



Australian Export Grains Innovation Centre

Australian wheat

Quality, versatility, and reliability

Australian wheat is highly valued for its excellent performance across a wide range of food products, especially noodles and bread.



Department of
Primary Industries and
Regional Development



AEGIC is an initiative of the Western Australian State Government and Grains Australia.

Bright, white and high quality

Australia is a world leader in the production and delivery of clean, dry, white, food safe wheat. Australia has a range of carefully managed wheat classes to meet customer requirements for a wide range of food products, including noodles, breads, cookies, cakes and many more.

Australian wheat is highly regarded by flour millers for:

- Low moisture content
- Low screenings (cleanliness)
- Soundness (high falling numbers)
- White bran coat
- High flour yield with low ash
- Superior noodle colour and colour stability
- Excellent performance in baked products

Wheat class	Protein %	Queensland	New South Wales	Victoria	South Australia	Western Australia
Australian Prime Hard	min. 13	●	●			
Australian Hard	min.11.5	●	●	●	●	●
Australian Premium White	min. 10	●	●	●	●	●
Australian Standard White	N/A	●	●	●	●	●
Australian White Wheat	N/A	●	●	●	●	●
Australian Noodle Wheat	9.5–11.5		●	●		●
Australian Premium White Noodle	10–11.5		●	●		●
Australian Soft*	max. 9.5		●	●	●	
Australian Premium Durum	min. 13	●	●		●	

* Produced in small quantities generally under contract.
Note: The protein level of Australian wheat is expressed at 11% moisture basis.

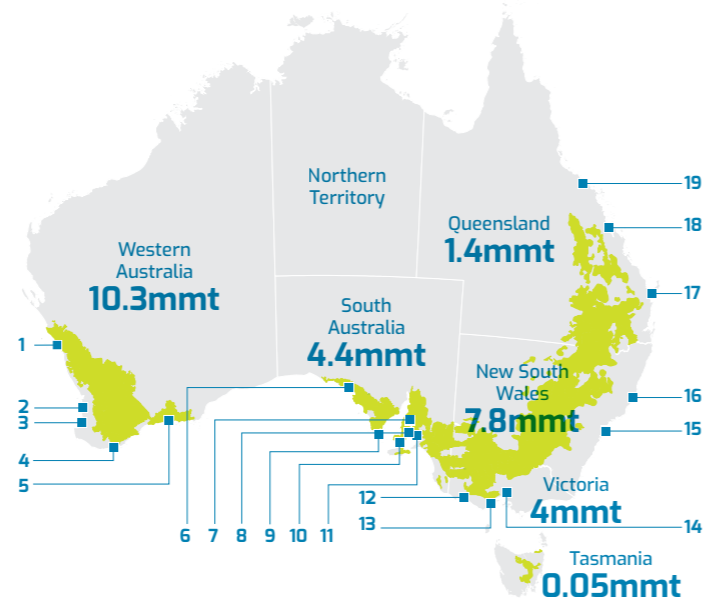
Indicative protein specification and regional availability for export



Wheat production in Australia

Australian wheat is produced in one of the cleanest environments in the world.

On average, Australia produces about 25mmt of wheat each year across about 12 million hectares. In recent years, production has reached 30-40mmt, which accounts for 4% of world wheat production and about 20% of global wheat exports. About 65–75% of Australia’s total wheat production is exported each year, with Western Australia the largest exporting state.



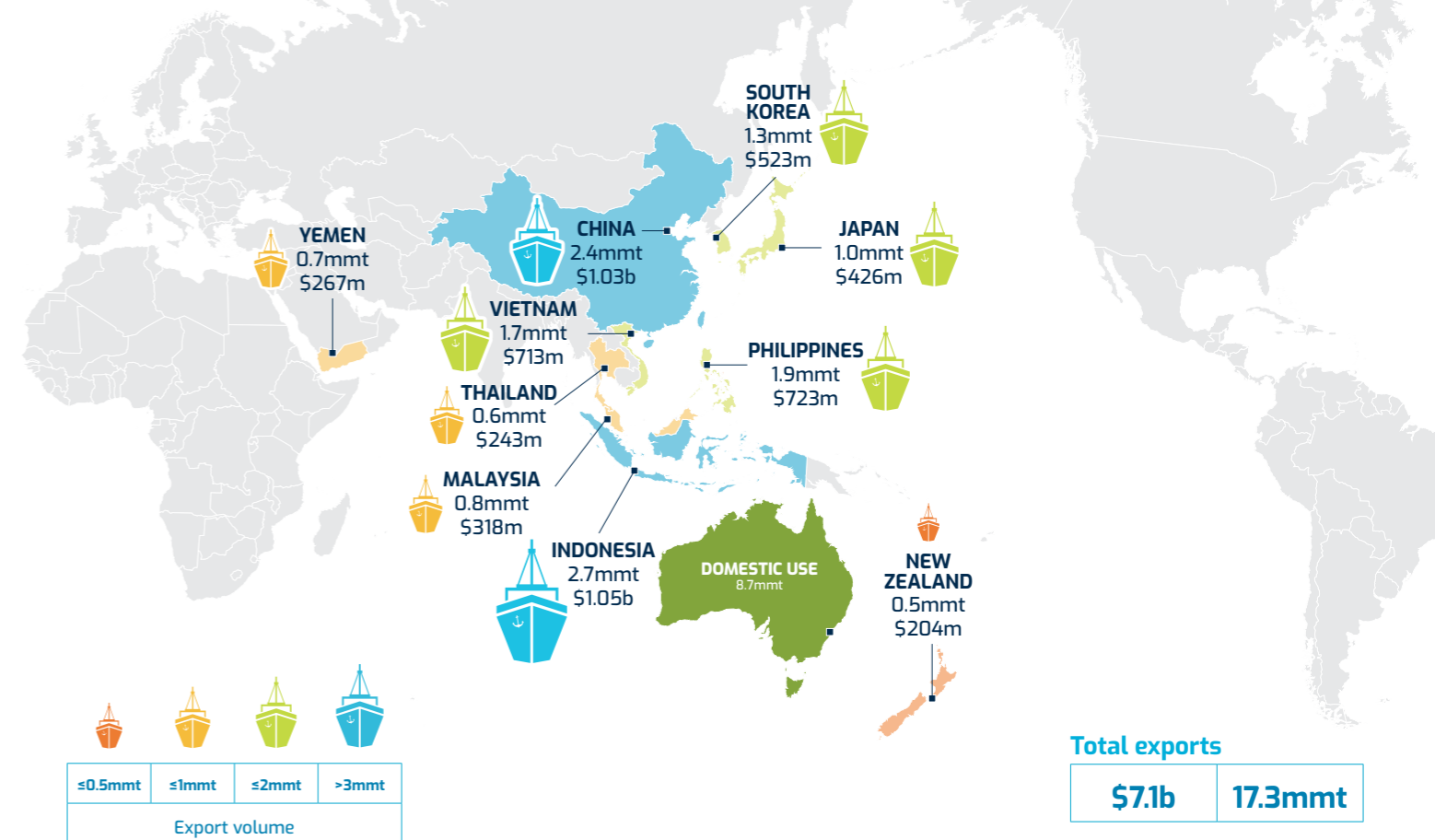
Australia's major ports

- | | | | |
|-------------|----------------|--------------|--------------|
| 1 Geraldton | 6 Thevenard | 11 Adelaide | 16 Newcastle |
| 2 Kwinana | 7 Port Lincoln | 12 Portland | 17 Brisbane |
| 3 Bunbury | 8 Wallaroo | 13 Geelong | 18 Gladstone |
| 4 Albany | 9 Adrossan | 14 Melbourne | 19 Mackay |
| 5 Esperance | 10 Port Giles | | |

Source: ABARES five year average to 2022–23 (financial years)

Major markets for Australian wheat

Australian wheat has an excellent reputation and is in demand in international markets, especially in Asia and the Middle East.



Sources: Exports: based on ABS data (average 2018–22)
Domestic use: based on ABARES data
\$ = AUD

25mmt
of wheat is produced in Australia each year
(5 year average)

9mmt
WA is Australia's largest wheat producing state

65-75%
Of Australia's total wheat production is exported each year

Quality assured from farm to customer

From the grower to the exporter, the Australian wheat industry is committed to the highest standards in product performance to meet the requirements of our international customers.



Wheat classification



Australian wheat varieties are classified into 10 classes to meet distinct quality attributes for processors and end-users.

The Australian grains industry is committed to maintaining and growing the quality reputation of Australian wheat classes using its accountable, transparent and sustainable wheat classification system. The wheat classification process involves assessing the inherent quality characteristics of a new variety, focusing on processing and end use performance.

Grains Australia administers and manages grains classification, trade and market access and industry education and information. Australia's wheat classification system is managed by Grains Australia through Wheat Quality Australia, which provides the technical functions to deliver customer driven outcomes.

For more information, visit wheatquality.com.au

Industry standards and codes of practice



The Australian grain industry is the only global exporter that has an industry Code of Practice to ensure Australian grain meets customer requirements.

Grain Trade Australia is the organisation that defines the Code of Practice and the Trading Standards that guide quality specifications.

For more information, visit graintrade.org.au

Supporting customers of Australian wheat

AEGIC increases value in the Australian grains industry by gathering, analysing and sharing market intelligence the industry needs to breed, classify, grow and supply grain that markets prefer.

In other words, we go into the markets that buy Australian wheat and talk to them about what they need. This information helps the wider Australian wheat industry make the right decisions in wheat breeding and classification to meet customer needs.

AEGIC experts regularly provide technical information, in-market support and education to international customers to help them understand and optimise the value of Australian wheat. Our seminars and digital webinars are popular with customers keen to learn more about how to use Australian wheat for premium products.

AEGIC also conducts a range of research projects devoted to improving Australian wheat to ensure consumers around the world enjoy the best possible noodles, bread, snacks and other premium food products. Contact AEGIC to find out how we can help you.



Australian wheat classes and their end-uses



Australian Prime Hard (APH)



Australian crop
5–10%

Minimum protein
13%



APH is a high protein milling wheat with exceptional milling quality resulting in strong and balanced dough properties. The bright colour and exceptional colour stability of noodles are considered a key benefit of using APH. Varieties are hard grained with a white seed coat and a bright, vitreous appearance. The grains are well-filled and mill freely to produce high flour yields with low ash and excellent colour. APH is ideally suited to high-volume breads, yellow alkaline, fresh ramen, dry white salted noodles, and wonton skins. Doughs are strong and well-balanced, and can be blended with lower protein wheats to produce high quality flours suitable for a wide range of bread and noodle products. Only certain varieties from specific production zones can be received as APH, but it can be exported from other ports if the wheat is transported.

Australian Hard (AH)



Australian crop
15–20%

Minimum protein
11.5%



AH consists of white, hard grained wheat varieties selected for their superior milling and dough qualities. This versatile hard wheat is clean, dry and sound. It mills to high extraction rates with good flour colour. The flour has strong dough properties with good water absorption. AH is ideal for a range of baked products, including pan and hearth breads, Middle Eastern style flat breads, yellow alkaline noodles, white noodles and steamed breads. AH varieties are grown throughout the Australian wheat belt and can be supplied from most ports. Seasonal variations mean that shipments from different ports will show variation in performance within the class requirements, and customers are encouraged to seek further information to match their requirements.

Australian Premium White (APW)



Australian crop
30–40%

Minimum protein
10%



The APW class is made up of white, hard grained wheat varieties with good milling properties. APW has balanced dough properties and good colour characteristics. APW is used to produce a wide variety of breads including Middle Eastern flat and pocket breads such as baladi, tanoor, barbari, taftoon and chapatti. It is also suitable for a range of Asian noodles and is widely used for good quality instant noodles. APW varieties are grown throughout the Australian wheat belt and can be supplied from most ports. Seasonal variations mean that shipments from different ports will show variation in performance within the class requirements, and customers are encouraged to seek further information to match their requirements.

Australian Standard White (ASW)



Australian crop
20–25%

Minimum protein
N/A



ASW consists of hard, white-grained wheat varieties. ASW is sound and clean, with good milling and flour colour. ASW is excellent value for straight milling or blending, and is used for flatbreads, steamed bread products, instant noodles and noodles with softer texture. ASW wheat can be supplied from most ports. Seasonal variations mean that shipments from different ports may show variation in performance within the class requirements. Customers are encouraged to seek further information.

Australian White Wheat (AWW)



Minimum protein
N/A



AWW is a hard wheat that has good flour extraction and colour. It represents excellent value as a general purpose or blending wheat for a range of milling and general purpose, uses such as retail and instant noodle. AWW has no specific protein.

Australian Noodle Wheat (ANW)



Australian crop
<5%

Minimum protein
9.5–11.5%



ANW varieties must meet specific quality requirements for udon noodles, including flour colour, colour stability and excellent mouthfeel. ANW makes white salted noodles with a bright appearance and a stable creamy, white colour with a soft and elastic mouthfeel. The noodle texture is highly regarded for udon noodle production. ANW consists of white varieties that are medium grained with partially waxy starch, producing high viscograph peak heights and high swelling volumes when the starch is gelatinised. ANW is primarily produced in Western Australia with small quantities available in eastern Australia (usually under contract). Australian noodle wheat classes are typically exported in blends with APWN wheat rather than exported as pure classes. Buyers are encouraged to work with their wheat supplier to develop blends that best meet their requirements.

Australian Premium White Noodle (APWN)



Australian crop
5–10%

Minimum protein
10–11.5%



APWN is a premium hard-grained speciality wheat with excellent starch and colour properties. APWN has unique processing qualities rarely found commercially. APWN is well suited to blending with ANW for premium udon noodles and a range of other noodle types. The quality characteristics for APWN are similar to ANW, except that APWN is hard grained. These quality characteristics include high flour extraction with low ash levels, creamy flour colour, bright and white noodle sheet colour with a minimal loss of brightness over time. APWN is produced in Western Australia.

Australian Soft (ASFT)



Australian crop
<5%

Maximum protein*
9.5%



ASFT is a unique blend of white, soft-grained wheat varieties ideally suited to sweet products including cakes, biscuits (cookies), pastries and confectionary. It is also used for Asian steamed products. ASFT has good milling performance with low flour water absorption, important for biscuit and cookie dough.

ASFT produced on the east coast is used domestically for biscuits and cakes while west coast ASFT is exported when available.

Australian Premium Durum (ADR)



Australian crop
<5%

Minimum protein*
13%



ADR is very hard grained with vitreous and amber coloured kernels. ADR is recognised for its good physical, processing and end-use quality and its bright and stable yellow colour. ADR is ideally suited for a wide range of wet and dry pasta products with excellent colour and shelf life. ADR is also used for cous cous and semolina.

ADR production in New South Wales and Queensland is predominantly focused on the export market, whereas production in South Australia and Victoria is driven by proximity to pasta manufacturers in South Australia.

Australian Innovative Wheat (AIW)



Minimum protein
N/A



AIW comprises varieties of wheat with unique end-use properties not available in the main classes. The class includes varieties with specialised functionality, such as nutritionally enhanced varieties. AIW varieties are generally traded as single varieties in a closed loop.

*Grade specification

Australian wheat for premium foods

Australian wheat is ideally suited to a wide range of wheat-based products including:

- all types of Asian noodles
- steamed dumpling skins
- Asian-style steamed bread
- western-style and artisan-style bread
- flatbreads
- cakes, cookies and pastries
- pasta and cous cous

Australian wheat for Asian baking

Australian wheat is increasingly in demand for baking applications as consumers across Asia recognise the convenience of baked products. Australian wheat can be used on its own or in blends, depending on the baking process and target product.

Bread dough made from Australian wheat is strong and well balanced with good extensibility for processing, resulting in excellent oven spring and loaf volume. Good flour colour results in bright, white crumb colour and bright golden crust. The high water absorption of the flour gives bakers good flour yields. Australian wheat is also excellent for artisan style bread and ideally suited to whole grain products. Flour millers in Asia are also increasingly interested in Australian soft wheat for cookies and cakes.



Australian wheat for Asian noodles

Australian wheat is highly regarded in Asian markets for all types of noodles, ranging from instant to udon noodles.

More than 30% of Australia's wheat exports are used to make Asian noodles. The combination of excellent noodle texture and colour attributes is unique to Australian wheat.

The starch and protein quality of Australian wheat is ideally suited to Asian noodles. Selection of the optimum wheat class for each noodle type results in excellent mouth feel and balanced texture. Carefully selected wheat varieties result in high milling yield at low flour ash giving exceptional noodle colour and colour stability.

Increasing the value of Australian grains

The Australian Export Grains Innovation Centre (AEGIC) is an independent organisation that helps position Australian grain as the preferred choice in international markets.

AEGIC delivers value by:

- **Understanding** the needs of grain customers.
- **Identifying** and supporting grain market opportunities.
- **Educating** customers on the benefits of Australian grain.
- **Innovating** to develop new solutions and high-value uses.

This helps the Australian grains industry breed, classify, grow and supply grain that markets prefer.

AEGIC's primary beneficiaries are Australian grain growers, but the impact of AEGIC's work spans the whole grains supply chain...



from the grower in Australia, whose grain is valued internationally



to the consumer across the world



who enjoys excellent noodles, baked products and beer made from Australian grain.

More information about the work AEGIC is doing can be found at aegic.org.au



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