

ORANGE JUICE

Global Juice and Concentrate Trade

Implications and Opportunities



Wayne Prowse
October 2023



Production
1.6 million tonnes
(66' Brix equiv)
-9% (1 yr.)
USDA Est in 2023

Export
1.37 million tonnes
(66' Brix equiv)
+2.4% (1 yr.)

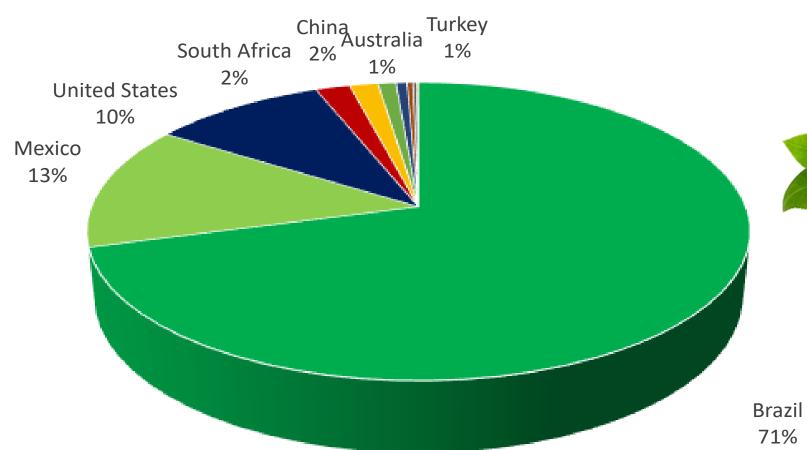
90 % of orange juice is traded globally

Source: USDA, CitrusBR, ITC Trademap, World Bank, Fresh Intelligence analysis



PRODUCTION

1.6 million tonnes 66'Brix equiv





2022 PRODUCTION

Region	Tonnes at 66' Brix equiv
Share of global production	% of 1.6 million

United States 159,000
Share of global production 9.9%

Europe	55,000
Share of global production	3.4%

Mexico	215,000
Share of global production	13.5%

Brazil	1,130,000
Share of global production	70.7%

South Africa	31,320
Share of global production	2.0%

1.6 million tonnes 66'Brix equiv

production to fall to 1.5 million tonnes in 2023

China	25,920
Share of global production	1.6%

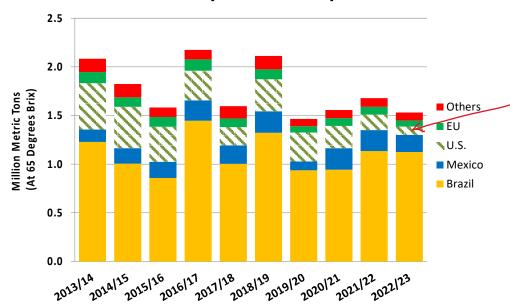
Australia 16,500
Share of global production 1.0%

Global Orange Juice Production

Brazil produces over 70 per cent of the world's commercial orange juice The US is decreasing rapidly – not a short-term issue

*** USDA estimates that the 2023 US Orange Juice production will be 50 per cent lower to 64,000 tonnes ***

Global Orange Juice Production Forecast to Drop in All 4 Top Producers







Source: USDA FAS, July 2023

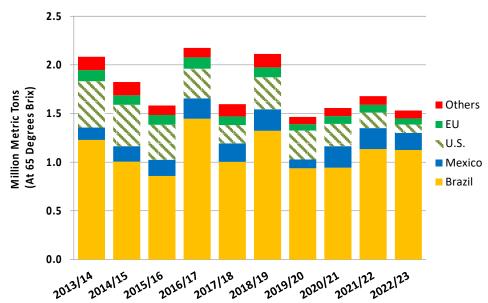
Global Orange Juice Production

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The US is decreasing rapidly – not a short-term issue

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Mexico is increasing though not fast enough to offset demand Europe (Spain, plus Italy Greece and Turkey) are small suppliers of juice in global context Supply shortage plus steady demand = rising prices

Global Orange Juice Production Forecast to Drop in All 4 Top Producers





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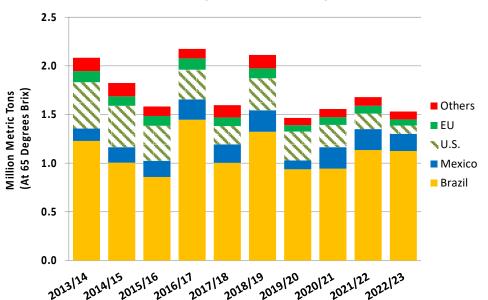
Europe (Spain, plus Italy Greece and Turkey) are small producers of juice in global context

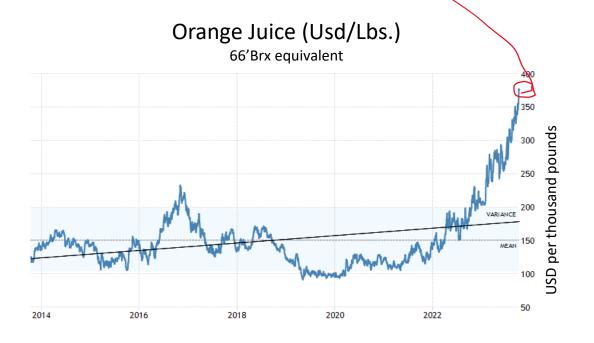
Supply shortage plus steady demand = rising prices

Spot price of Orange Juice US\$3.85 per lb. in October 2023 (Trading Economics CFD)

(US \$8.56 per kg / AU 13.65 per kg) (66'Brix equivalent)

Global Orange Juice Production Forecast to Drop in All 4 Top Producers



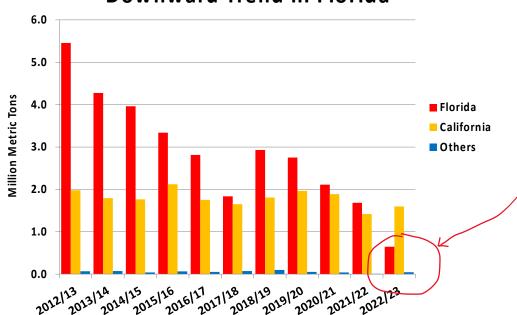


Source: CFD Trading Economics

US Implications – Florida Citrus is disappearing

- Florida produces most of US commercial orange juice
- Citrus Greening detected in 2005 started the downward production trend
- Hurricanes Irma (2017) and Ian (2022) decimated the orange groves over US\$ 500 Million damage
- US forecast for 2023 Florida crop is the lowest since 1940's ~ 640,000 tonnes
- Demand for fresh oranges is very high and offset by California to maintain domestic supply
- Juice production is reducing, and this means demand from Mexico and Brazil is up to satisfy domestic needs
- Neither can ramp up production supply scarcity pushes up prices







Source: USDA FAS, July 2023

2022 TRADE

1.37 million tonnes 66' Brix equiv



United States	88 k t	
Canada	78%	
Asia	5%	
Europe	1%	
Australia	0%	

Spain	92 k t
Europe	87%
US & Canada	1%
Asia	7%
MENA	3%

N	lexico	149 k t
Ε	urope	9%
U	S & Canada	88%
A	sia	3%
Α	ustralia	0%

Brazil	956 k t
Europe	60%
US & Canada	27%
Asia	9%
Australia	1%

S Africa	15 k t
Europe	41%
US & Canada	5%
Asia	5%
MENA	8%

Australia	2 k t
NZ / Pacific	57%
Asia	39%
US & Canada	3%

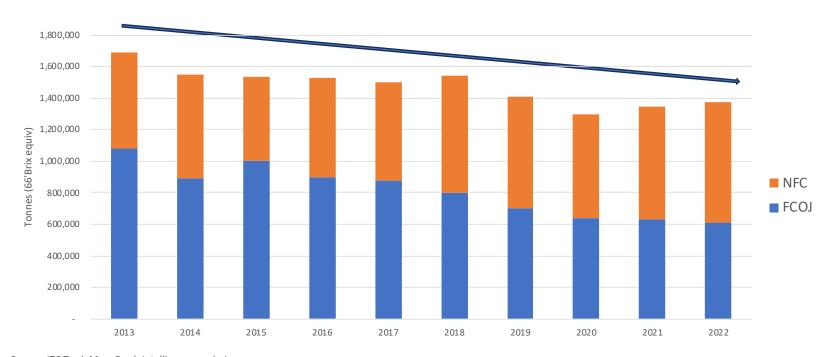
Source: ITC TradeMap; Fresh Intelligence analysis

Orange Juice Export Trade

(66'Brix Equivalent)

Global Orange Juice trade is declining 2.2% per year over 10 years (CAGR)



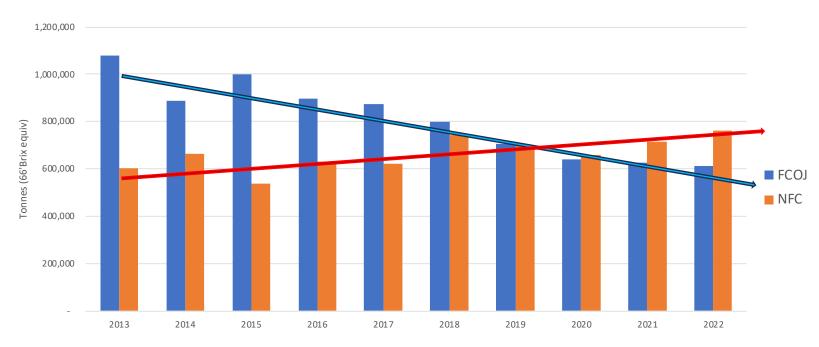


Source: ITC TradeMap; Fresh Intelligence analysis

Orange Juice Export Trade

(66'Brix Equivalent)

- Global Orange Juice trade is declining 2.2% per year over 10 years
- Frozen Concentrated Orange Juice (FCOJ) is declining 6.1 per cent per year
- Not From Concentrate Orange Juice (NFC) is increasing 2.6 per cent per year





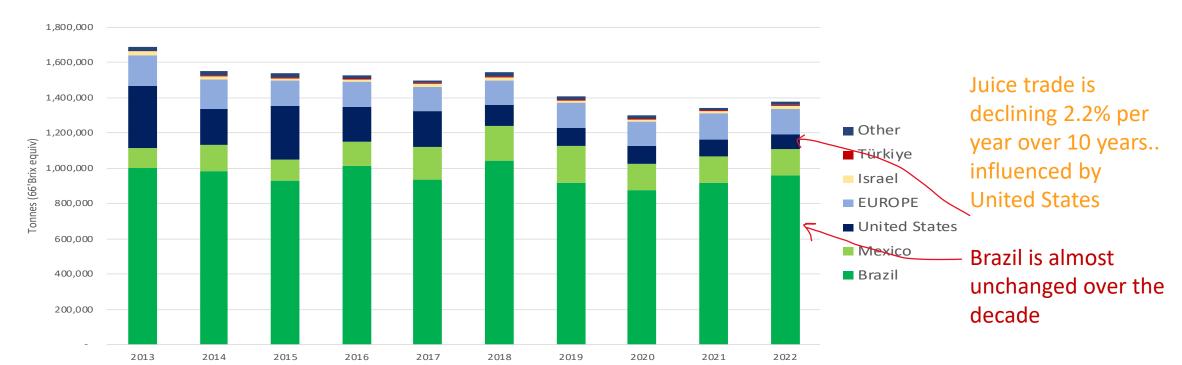


Orange Juice Export Trade

(66'Brix Equivalent)

Brazil is the largest exporter followed by Mexico
US exports are mostly to Canada, while Mexico exports to US
Europe exports are mostly intra Europe
Middle East (Turkey and Israel) are small exporters of juice





Source: ITC TradeMap; Fresh Intelligence analysis

Global Orange Juice Export Trade

(66'Brix Equivalent)

Export	Volume	Value	Unit Value	Change	Trend	Volume
Producer	Tonnes (66' Brix)	M AUD	A\$ per kg	1 Year	10 year CAGR	Share
Brazil	956,743	2,580.3	\$2.70	4.4%	-0.5%	70%
Mexico	148,795	558.4	\$3.75	-1.9%	2.9%	11%
United States	88,480	406.1	\$4.59	-3.7%	-14.1%	6%
Spain	92,719	354.8	\$3.83	1.0%	-2.5%	7%
Italy	40,754	111.8	\$2.74	-21.2%	-3.0%	3%
Israel	17,846	73.6	\$4.13	17.2%	-1.6%	1%
Türkiye	3,280	18.2	\$5.53	36.4%	5.8%	0.2%
China	1,734	7.3	\$4.24	8.5%	-8.2%	0.1%
Greece	6,778	26.2	\$3.87	1.4%	0.8%	0.5%
Australia	1,915	14.1	\$7.34	2.0%	-1.8%	0.1%
South Africa	15,213	57.7	\$3.79	37.7%	-1.2%	1%
Total	1,374,258	4,208.5	\$3.06	2.4%	-2.2%	100.0%



The largest decline in juice production is in United States

United States production is mostly consumed in local market or exported to Canada

Türkiye is increasing off a low base.

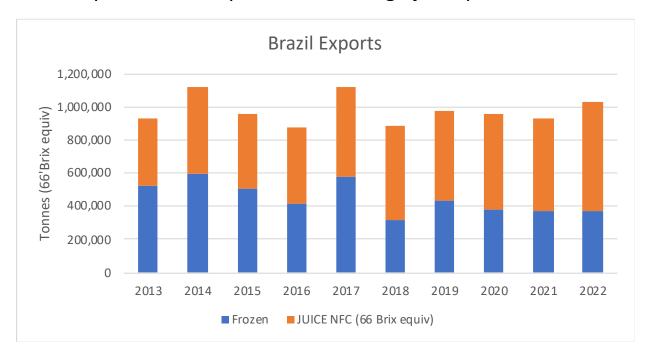
Very low recorded production in Asia as juice is mostly made from freshly squeezed oranges.



Brazil

USDA forecasts 2023/24 Brazil orange production down 1.1 per cent to 16.8 million tonnes, an off year. A reduced early fruit drop rate due to favorable weather, may increase average weight of oranges harvested. Fruit for processing is forecast lower with the reduced available supplies.

Orange Juice Exports are forecast down slightly with the reduced supplies and stocks are tight and unchanged. Brazil exports over 95 per cent of orange juice production



Frozen Concentrate (FCOJ) exports have been falling and offset by Not From Concentrate (NFC)



Frozen Concentrated Orange Juice

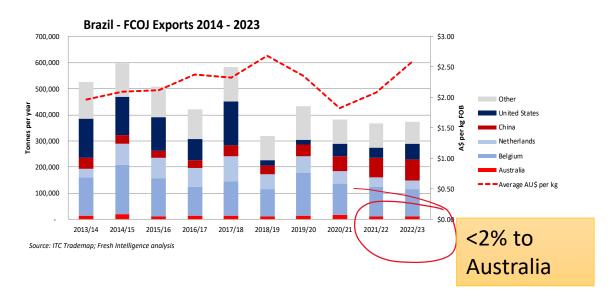
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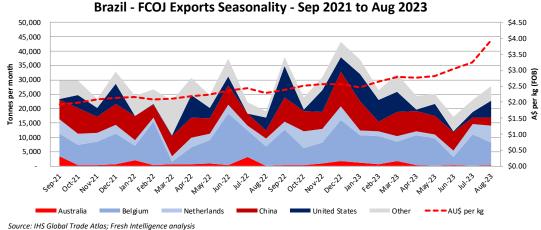
Brazil exports almost 400,000 tonnes of FCOJ though volumes are falling.

Most volume has been to Europe and increasingly China. Volumes to US have decreased, though starting to rise again to offset their lack of capacity

Australia accounts for less than 2% of exports

Prices (FOB) have been rising rapidly, now above peak levels in 2018/19.







Not From Concentrate

Brazil exported almost 2.3 million tonnes (586,000 t @ 66'Brix equivalent)

Most volume has been to Europe with rapid growth to United States Shifting demand for NFC – moving away from concentrate

Australia recorded less than 100 tonnes of NFC from Brazil

Prices (FOB) have been rising rapidly, now above peak levels in 2018/19.

Brazil - NFC Exports 2014 - 2023

2,500,000

2,000,000

1,500,000

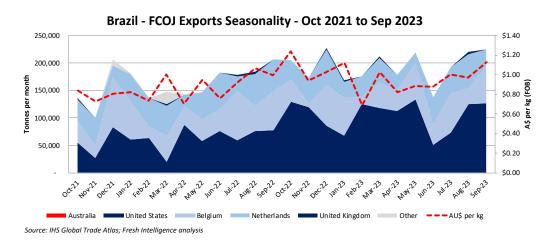
1,000,000

50.60

2013/14 2014/15 2015/16 2016/17 2017/18 2018/19 2019/20 2020/21 2021/22 2022/23

Source: ITC Trademap; Fresh Intelligence analysis

Frozen Concentrate (FCOJ) exports have been falling and offset by Not From Concentrate (NFC)







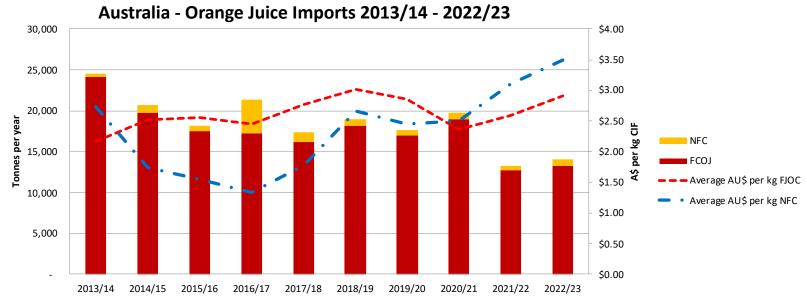




Australian juice imports have been declining.

14,051 tonnes imported in 2022/23 - down from 25,000 tonnes in a decade. 95 per cent is FCOJ

Brazil accounts for over 80 per cent of supply followed by Israel with 10 per cent



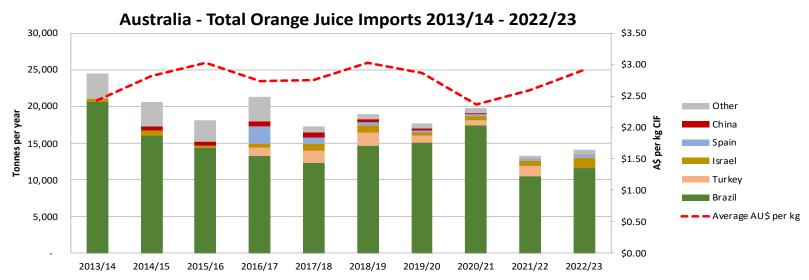






Brazil is the main supplier.

Türkiye had been a second supplier until 2021/22, then became more reliant on Israel. Small occasional volumes from elsewhere are mainly NFC Juice







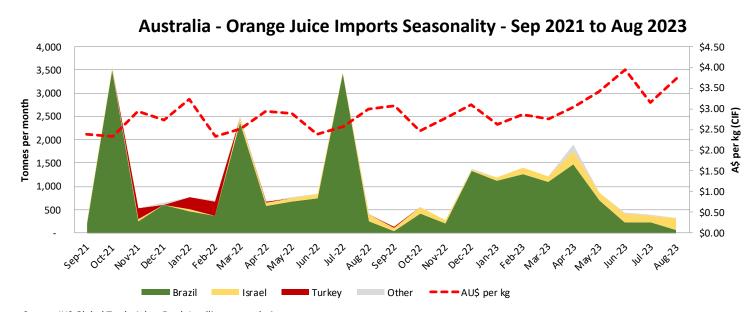


FCOJ is used in low value lines that often retail under \$2.00 per kg.

Over last 2 years import monthly supply patterns have changed.

Israel became a more significant supplier in 2022/23 as supply and prices from Brazil became difficult

With pressure on Brazilian supply from United States and Europe, FCOJ will be harder to source.



Source: IHS Global Trade Atlas; Fresh Intelligence analysis

Estimating the supply gap

	2020	2021	2022	2023 * est	Chg to 22
	Tonnes	Tonnes	Tonnes	Tonnes	
Fresh Orange Production	511,345	473,697	501,072	505,000	1%
Exported	189,480	168,877	160,920	183,449	14%
share of production	37%	36%	32%	36%	
Domestic	114,377	116,423	129,311	130,000	1%
share of production	22%	25%	26%	26%	
Fresh Oranges Processed 2022	195,700	184,858	210,709	191,551	-9%
Share of production as juice	38%	39%	42%	38%	
Est Fresh Juice (500kg per tonne)	97,850	92,429	105,355	95,776	-9%
Imported FCOJ	17,792	15,825	12,424	8,646	-30%
Est Fresh Juice Equiv (8.6 fold)	153,011	136,095	106,846	74,356	-30%
Imported NFC	899	609	807	1,200	49%
Fresh Juice Import Equiv	153,910	136,704	107,653	75,556	-30%
Total Fresh Juice supply	251,760	229,133	213,008	171,331	-20%
Est Demand	231,700	223,133	213,000	200,000	2070
Shortfall (Juice tonnes)				28,669	I
Shortfall (66'c Brix FJOJ)				3,333.58	
				3,333.30	
Shortfall in Fresh Oranges				57,338	

Assumptions

Fold 8.6 total consumption 852,031,600 x 250ml glasses

Juice per ton 500

per capita 33.2 250ml glasses per year



Shortage allowing for 2023 imports recorded to June and assuming no further supply

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Fresh Juice Import Equiv	153,910	136,704	107,653	1,200	-99%
Total Fresh Juice supply	251,760	229,133	213,008	96,976	-54%
Est Demand				200,000	
Shortfall (Juice tonnes)				103,024	-
Shortfall (66'c Brix FJOJ)				11,979.58	
Shortfall in Fresh Oranges				206,049	

Assumptions

Fold 8.6 total consumption 852,031,600 x 250ml glasses

Juice per ton 500

per capita 33.2 250ml glasses per year



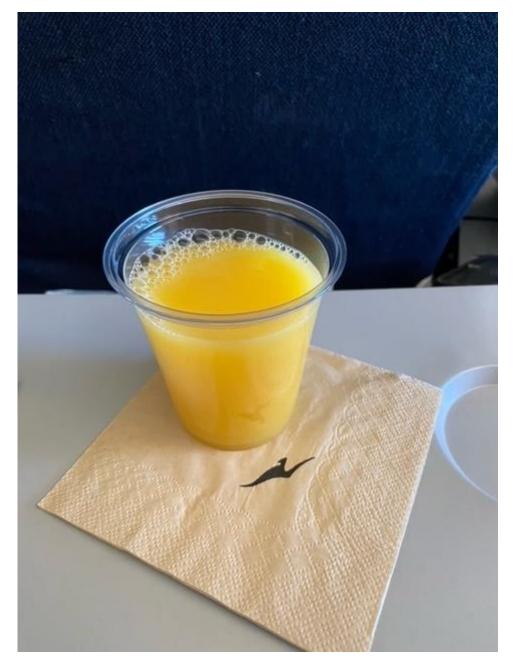
Shortage allowing for no imports in 2023/24 and no change to fresh production or trade, or overall juice demand

Australian Orange Juice challenges and opportunities

- Global Orange juice production sits around 1.6 million tonnes and is declining
 NFC is offsetting FCOJ
- Brazil is the dominant global export supplier
- US production decimated by weather and disease is now a major importer driving up prices
- Spot price of orange juice (FCOJ 66'Brix) above AU\$13 per kg (Oct 23)
- Australia imports around 50 per cent of domestic orange juice consumption, over 80 per cent of imports from Brazil
- Alternative suppliers in Europe and Middle East have limited capacity
- NFC (Fresh Orange Juice) likely to dominate the Australian market
- Opportunity to process as many oranges as possible without over supply fears

Last orders?





Discussion





REFERENCES

- International Trade Centre, TRADE MAP www.trademap.org/
- IHS Global Trade Atlas
- FAOSTAT
- Citrus Australia
- Citrus BR
- USDA (Foreign Agriculture Service)

DISCLAIMER

- Fresh Intelligence Consulting collated the data for Citrus Australia from data provided by the international trade databases as referenced.
- While every effort is made to ensure that the data is a true reflection of the trade, some errors may occur due to the reporting and Fresh Intelligence Consulting takes no responsibility for any losses that may occur as a result of decisions based on this data.
- Views expressed are personal and may not reflect the same views of Citrus Australia.

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