etc systems to track fuel sales without carbon prices, and there being clearly established links between sales by fuel suppliers and fuel used by large emitters.

4 FUEL EXCISE OFFSETS (Green Paper Chapter 2)

The Green Paper proposes to offset the impact of carbon prices on some liquid fuel users for various periods of time by providing a 'cent for cent' reduction in the fuel excise rate for those liquid fuel users:

- Motorists will have fuel excise reduced by the amount of the carbon price for three years.
- Heavy vehicle road users whose effective excise is limited to the value of the Road User Charge (RUC) will be assisted by removing the impact of the carbon price from their fuel use for one year.
- Some industries (fishing and agriculture) which are not subject to a net excise will also be assisted by removing the impact of the carbon price from their fuel use for three years.

A key issue is how the carbon costs that are associated with each fuel sale will be matched to the reduction of fuel excise and/or the rebate of the carbon price through fuel tax credits for business users. Given the government's commitment is a "cent for cent" offset there are challenges in the exact delivery of this commitment, particularly how to adjust the excise rate frequently enough to match the carbon cost that would be paid at the bowser.

At the same time, consideration will need to be given to the potential impact of the options on the Australian carbon market since emissions from liquid fuels will account for some 20+% of permits available annually.

At this stage, there appear to be two main categories of options to provide the proposed liquid fuel excise offset:

1. **Adjust the excise rate on a regular basis (say quarterly or even six-monthly) to reflect prevailing carbon costs associated with the use of that fuel, with fuel suppliers liable for upstream acquittal of emissions associated with the fuel use**
2. **Maintain the current excise rate and hypothecate a proportion of the revenue to the CPRS account, with the Government retiring/issuing permits on the basis of the volumes of fuel reported as sold for excise purposes.**

In discussions with Government and industry stakeholders, other options may be identified for further consideration.

1. Adjust the excise rate and include carbon costs in fuel sales

The fuel excise legislation has been developed on the basis that the same excise rate will apply to all fuel of that type (eg petrol) sold into the Australian fuels market. This provides an administratively simple, yet robust mechanism to apply excise to all fuel sales and to minimise the risk of fuel entering the Australian market without having paid excise. Where the Government has provided excise concessions to categories of business users (eg heavy vehicles, off-road users), these concessions are provided by way of fuel tax credits that are claimable through the BAS system generally on a monthly or quarterly basis.

In developing a CPRS excise offset mechanism based on the option of reduction in the excise rate, the Government would need to establish a mechanism for adjusting the excise rate in line with movements in the carbon costs associated with the use of that fuel. Issues to be considered would be:

- How to reflect the current costs of emissions permits in the excise adjustment. This may vary depending on whether permit prices are stable or whether there is volatility in the auction and the secondary permit markets, as well as with fuel suppliers' costs of acquiring those permits.
- Whether an acceptable proxy for current permit prices could be recent historic permit prices, or the prices of permits in the futures market.
- The inherent delays in changes in excise rates working their way through wholesale and retail fuel market operations (for example it can take up to 2-8 weeks for fuel to

move from an excise point in the fuel supply chain to a retail customer, particularly in regional Australia).

It will also be essential to maintain the concept of a single excise rate for each fuel. Fuel suppliers have no way of segmenting a particular fuel in terms of sales for particular end uses. Given this situation, it would be necessary to establish a new single excise rate and then provide appropriate adjustments in the rates of fuel tax credits to each category of business fuel user in a way that maintains the same net excise outcome as at present, as well as provides an offset, where promised, for the embedded carbon costs associated with the use of that fuel. In some cases this will mean that fuel tax credits will need to exceed the amount of excise paid, a situation which will necessitate a change in the fuel tax credits legislation.

While this option has the benefit of maintaining the integrity of the carbon market, it is unlikely to offer an exact 'cent-for-cent' reduction in excise to offset the carbon cost of the fuel emissions. It seems unlikely that quarterly or six-monthly adjustments in fuel excise rates would enable the Government to accurately deliver a cent-for-cent offset of fuel excise for the carbon price related to the use of that fuel, unless the carbon permit prices remained very stable for long periods of time.

2. Maintain current excise rate (as inclusive of carbon costs) and Government retire/issue permits

The alternative CPRS excise offset mechanism is based on the option of maintaining the current excise rate, with the Government clearly indicating that this 'fuel charge' comprises the relevant carbon costs associated with the use of the fuel as well as an appropriately reduced fuel excise. (The Government could regularly publish details of the components of the 'fuel charge' to provide transparency of excise reductions and transfer of funds to the CPRS account.) Once the Government has collected the 'fuel charge' revenue from fuel excise remitters (in most cases this occurs weekly) the Government would transfer the relevant amount (ie the relevant carbon costs for the use of that fuel) to the CPRS revenue account, and the Government would retire the appropriate number of emissions permits based on fuel volumes reported by excise remitters.

This approach would allow for exact cent-for-cent matching between excise rate adjustments and carbon costs for fuel use on the basis of individual fuel sales to customers. It would also avoid the multiple complexities associated with setting and adjusting excise rates and flowing those changes through to the bowser. In some cases the fuel tax credits arrangements would need to be adjusted to ensure that each category of business users received the relevant ongoing concessions under the fuel tax credits legislation as well as the assistance offered under the CPRS Green Paper.

This option would clearly reduce the number of emissions permits available for trading in the carbon market until the time when the Government terminated the various excise offset concessions under the CPRS. As such, it would constrain liquidity in the carbon market and limit the development of secondary carbon markets in Australia.

Another approach (under option 2) which would enable the liquid fuel suppliers and large users to participate in the carbon market would be for the Government to issue permits to those parties who are upstream liquid fuel emissions acquitters (or who are large users who are self acquitting emissions permits). These permits issued by the Government would be based on excise remittance fuel volumes, at a fixed price equal to the excise offset. These parties would still have a liability to acquit emissions permits based on their fuel sales/use, but would also be able to trade those permits in the carbon market if they wished. AIP notes that the issue of such a significant number of permits at 'fixed' prices, even though those prices are expected to reflect price movements in the carbon market, warrants further consideration since this could have some impact on carbon market dynamics and future permit prices.

Other considerations

At this stage AIP has only given consideration to the workability of these options in relation to petrol and diesel. Since some other liquid fuels (eg jet fuel, fuel oil) do not appear to be subject to the cent-for-cent excise offset, it may be possible for those fuels to be subject to point of acquittal liabilities in the normal way.

Detailed consideration will also need to be given to how these excise offset arrangements impact on the current and proposed excise treatment of alternative fuels including LPG and biofuels. To the extent that excise rates and fuel tax credits are adjusted to implement the fuel excise offsets proposals, careful consideration will need to be given to how those changes need to flow through the energy grants credits arrangements to biofuels etc. This will include maintaining the current approach to fuel based and user category concessions applied through the energy grants credits arrangements. In addition there may be implications arising from changes to current price differentials between various fuels. As some of these issues are likely to be considered as part of the Henry Taxation Review, it will be essential that the Taxation Review considerations are identified at an early stage and that appropriate recommendations/actions are fed into the CPRS process sufficiently early to enable all the relevant rules to be established well before the mid 2010 start of the CPRS.

AIP expects to have further discussions with the Department of Climate Change and Treasury on the details of the potential options for delivering the excise offset concessions to fuel users, and will provide further comments on the workability of the options when more details are available.

Fuel Excise Offsets - Key Conclusions

- The Government has proposed to offset the impact of carbon prices on some liquid fuel users for various periods of time by providing a 'cent-for-cent' reduction in the fuel excise rate for those liquid fuel users
- The key issues are how to exactly match the fuel excise reduction with the expected daily fluctuations in the carbon permit price, and how to adjust the excise rate frequently enough to match the carbon price movements at the bowser. Consideration will also need to be given to how options to deliver the excise offset will impact on the development of the Australian carbon market, and liquidity in that market
- Potential options for delivering the excise offset are
    - Adjust the excise rate on a regular, and frequent, basis to reflect the prevailing carbon costs associated with the use of those liquid fuels, with fuel suppliers being liable for upstream acquittal of those fuel emissions
    - Maintain the current fuel excise rate, with Government hypothecating a portion of the excise revenues to the CPRS fund, and the Government retiring the appropriate number of emissions permits associated with the fuel use.
- Both options would require consideration of adjustments to the fuel tax credits and the energy grants credits which are paid to various businesses to establish their net excise liability related to fuel use
- The Henry Taxation Review considerations of the fuel excise arrangements will also need to be finalised at an early stage in order to be integrated into the CPRS design features for an orderly start of the CPRS in mid 2010.

5 OTHER CPRS DESIGN FEATURES

Carbon Market (Green Paper Chapter 3)

AIP supports the preferred positions set out in boxes 3.1 to 3.6 of the Green Paper on the carbon market covering the nature of carbon permit, who can hold permits, banking and borrowing, etc. In particular, AIP supports the proposals for:

- borrowing to be limited to 5% of liable parties' obligations, but suggests that a more flexible approach may need to be taken in the first year or two of the operation of the CPRS given the very large numbers of permits that fuel suppliers may need to acquit to cover fuel use emissions.

Reporting (Green Paper Chapter 5)

AIP supports the preferred positions set out in boxes 5.1 to 5.15 of the Green Paper on the arrangements for emissions reporting.

In particular, AIP strongly supports the need for the CPRS reporting rules to incorporate the relevant parts of the fuel excise legislation and Regulations etc, as well as the equivalent parts of the Customs legislation and Regulations. AIP proposes that the design of this mechanism be based on 'calling up' the relevant parts of the other legislation and Regs etc, rather than attempting to replicate the excise and customs legislation provisions in the CPRS legislation package. This approach will avoid the development of a significant package of legislation and Regulations etc, as well as avoid future administrative problems if one legislation package is amended without similar changes to the other legislation packages.

The relevant Excise and Customs legislation provisions cover volumetric measurement, reporting, and assurance, and will need to be reflected in all of these aspects of the CPRS. In light of the Government's preferred position on liquid fuel point of acquittal, similar considerations will need to be given to these same aspects in the NGERS legislation to maximise administrative efficiency and minimise duplication of effort. It is expected that the detailed NGERS arrangements will be thoroughly tested this financial year and may identify fine tuning issues in mid-to-late 2009 which are likely to be essential for a smooth start to the CPRS in 2010.

AIP is also of the view that careful consideration will need to be given to how emitters are expected to report emissions associated with fuels which are subject to an upstream point of acquittal. In the case of liquid fuels, it is clearly envisaged that fuel users are likely to use some fuels for which the carbon emissions have been acquitted by the fuel supplier, and some fuels for which the fuel user has assumed an emissions liability. In such cases it will be necessary for the emissions reporting template to require either

- Scope 1 emissions to be separated into subcategories based on whether emissions have been acquitted upstream on not, or
- Scope 2 emissions to include emissions associated with fuels used which have been subject to upstream emissions acquittal (as in the case of liquid fuels).

This issue will need to be clarified quickly and addressed in possible changes to NGERS reporting requirements so that there are not different reporting requirements for NGERS and the CPRS.

It is AIP's view that <u>all</u> entities having a liquid fuel liability should be required to submit emissions reports assured by an accredited third party, not just larger emitters/liable parties (see the Green Paper preferred position 5.10). This approach is not expected to lead to additional effort or 'red-tape' for smaller companies as all companies who have an upstream liquid fuels liability will have had financial audits and ATO audits covering their excise remittance data and reporting. In this context, AIP believes it is essential for the results of these excise related audits to be recognised by any other party brought in (either by the liable entity or the CPRS Regulator) to assure the remainder of the data submitted to the CPRS Regulator.

In line with the positions set out in the Green Paper preferred position 5.6&7 about advance warning on changes to measurement methodologies, it will be essential that there is a clear statement regarding advance consultation on methodology changes to measurement of liquid fuel volumes and emissions factors, as well as any arrangements that might apply to methodologies for measurement of emissions from fugitive emissions from refinery gas streams and flares.

Taxation and Accounting (Green Paper Chapter 11)

AIP strongly encourages the Government to clarify the taxation treatment of emissions permits to the maximum extent.

AIP also strongly urges the Government to seek an urgent resolution of the accounting standards treatment of emissions permits to ensure sound and consistent approaches are adopted in relation to the treatment of permits in corporate financial reports.