Wendy Craik,

Presiding Commissioner
Inquiry into Wheat Export Marketing Arrangements
Productivity Commission
Locked Bag 2, Collins St. East, Melbourne, VIC 8003 Australia

Email: wheatexport@pc.gov.au

18 June 2010

Dear Ms Craik,

As you are aware, we have previously lodged submissions and participated in public hearing in relation to the current Inquiry into Wheat Marketing Arrangements and we hope that you will accept the attached further supplementary submission which contains further thoughts on the needs of our industry to assist with progression to a fully market focussed and responsive state.

We have been in discussions with other major industry bodies, including the Australian Grain Exporters Association (AGEA), Grain Trade Australia (GTA) and the Grains Research and Development Corporation (GRDC), in relation to the ideas contained within our submission paper. We believe that the potential exists for these ideas to be adopted as part of the structural reforms for our evolving industry, which will create the whole of value chain approach that is required for a successful future industry. In order to achieve this though, we also need to have an ongoing Government partnership to develop the appropriate legislative instruments that will enshrine the necessary institutional arrangements, and to provide support for the industry to effectively make the necessary transition to self management and funding.

We would be more than pleased to discuss our submission with you if time permits.

Yours sincerely,

Peter Flottmann

Chief Executive Officer

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Backing a Globally Competitive Wheat Industry

Australian Wheat Industry Services discussion paper for the Productivity Commission Inquiry into Wheat Marketing Arrangements

The GGA Group

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1. Executive Summary

1.1 Background

Grain Growers Association Ltd (GGA) is a unique not-for-profit, member based, industry company operating for the promotion and development of agricultural resources in Australia. GGA has approximately 17,000 members, the majority of whom are active producers in the grains industry.

Following the development of its 5 year strategic plan "New Horizons" in September 2008, GGA has undergone fundamental change. GGA has acquired three businesses over the last 18 months that provide a substantial industry platform with expertise covering the supply chain including: grain and grain foods analytical services, research, product development and technical support in the milling and baking industries, informatics, geospatial data gathering and predictive tools, farm technology testing and assessment and publishing.

GGA is now a group of companies with over 70 employees with a vision to become a leading provider of information based products and services that measurably improve the performance of the Australian grains industry.

2. Industry Environment

The wheat industry is at a critical juncture in determining how it will operate in the future. The Productivity Commission Draft Report has identified the industry is still in a state of early transition post deregulation and appropriate market behaviours have not yet become institutionalised. While much of this might be expected given the highly regulated nature of the wheat industry historically, it is our view that the Productivity Commission Review has underestimated the capacity of the industry to resolve appropriate industry support structures in the short to medium term. Further, there is the potential for unintended consequences in the balance of market power as the industry matures unless there is appropriate support.

We believe this process cannot be left to chance and must be supported with continuing, albeit refocussed, Government direction and transitional financial support in order for the industry to ultimately fulfil its future potential.

3. Industry Services

In our view, the wheat industry will require continuing transitional Government support for a programme of targeted initiatives that will enable the wheat industry to achieve an enhanced level of performance and maturity over the next 5 years and put in place appropriate continuing industry funding mechanisms to support the industry to develop into a quality and market focused industry.

The key areas that the industry will need transitional funding include:

- Trade Data/supply and demand information (in conjunction with ABS/ABARE)
- Seasonal data/crop quality information and systems
- Macro data/consumer trend analysis/commercial performance

- Trade policy analytics
- Wheat Classification
- Certification Services
- Education and Training (technical/capacity building)

GGA has consulted with the Australian Grain Exporters Association (AGEA), Grain Trade Australia (GTA) and GRDC, regarding the provision of such services within a virtual industry services model where the services can be provided by existing industry bodies controlled through a high level services agreement.

3.1 Funding Options

We have considered a range of funding options in developing this concept including re-direction of and/or amendments to current industry levies and direct funding. In a number of cases these options are problematic from a legislative and timing perspective. Accordingly we believe the most appropriate and effective approach is for Government funds to be provided on a transitional basis via GRDC under instruction from the Minister. Funding via GRDC would provide existing accountability and probity frameworks for the utilisation of funds with Government performance criteria set at levels that encourage industry transition to a new model.

4. GGA Recommendations

1. That Government provide transitional support for the next 5 years to be directed towards specific industry development projects as outlined in this paper.
2. That the Wheat Marketing Act 2008 be repealed and replaced with a new instrument which delivers
    a. Compulsory wheat industry information collection and dissemination to ensure an efficient and transparent marketplace inclusive of information about customer (domestic and export) satisfaction and the commercial performance of Australian wheat.
    b. The capacity for the Minister to impose a wheat product integrity programme to underpin the industry`s developing self regulatory process.
    c. The capacity for the Minister to undertake such other measures as are required to ensure a balanced, efficient and transparent wheat industry. Ie the creation of sufficient competitive tension across the industry to ensure that all facets of the industry have appropriate competitive strength in terms of information and capacity to negotiate appropriate commercial outcomes that encourage the industry to add value across the supply chain.
    d. Maintenance of appropriate powers in relation to trade practices, storage and freight logistics and port access to ensure that the total capacity of the industry is available to competition and not only surplus capacity.
    e. Potential provision of a Wheat Industry Services Levy to be applied to all wheat produced to fund necessary industry services.
3. That in the longer term (post 5 years) the industry should be expected to transition to a largely industry funded model including a Wheat Industry Services Levy.

5. What is GGA responding to?

Key points

- ***The Productivity Commission Draft Report has identified the industry is still in a state of early transition post deregulation and appropriate market behaviours have not yet become institutionalised.***
- ***The Productivity Commission Review has underestimated the capacity of the industry to resolve appropriate industry support structures in the short to medium term.***
- ***There is the potential for unintended consequences in the balance of market power as the industry matures.***
- ***A need to ensure that there is value uplift for the industry overall and the wheat industry`s contribution to national GDP.***

5.1 Productivity Commission Draft Report

The Productivity Commission is currently investigating Wheat Marketing Arrangements as required by the Government in relation the Wheat Marketing Act 2008. The draft commendations of the Inquiry are essentially:

1. Wheat Export Accreditation Scheme abolished on 30 September 2011
2. Repeal of regulation 9AAA of the Customs (Prohibited Exports) Regulations 1958
3. Wheat Exports Australia abolished on 30 September 2011
4. Wheat Export Charge abolished on 30 September 2011
5. The current “access test” under the Wheat Marketing Act 2008 potentially abolished on 30 September 2014
6. From 1 October 2014 access matters be dealt with by the National Access Regime of the Trade Practices Act.
7. Undertake a review of the National Access Regime (TPA) to commence no later than 31 December 2011.
8. Shipping stems and port access protocols to continue to be published irrespective of the access test arrangements post 2014, supplemented by a voluntary code of conduct.
9. Amend the Wheat Marketing Act (or some other instrument) to ensure port operators face sanctions if they fail to meet access test requirements between 1 October 2011 and 30 September 2014, and require the continued publishing of shipping stems and port access protocols from 1 October 2014.
10. Potential abolition of regulations on access to grain rail networks
11. ABS and ABARE to continue to provide “core” wheat market information funded by Government, but that industry pay for information above the “core” level.
12. All other industry good functions other than trade negotiation be conducted and funded by industry.

The consequence of the current draft recommendations of the Productivity Commission Inquiry into Wheat Marketing Arrangements is further structural reform of the wheat industry. This cannot be left to chance or create greater uncertainty within the industry, particularly given the likely electoral cycle over the coming year.

Our view is that if the Draft Recommendations were to be accepted it would mean that a large proportion of the Wheat Marketing Act would become redundant and need to be repealed, an instance that would perhaps be best handled by the repeal of the entire Act and a new Act put in its place, reflecting the required powers and features to operate an efficient and transparent wheat market.

The Productivity Commission Draft Report has correctly identified the industry is still in a state of early transition post deregulation and appropriate market behaviours have not yet become institutionalised. In doing so we believe that the Commission has at the same time severely underestimated the collective capacity of the industry at this stage of its maturity to satisfactorily address a range of issues which would ensure that there are the right levels of "competitive tension" in the market place ie a level of market balance that creates and sustains value both for the industry and the national interest. In respect of Industry good functions the Commission notes that while achieving industry co-operation in this area might be difficult there is no case for Government intervention on the basis that predominantly, industry good functions are for the explicit private benefit of the industry. We would argue that at this stage of the industry`s development there is a significant risk of industry ***under-investment*** in these areas largely as a result of a still maturing competitive environment and the lack of a co-ordinated cross-industry process.

5.2 Market Failure

The Inquiry identified many areas where spill over and free rider issues exist, particularly related to industry information systems, however we would like to add further comments on aspects of market failure within the industry at present. In doing so, it should be recognised that market failure is not only about the non-provision of goods and services but also about their under provision, which is also inefficient and a waste of resources from both an industry point of view and, importantly, from society's point of view more widely.

In 2007 GGA also commissioned 2 reports in relation to the provision of industry good functions. These reports are commercial in confidence and have not been publicly released. These were:

- "Market Failure and Public Goods in the Australian Grains Industry" by Emeritus Professor Gordon MacAulay of BRI; and
- "Australian Wheat Market Industry Services Analysis" by ACIL Tasman

We have drawn on both these reports as useful background in consideration of the issue of market failure in the grains industry but more importantly how industry may resolve these market failure issues.

6. Funding Options

Key points

- ***Any further Government funding must be directed towards the growth of the industry ("three horizons of industry")***

- ***A number of scenarios including redirection of existing industry levies and direct funds from other entities have been contemplated - most of these are problematic and require legislative amendment***
- ***Most practical way for Govt funds to be brought in on a transitional basis is via GRDC under instruction from the Minister***
- ***This can either be an allocation of existing GRDC funds and /or a combination of new funds from consolidated revenue***
- ***Funding via GRDC would provide existing accountability and probity frameworks for the utilisation of funds with Government performance criteria set at levels that encourage industry transition to a new model.***

Government Funding to date post deregulation

Along with the establishment of the bulk export accreditation process under the Wheat Marketing Act, the Government also put in place the Transitional assistance package1 and directed GRDC to establish the Wheat Classification Council to set the classification guidelines. These guidelines complement the receival standards established through Grain Trade Australia. This directive based pathway is also used in other areas such as the Climate Change Research Programme where Government has directed funds to be channelled via R&D Corporations to preferred research service providers.

The Australian Government has committed approximately $8.3 million over three years to assist the wheat industry with its transition to the deregulated exporting arrangements. Government has provided funding assistance in the following areas:

Group	Activity	Funds
Grain Trade Australia	The development and promotion of a grain industry code of conduct	$0.069 million
Australian Competition and Consumer Commission	Development and approval by the of the access undertakings by providers of port terminal services that sought accreditation to be exporters	$1.5 million
Department of Agriculture, Fisheries and Forestry (DAFF)	Facilitation of information sessions for growers, by the, about the wheat marketing arrangements and how to manage their businesses in this environment.	$0.523 million

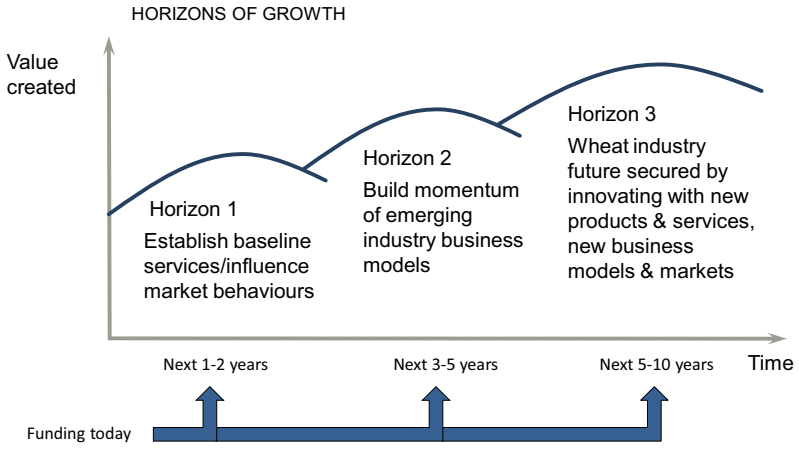
1 Productivity Commission review of Wheat Marketing Arrangements 2010

Group (Cont...)	Activity(Cont...)	Funds (Cont...)
ABS and ABARE	The provision of monthly statistics by the on wheat production, exports and stocks	ABS $3.38 million and ABARE $0.45 million
DAFF	Wheat Export Technical Market Support Grants Program to assist new and small scale exporters to develop innovative export ideas	$0.536 million
Wheat Exports Australia	Assistance to ensure that it could operate effectively during the introduction of the accreditation scheme	$1.1 million
DAFF	Legal costs incurred by during the implementation phase to 30 June 2008	$0.8 million

Funding Criteria

Our view is that continued transitional funding is critical to enable the industry to develop appropriate structures and services. It must be directed towards activities that demonstrably add value to the industry value chain whilst not intervening in the ordinary course of a competitive industry. It is also our view that any funding must be targeted towards ensuring growth against three strategic horizons for the industry and there are agreed performance hurdles to access funding. This should also include an agreed exit strategy for Government support.

Funding today must address the three horizons of industry growth



Funding General Commentary

The Government`s Levy Principles and Guidelines document sets out the process for justification of a levy. This is a lengthy and onerous process which would not be completed within the timeframe envisaged by the Inquiry recommendations.

The Inquiry draft report (Chapter 7) also discusses in depth the nature of market failure and justification of a framework for Government investment. While often the Commission found it difficult to justify continued Government investment in the current programmes, it also noted in some other areas that that continued investment was justified. The most notable of these was the continuation of the national scale stocks and use reports.

The Commission then goes on to discuss the justification for an industry levy to fund other provision of information where industry should pay but where a private mechanism is not appropriate or available[2].

In this case the Inquiry indicated that ***The Commission notes that under the current arrangements, wheat growers are required to pay a production levy to the GRDC, and wheat exporters are required to pay the Wheat Export Charge (WEC) to the Department of Agriculture, Fisheries and Forestry's Levies Revenue Service (chapter 4). In both cases, these levies are compulsory and are supported by appropriate legislative instruments (the Primary Industries Levies and Charges Collection Act 1991, the Primary Industries (Customs) Charges Act 1999, the National Residue Survey (Excise) Levy Act 1998, and associated legislation) (DAFF 2010). As set out in chapter 4, the Commission recommends that WEA be abolished in 2011. The industry could voluntarily decide to continue collecting the WEC and use this revenue to fund the ABS stocks information. However, the WEC is only levied on wheat exporters — this is not consistent with the beneficiary pays principle, given the value of stocks information to the domestic wheat market.***

The Commission considers that grower levy contributions to the GRDC provide an appropriate revenue source for funding the provision of stocks information by state, on behalf of the industry. This would ensure that the entire wheat industry pays for this information, and would remove the costs and challenges associated with legislating and administering any new, compulsory levy mechanism.

The Commission understands that the GRDC is able to use revenue from industry contributions for this purpose.

2 Draft report p252

7. Appendix 1: Excerpts from BRI Report - Market Failure and Public Goods in the Australian Grains Industry. 2007

Market failure3 arises when the price of goods and services do not reflect the true costs of producing and consuming those goods and services, that is, markets work inefficiently (Decanio 2007). There are three broad causes of market failure: first, the many forms of imperfect competition or monopolisation; second, is the effect of decisions having external effects or consequences; and third, is the nature of the goods and services themselves such as involving high transactions costs or problems of inadequate information (Wikipedia 2007a).

Public goods are essentially a reflection of market failure. First, it is important to distinguish between "public goods" (or services) as defined by economists and to consider them as being quite distinct from something being a "public benefit" in the sense that it is something that should be done for the "public good". The first view reflects the characteristics of a good or service while the second is a reflection of the worth of an action in terms of costs and benefits.

The modern definition of a public good is a good that is non-rival and non-excludable (Table 1). It is also possible to have public "bads". The implication of being non-rival is that the consumption of a good by one person does not reduce the consumption of that good by any other person. Secondly, non-excludable implies that no person can be effectively excluded from using the good. It is not possible to exclude people from using a pure public good and one person's use has no effect on the use by others. In general, there are relatively few pure public goods and the division between the categories is not usually clear cut. There is a graduation from one set of characteristics to another and therefore the term "quasi-public goods" is sometimes used. This is more clearly represented in Figure 1. A quasi-public good is one in which the cost of providing the good increases less than proportionately with the number who benefit from it and there are some difficulties in excluding those who do not pay from benefiting from the good (McKain 2005).

3 Market Failure and Public Goods in the Australian Grains Industry. BRI 2007

Table 1: Private and public goods

	Excludable	Non-excludable
Rivalrous	**Private goods** Food, clothing, toys, furniture, cars Bread, cakes, flour, wheat, tractors, private land	**Common pool resources/common good** water, fish, hunting game Underground water, public roads, piped city water supply, electricity supply grid
Non rivalrous	**Club goods** Cable television, tollways, golf course Agronomic or crop publications, internet distributed information with passwords, research produced by research clubs (eg SA Grain Industry Trust Fund), voluntary industry associations for lobbying, NACMA in provision of common terms of trade, National Grower Register with membership cards and organisation fees, etc.	**Public goods** National defence, free-to-air television, clean air, light from a lighthouse Radio broadcast weather and crop forecast information, legal framework for trade, public policies provided by grains organisations

Source: Wikipedia, see Public Goods. Accessed on 16 November 2007 at: http://en.wikipedia.org/wiki/Public_good with use of agricultural illustrations added

There is a third characteristic of public goods which relates to the size of the group affected by the goods benefits (Cornes and Sandler 1986, p. 24). When the benefits involve a small group such as a local park then they are called local public goods. Often the political jurisdiction is seen as the boundary such as state, national or international. It is also true that the boundaries for the provision may differ from the boundaries for the receipt of the benefit and in this case there are "spillovers" from one area or jurisdiction to another. The development and management of a set of quality standards for grain might be paid for by one dominant company but they are used by all companies so that there are spillover benefits to the other companies. It is likely, however, that there will be under provision and policing of the standards and this is predicted since the beneficiaries differ from those providing the goods. This is essentially the problem of "free riding" or as more precisely termed "easy riding" since it may not be completely free.

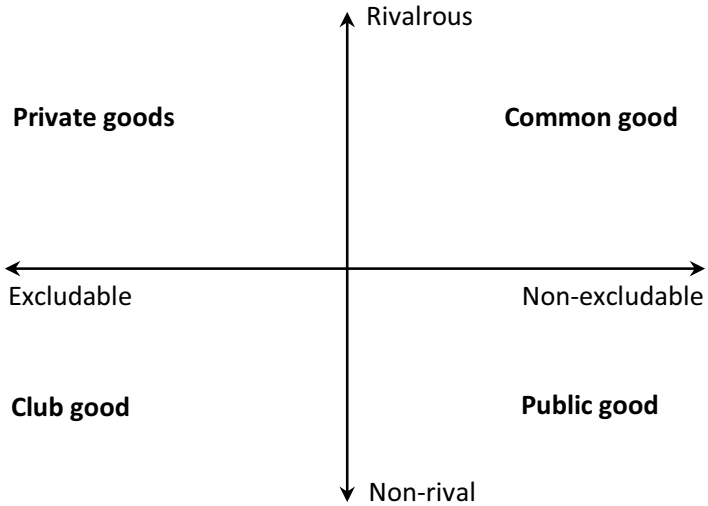


Figure 1 Public and private goods and their characteristics

Finally, there is no absolute classification of public goods through to private goods over time. For example, the essential difference between a pure public good and a club good is the excludability characteristic. This might be called the "fence property". In one way or another it is possible to put a fence around the access to the benefits to exclude possible users who want to easy ride. With the pure public good there is complete free riding as a fence is not possible. The ability to exclude potential users permits the charging of tolls or user fees and membership fees so that individuals are forced to express their preferences and thus it is possible to avoid the easy riding problem. Thus the invention of exclusion mechanisms becomes an important issue in moving pure public goods into the category of club goods. This is a very rich area for cooperation between scientists, economists and sociologists in creating mechanisms to deal with both public goods and public "bads" such as pollution of various kinds. Technological advances are very important in moving public goods to club goods through such techniques as access cards, sophisticated parking ticket dispensers, password systems, electronic tollways, etc. Clever access and incentive systems can be designed to allow for the charging for goods and services which might otherwise never be produced if no charge could be made.

7.1 Market Failures, Agricultural Organisations and Collective Action

A real question for the grains sector is what is the nature of any intrinsic market failures that occur in the sector? Are they only able to be dealt with collectively and is there a need for other institutional and technological changes before the services can be provided by the private sector? Market failure occurs when some of the costs or benefits from a transaction are not or cannot be fully reflected in the market price. The problem arises because decisions based on such prices will not be the efficient decisions in the sense that either "too much" or "too little" of the good will be produced.

Fundamentally, all market failures can be corrected with the appropriate definition of property rights. Ideally, property rights need to be (Randall 1981, p.148):

a. A completely specified set of rights of ownership;
b. Exclusive so all rewards and penalties accrue to the owner;
c. Transferable so the rights are able to be used in their highest-value use; and
d. Enforceable and enforced.

However, it can be very expensive to define and defend property rights and to have markets associated with them which function effectively. In this case, the transactions costs are simply too high and the cost benefit calculations are such that it either requires collective action or government intervention to resolve the market failure. Transactions costs include not only the direct costs of trading a good or service but also the costs of the legal structures, the costs of defining and defending the property rights and the market information costs. One way to think about such an issue is with the classic supply and demand diagram in which the supply and demand curves do not intersect so there is no market outcome. In this case, the transactions costs of implementing a market are too high for it to exist. In such an environment, "parallel markets" might be created, such as in the case of tradeable fishing permits or tradeable water licences where there is a total allowable catch or a total water allocation to be distributed across users. In this way, the actual transaction costs can be kept low. This also highlights the need to use only a minimum of regulation and control for such markets to keep the transaction costs as low as possible. In fact, policies designed to reduce transactions costs can be very effective means of having markets work well (for example, reducing the costs of transacting land would raise the efficiency of the land market and thereby benefit agriculture and probably society as a whole). The efficiency of a market can be tested against the concept of Pareto efficiency which means that the market is efficient if it is impossible to reallocate goods or resources so as to make one person better off without making another worse off.

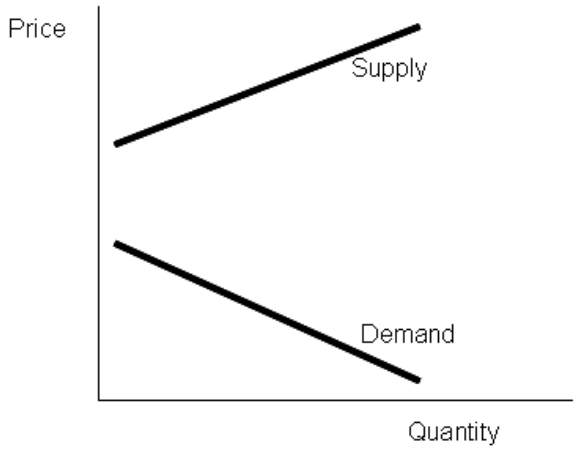


Figure 2: Market failure as a result of high transaction costs

Source: Godden (1997).

There is a considerable range of reasons why market failures can occur and more specifically why they might occur in the grains industries. Some of the key reasons are considered, in turn, below.

a) Natural monopoly

An industry is said to be a natural monopoly if one firm can produce for the entire market at a lower social cost than two or more firms. This does not mean that there is only one firm producing the goods or services, rather this is an observation about the nature of the cost curves for the firms in the industry and the technologies that are being used or could potentially be used. If more than one firm is producing the goods or services then they are likely to be doing so at a higher cost than one firm would be able to do.

The essential reason for the existence of a natural monopoly is very high fixed costs to enter the industry and usually very low marginal costs for each extra unit of output. In industries for which there is no tendency toward natural monopoly there is usually a declining marginal cost as a firm becomes larger and then at some point the marginal cost rises again as there are difficulties in becoming larger. Thus, there is an optimal size of firm and this optimal size is generally much smaller than the market available to it. In a natural monopoly, with high fixed costs and relatively small and more or less constant marginal costs the average costs keep declining over very large sizes. It is thus possible to keep reducing costs by spreading the total costs over larger and larger volumes of business.

In the grains industry, there are large costs of entry to many of the components of the industry, such as handling, transport and storage and international marketing, but clearly not to all parts of the sector. There are also significant economies of scale and scope which are discussed below.

b) Economies of Scale and Scope

Economies of scale occur when with a given percentage and proportionate increase in the inputs used for the production of goods there is a more than the equal percentage increase in the volume of output. Considered another way it is the situation where output increases faster than costs (Coble-Noble 2005, p. 21). Economies of scope occur when the cost of producing two outputs jointly is less than producing them individually and separately (Panzar and Willig 1981). This means that there is a degree of complementarity in the production of the outputs. It is also appropriate to recognise that production in this sense is a very broad concept and covers areas such as the production of handling, transport and storage services as well as the production of information and promotion and market development.

For the Royal Commission into Grain Storage, Handling and Transport (1988), estimates were made of the economies of scale and scope for some parts of the grain handling system. Many of the cost curves for the ports and receival sites continued to decline over all the volumes of grain handled in these various sites. Thus, it is not surprising to conclude that there is likely to be only a few firms dealing with grains and that they will operate across a variety of grains and a wide variety of services. The continuously declining costs is likely to be enhanced with the modern capacity to handle large volumes of data and convert them into decision making information to enhance the capacity of management to deal with larger and larger operations.

c) Quasi Public Goods

Quasi-public goods represent a middle ground between private goods and public goods. For pure public goods the cost of providing the good does not change with the number of people who use it. In the case of a private good this cost changes directly with the number of people that use it. Also, for a public good it is not possible to exclude from the benefit of the good those that do not pay for it. In the case of the quasi-public good it is possible to exclude people who do not pay for it but usually this is with some difficulty. Also, the cost of providing or using the good may increase less than proportionately to the number of people who benefit from it. These goods represent the two categories of common goods and club goods and the degree of "publicness" can vary. The greater the degree of "publicness" the greater is the incentive problem for either producing too little or using too much.

One of the broad areas of interest of organisations such as the Grain Growers Association is in the provision of information. Information, in its various forms, has an important set of characteristics. It is usually seen as a quasi-public good. Information is generally carried by some medium and it is the public good nature of the medium which is important. Information in the form of newspapers, books, pamphlets and other paper-based information carriers are generally excludable, usually up to its first use, after which the producer loses control. Also, paper-based information can be repeatedly used by a reasonably large number of people before deteriorating but eventually it will wear out—that is, it is to a degree non-rivalrous. Information on the web is excludable through password control and locking devices but once accessed it is difficult to manage repeated use and subsequent publication. Free-to-air radio and television are carried by radio signals which can be accessed free of charge. Additional listeners or viewers make no difference to the use of other users so again, it is non-rivalrous. Without either public support, as in the case of the Australian Broadcasting Corporation, or the financial benefits from advertising, radio and television would be unlikely to be produced.

The advertising funding commercial television is rather like the “lamp post effect” where the person or firm who funds the light gains a benefit but also passersby gain a benefit. In this case it is not possible to exclude all beneficiaries and the costs of doing so may be too high or technically impossible with the current technology.

First, it may be that providing information to the members of the Grain Growers Association will bring benefit to the members but excluding those benefits from non-members will be too costly. Thus, a cost-benefit calculation needs to be done to see that the potential perceived benefits to members are greater than the costs of producing the information. Second, because of the quasi-good nature of information various levels of cost recovery can be made and various levels of exclusion are possible. Thus, government provision is not necessary but some form of collective provision may be needed if the data on which information is based is costly to collect and requires co-ordination and expertise to analyse and place into a distribution medium.

The value of information is related to the degree of surprise which its use generates. It is also related to the outcome of choices made in uncertain situations. One can compare situations where the value of an outcome is different with information compared to the situation without the information after taking into account the cost of obtaining the information. Calculation of the value of information is usually quite difficult and so there is a degree of uncertainty around the calculation of such values making cost-benefit calculations a challenging exercise.

In the context of a small number of large organisations dominating the handling, distribution and marketing functions in the grains industry the availability of certain types of information may be restricted because of its value to such organisations and the costs incurred if other organisations obtain a strategic advantage out of use of such information. Information such as the level of stocks of various types of grains, information on prices obtained from exports and information on grain purchases may all be seen as commercially sensitive information. The collection and disclosure of such information may be very valuable to producers, traders and international customers but would not be made available unless it were to be collected and collated by a third party with a specific purpose of dealing in this information and possibly with the legislated power to collect and publish it (albeit, with identification suppressed). The difficulty in this case is that market concentration is enabling organisations to gain control over the use of information that would be available in a more competitive environment where transparency of market outcomes are greater.

d) Horse race effects

The discussion above has provided arguments as to why markets may not provide ideal levels of information products for an efficient economic outcome. However, there may be situations where there is too much effort allocated. One case for this is where the first person to achieve a result gets the reward (or the ‘prize’). Bidding for research grants or spending on plant breeding are cases in point. There is thus a ‘horse race’ set up in which the winner takes all (McCain 2005). Economists have shown that in winner-take-all markets that there is a tendency to take the development costs, or the costs of winning the race, beyond the point where the benefits equal the costs. Setting up sensible limits on effort expenditure such as preliminary grant applications, multiple awards, limits on the size of applications and other effort expenditure limiting activities all help to make sure that that not too much effort is expended. In the case of research activities the value of the ‘horse race’ is to ensure the best grants are funded. Such ‘races’ might be set up as a means of encouraging information generation and its public provision.

e) Network effects

Network effects arise from the standardisation of the good so that there are reduced costs to consumers of the good by having various forms of standardisation. Examples include computer operating systems, telephone networks, road rules, safety standards, etc. In the grains industry trading standards, grade and variety definitions and common terminologies all provide illustrations of network effects. Many of the benefits of these standards are obtained by creating a monopoly over the development of the standards. This may be collectively agreed or imposed by legislation. Where there are considerable gains to be made from such network agreements commercial organisations may see it in their self-interest to create them. An example in the grains industry is NACMA / GTA. In other cases, the benefits to the private firms may be less clear but be of benefit to producers or consumers with less capacity to organise the agreements. In this case, benefits of maintaining grade and variety selection rules for members of the Grain Growers Association may be sufficient to warrant collective provision. This involves a cost-benefit calculation.

8. Appendix 2: Excerpt from ACIL Tasman report - Australian Wheat Market Industry Services Analysis. 2007

8.1 Distortions from other policies

The prices received, and paid, by grain producers can be distorted by the industry's own interventions, or the policies of Australian or overseas governments. Approaches to addressing these distortions will depend upon their nature and extent, and the options available. Encouraging and supporting government negotiations for freer market access to overseas markets — that is, reducing the distortions caused by government intervention overseas — has been an important issue in this regard.

8.2 What should the wheat industry do?

Industry good services improve the capacity of one region or country to compete with wheat from another region or country. Their distinguishing feature is that the benefits are spread across the industry, regardless of who invested in creating them and those benefits cannot be captured in sufficient value by any one individual or firm to justify the investment. They are a typical illustration of market failure and therefore may justify industry-wide involvement, with a compulsory levy on wheat sales or public (taxpayer) funding.

The more important wheat industry good services carried out in Australia and in the major wheat producing countries, with which Australia competes, are:

- crop quality monitoring and reporting
- international promotion
- technical support
- classification, standards and quality assurance
- trade advocacy and agreements
- research and development.

8.3 Monitoring, evaluation and correction of market failures in trade development

While there will be strong incentives for private interests to technically support and market Australian wheat, there may be occasions where there is underinvestment. It is likely that the underinvestment will be sporadic rather than consistent, and it will need to be assessed on a case by case basis. This is the basis on which many of the Rural Research and Development Corporations (RDCs) establish their marketing activities.

Examples of where underinvestment may occur in market access and development include:

- training of millers in the use of Australian wheats, as millers can apply these skills to a range of Australian wheat and are not committed to purchasing from one supplier
- providing technical support and specialist industry knowledge to trade negotiators
- developing processing techniques that are applicable to a range of Australian wheat types, such as rapid dough techniques
- providing medium and long term market intelligence to the public research sector
- bio-security
- training customers in the most effective and efficient means of storing and handling Australian grain

- many activities under this theme may be conducted in cooperation with a number of commercial players who require an independent facilitator of the investment. An example of this may be the development of new processing technologies that a group of small traders may not have the capacity to undertake individually, but collectively they could
- any organisation undertaking a role such as this requires a clear framework for making the investment, to ensure it acts only where there is a high likelihood of market failure . If the need for collective action is identified, the organisation will need to identify what is the most appropriate response.

8.4 Building industry capacity

To be able to technically support Australian wheat in the manner described in the preceding section, any new organisation will need access to highly skilled grain industry scientists and technicians. This will also be the case for the rest of industry, which is unlikely to have the incentive to invest in this area.

There are two reasons why industry may not invest in human capacity in the grains industry:

- Human capital is largely non-excludable, that is scientists and technicians are largely free to work for whom they choose, unless they are bound by long-term contracts, which are not common.
- Many companies, all but the largest, do not have the financial capacity to make such long term investments, particularly when there is no certainty of capturing the returns.

Thus there is likely to be significant underinvestment in grain industry skills and technical capacity. To correct this, investments need to be made to establish grain technology courses, and attract students in grain science and technology careers.

Examples of activities in this area include:

- the establishment of post graduate grain science and technology scholarships
- the establishment of a dedicated place for grain science and technology undergraduate and post graduate lecturers and supervisors, in major Australian universities
- the production of a number of vocational courses and associated material for the grain industry and international customers
- the vocational material and courses could build on the work of the Value added wheat CRC Products and Processing program, which is described in Box 1.

Box 1 **Value added wheat CRC: Products and Processing program**

Aims of the Wheat CRC processing program:

- Optimise wheat processing consistency and performance, based on milling performance, dough strength, extensibility, waxy starch characteristics, A and B starch granule ratio, and water absorption, using molecular understanding and small scale tools for blending.
- Strategic blending know-how, to enable value addition to wheat grades, and to predict the processing behaviour of wheat blends.
- Develop and roll out an automated process control system for bakeries, resulting in more consistent products at minimum cost, and model optimisation of Australian biscuit manufacture by correlating processing conditions with raw material specifications and product outcomes.

- Identification and availability of, and quality tests for key wheat quality characteristics suitable for the sponge and dough process in Asia.
- Develop cost-effective alternative strategies for chlorine treatment of cake flours for immediate uptake on the domestic market and "clean" product export opportunities.
- Assessment and process specifications on microbiological safety of noodles and steamed breads, and toxicological safety of bread crumb products, to guide HACCP-based QA in the food industry.
- Develop methods for modifying gluten to give it properties suitable for incorporation into a wider range of products
- Determine desirable wheat characteristics for starch / gluten manufacture, and for breakfast cereal production.
- Extend shelf life of baked goods and develop a predictive modelling tool for microbial safety of modified atmosphere-packaged baked goods.
- Develop wheats with a high amylose content, and carry out related nutritional and biochemical studies.

Data source: Value Added Wheat CRC

8.5 Provision of grains industry information to enhance competition

There are considerable incentives for the Australian grains industry to continue, and even accelerate, the pace of consolidation in a contestable wheat market. This consolidation will unlock considerable scale and scope economies which, if the market is competitive, growers will benefit from in the form of lower supply chain costs and improved services.

To benefit from this consolidation, growers need to ensure that a natural oligopoly or monopoly in respect to information provision emerges unchecked. To ensure that the market remains competitive, a detailed range of information on prices, supply chain costs, wheat supply and demand, will need to be readily available to all participants. The provision of this information will ensure that the market remains transparent, small to medium sized operators are competitive, and there are lower barriers to entry for new entrants.

The broad areas of information that will need to be collected to ensure market transparency, can be summarised as:

- opening stocks
- sources of grain (total supply)
- disappearance (total demand)
- implied ending stocks.

Opening stocks are the stocks held in store at the beginning of the reporting period. This would include grain held in the bulk handling system, buyers' stores, growers' stores and stock in transit. Much of this information is currently not collected and/or not publicly available.
There is considerable concern about the commercial sensitivity of this information, and it is at present, for good reason, closely guarded by the bulk handling companies. Grower stock information is not collected in any systematic or consistent way.

If any of the bulk handling companies released this information individually, it would be costly, as they would lose a competitive advantage. However, if all companies voluntarily released the information anonymously (or were compelled to), it is likely that any competitive disadvantage would be offset by all players knowing the stock situation across the country. If there is mutual gain in providing the information, bulk handling companies, buyers and sellers may be inclined to collaborate and provide the information to a trusted source.

Total sources information is the production of grain; it would include statistics (depending on the stage of the season) such as:

- planting intention and actual sowing area
- crop condition and moisture profiles
- seasonal outlooks
- harvest statistics.

This information is being collected by ABARE and several commercial providers. GGA could include, and add to, this information as part of a package of grain industry statistics.

Total demand information would include:

- export statistics and stock in transit data
- likely demand from major markets
- livestock on feed data
- domestic flour market demand
- seed requirements for the following crop.

Once all of this information is collected, an ending stock position can be implied. This process could be conducted on a regular basis and published monthly.

In addition to stocks information, transport statistics may also assist smaller traders to compete. Transport information may include:

- shipping capacity and location, container capacity, availability and location
- rail capacity reports and location of rail cars
- road freight costs
- grain freight indexes and differential prices between different transport modes.

Not only is the collation and dissemination of this information likely to increase transparency, it will assist the regulators responsible for competition regulation to be able to ensure firms comply with competition laws.

Some examples of the type of information that could be assembled and published to increase transparency in the grain market, are shown below.

These charts and tables are produced for the Grain Transport Report, a weekly publication from the Transportation and Marketing Programs/Transportation Services Branch of the Agricultural Marketing Service of the USDA.

	Wheat						Corn	Soybeans	Total
Week ending[1]	HRW	SRW	HRS	SWW	DUR	All wheat			
Export Balances									
11/1/2007	4,845	973	2,683	1,443	355	10,300	18,788	7,856	36,944
This week year ago	1,543	456	1,168	1,089	89	4,344	11,552	7,497	23,393
Cumulative exports-marketing year[2]									
2007/08 YTD	6,560	3,685	3,563	1,967	522	16,296	10,534	5,296	32,126
2006/07 YTD	2,348	1,636	2,832	2,048	417	9,281	10,162	6,460	25,903
YTD 2007/08 as % of 2006/07	279	225	126	96	125	176	104	82	124
Last 4 wks as % of same period 2006/07	347	228	255	139	424	259	163	109	164
2006/07 Total	6,800	3,866	6,480	4,996	761	22,902	53,799	30,261	106,962
2005/06 Total	10,459	2,037	7,244	4,159	930	24,828	54,354	25,570	104,752

[1] Current unshipped export sales to date

[2] Shipped export sales to date; new marketing year now in effect for corn and soybeans sales

Note: YTD = year-to-date. Marketing Year: wheat = 6/01-5/31, corn & soybeans = 9/01-8/31

Source: Foreign Agricultural Service/USDA (www.fas.usda.gov)

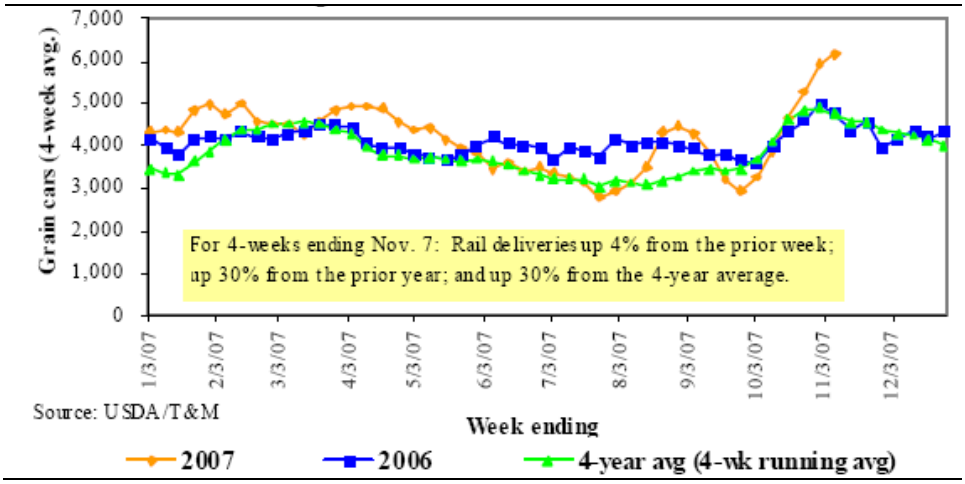
Table 1 **US export balances and cumulative exports (1,000 metric tonnes)**

Data source: USDA AMS 2007

The provision of transport data augments the stocks data, as the market would know not only what is on hand and roughly where it is, but also how, and when, it can be moved to domestic or export customers.

The collection of port transport (road, rail and barge) and up-country statistics in the US, encourages competition between all of these sectors. Up-country operators adjust their prices to retain stocks and through put if grain is flowing out to ports and export markets. If not enough grain is moving through export terminals, export operators and long haul transport modes will drop prices to attract up-country grain.

Chart 1 **Rail grain deliveries to the Pacific Northwest**



Data source: USDA ARS 2007

Table 2 **Grain transport cost indicators**

	Truck	Rail[2]	Barge	Ocean	
Week ending				Gulf	Pacific
11/14/07	230	33	243	514	652
11/07/07	222	55	232	514	660

[1]Indicator: Base year 2000 = 100; Weekly updates include truck = diesel ($/gallon); rail = nearby secondary rail market ($/car); barge = Illinois River barge rate (index = percent of tariff rate); and ocean = routes to Japan ($/metric ton)
[2]The rail indicator is not an index. It is the difference between the nearby secondary rail market bid for this week and the average bid for year 2 (+) 100.
Source: Transportation & Marketing Programs/AMS/USDA

Data source: USDA AMS 2007

Table 3 **Class 1 Rail Carrier Grain Car Bulletin (grain carloads originated)**

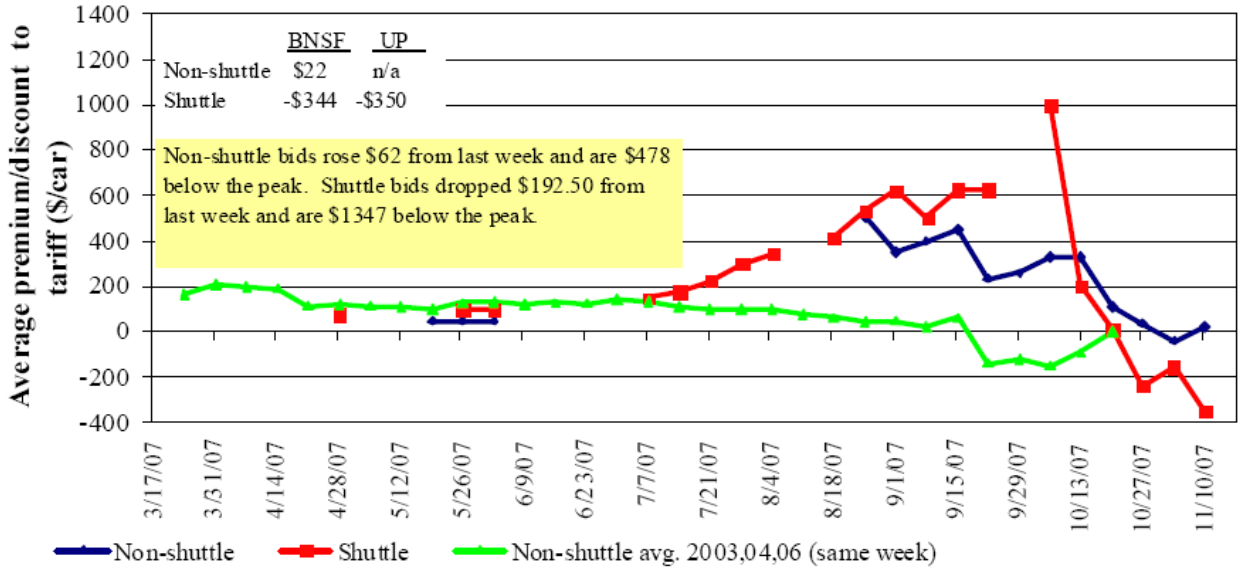
	East		West			U.S. total	Canada	
Week ending	CSXT	NS	BNSF	KCS	UP		CN	CP
11/03/07	3,910	3,751	12,666	802	7,631	28,760	5,731	4,773
This week last year	3,968	3,023	10,084	534	6,575	24,184	5,996	6,243
2007 YTD	122,416	141,185	445,733	28,659	245,230	983,223	211,601	201,924
2006 YTD	138,109	142,787	434,526	24,756	257,923	998,101	217,631	198,019
2007 YTD as % of 2006 YTD	89	99	103	116	95	99	97	102
Last 4 weeks as % of 2006[1]	96	109	123	138	120	116	98	93
Last 4 weeks as % of 3-yr avg.[1]	104	107	128	131	120	119	109	106
Total 2006	164,056	168,819	515,102	28,629	301,197	1,177,803	258,932	238,765

[1]As a percent of the same period in 2005 and the prior 3-year average. YTD = year-to-date.
Source: Association of American Railroads (www.aar.org)

Data source: USDA AMS 2007

The publishing of transport statistics also encourage the development of secondary markets in transport modes in the US. The information in Table 2 and Table 3 help inform the secondary market depicted in Chart 2 below.

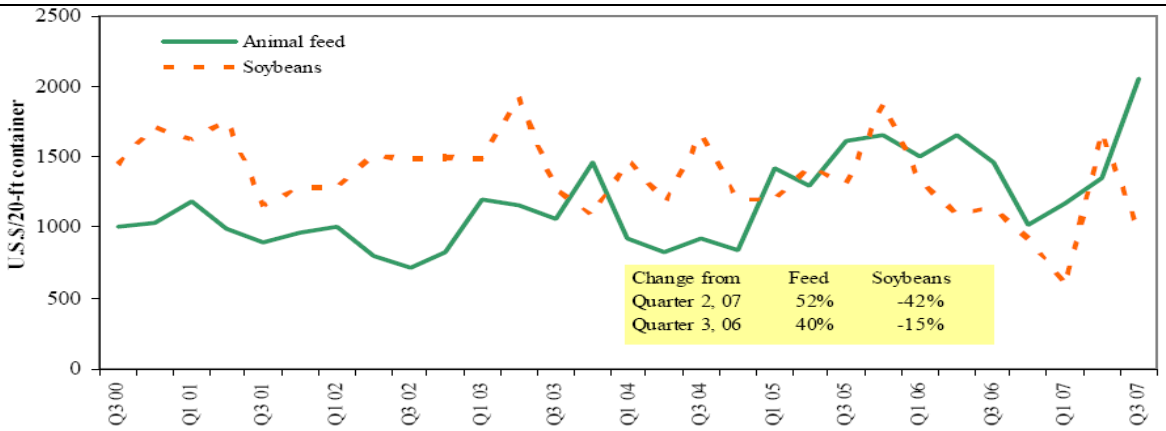
Chart 2 **Bids/offers for railcars to be delivered in November 2007, secondary market**



Excluded 2005 from the 3-year non-shuttle average due to abnormally high rates following Hurricanes Katrina and Rita.
Non-shuttle bids include unit-train and single-car bids. n/a = not available.
Source: Transportation & Marketing Programs/AMS/USDA

Data source: USDA ERS 2007

Chart 3 **Ocean rates for containerised shipments to select Asian countries**



[1]Rates are weighted by shipping line market share and destination country. Rates provided are publicly filed tariff rates, not those negotiated in a confidential service contract.
Countries include: Animal Feed: Bangkok-Thailand (1%), Busan-Korea (30%), Hong Kong (17%), Kaohsiung/Keelung-Taiwan (32%), Tokyo-Japan (20%). Soybeans: Kaohsiung/Keelung-Taiwan (98%), Tokyo-Japan (2%)
Source: Ocean Rate Bulletin, Quarter 3, 2007, Transportation & Marketing Programs/AMS/USDA

Data source: USDA AMS 2007

8.6 The establishment of an independent wheat performance verification service

There appears to be an opportunity to establish an independent wheat performance verification service. At present the National Pool Classification Panel evaluates wheat varieties based on three years of performance within a series of defined geographic zones. Once the wheat has been tested, it is given a final classification, meaning that it is assigned to a particular binning line (the segregation which it is delivered to, and stored in, by the bulk handling company in each geographic zone). These binning lines represent the product actually sold to the customer.

Once classified, the wheat is eligible to be delivered to the binning line it has been assigned to, provided it meets a range of other quality tests conducted at the silo at delivery.

The variety grade the wheat is assigned once classified also establishes which variety pool grade it is eligible to be delivered to. The pool grade establishes the amount the grower will receive for the wheat once the pool grade is sold, less premiums and discounts for other quality traits, such as screenings, protein and moisture. Once again classification only makes the wheat eligible for inclusion in a pool once it has met a range of other quality standards tested for at the silo.

The decoupling of the binning lines and the payment grades was brought about when the Golden Rewards System was introduced by AWB Ltd in 2000.

The National Pool Classification Panel was made up of industry experts, to reduce conflicts of interest with AWB Ltd private trading seed and wheat breeding investments. AWB Ltd provided the secretariat for the panel.

AWB Ltd, as the sole exporter of Australian wheat, established the binning lines to meet the demands of its major customers. AWB Ltd has claimed that it had legislated authority to establish the wheat grades and standards under Section 84(1) of the Wheat Marketing Act 1989, which states that AWB International (AWBI) '*must purchase all wheat that:*

a) is offered to the Company for inclusion in a Pool operated by the Company; and
b) meets the Standards required by the Company.

However, the establishment of wheat grades is more a function of meeting customer demands and reducing transaction costs, rather than meeting the obligations of the Wheat Marketing Act, and is likely to continue where there are multiple buyers and sellers.

Thus there are three components to wheat classification as it currently stands:

1. variety performance, based on three years analysis in a number of geographic zones
2. binning line grades, which are the out-turn (buyer grades)
3. payment grades, related to, but decoupled from, the binning lines following the introduction of the Golden Rewards payment system.
4.

The area of interest for GGA is variety performance evaluation, which is point 1 in the summary above. The second and third points will be negotiated between multiple buyers and sellers in a deregulated wheat market. However, buyers and sellers, through NACMA are likely to establish standard binning lines and payment grades, as is the case with most other grain types sold in Australia.

Like virtually all of NACMA activities, standard binning lines will be adopted by industry on a voluntary basis, with buyers and sellers able to use these standards or develop their own, depending on their circumstances.

For instance, niche traders may use the standard NACMA payment grades as a basis for their contracts and add a range of additional specifications to suit their market. On the other hand, bulk traders are likely to use standard binning lines and payment grades almost exclusively.

It is likely that the standard binning lines and payment grades (excluding Golden Rewards) will continue for the medium term and evolve to meet market needs in the future.

However, NACMA negotiations to standardised binning lines and standard payment grades are likely to require independent variety performance evaluation as part of their negotiations.

Buyers also are likely to seek independent performance analysis of a new wheat variety and regular updates on how the variety performs in different regions, under different seasonal conditions.

Assessing the commercial performance of wheat would involve the collection of representative samples for various grades of wheat in a range of locations and then the application of a variety of tests to these samples. The tests involved include: testing the wheat for protein and moisture, screenings, test weight and falling number. Flour is then produced on a commercial scale pilot mill and tested for elements such as: milling rate, colour, gluten, ash, starch damage, protein and moisture, and the dough tested on the farinograph and the extensograph and for viscosity. This is then followed by product testing, with the commercial scale production of bread in a pilot bakery, the production of noodles and steamed breads and an assessment of their quality. The technical results are then interpreted and detailed performance information provided, that is suitable for both domestic and international customers and also for growers in their planting decisions.

Variety performance evaluation could be established as a commercial activity. Significant investment to establish GGA credentials and independence with international and domestic customers would be required. The BRI could be commissioned to carry out the testing and performance reporting.

The results of these tests could then be used in several ways:

- Breeders and marketers of the wheat could obtain the test results for a fee, to use them to promote the wheat and to independently verify the performance claims they are making.
- Broad benchmark performance information could be provided to members of GGA and subscribers to their information services.
- NACMA may use the information to assist in the establishment and maintenance of variety classification and receival standards.
- The information could also be used by the public R&D community to assist in breeding programs, and general agronomic R&D priority setting and performance evaluation.