Wheat Market Outlook and Price Report: January 3, 2016 By Marlene Boersch/ A.P. Temple Mercantile Consulting Venture Inc.

i) Background and Rationale for the Report

The following wheat market outlook and price report will be published on a weekly basis on the Sask Wheat Website. The report provides producers with an overview of world wheat markets, a market forecast, and benchmark prices at both the primary elevator and export positions (FOB Vancouver or elsewhere).

The report is made up of several sections. Following this section, a World Wheat overview is provided, which includes a summary of wheat market fundamentals, world production and trade, and a wheat market outlook. This is followed by several price tables, which include primary elevator bids at various Saskatchewan locations (Table 1), grain spreads (Table 2), and FOB port prices and basis (as measured by subtracting the primary elevator price (Rosetown) from the relevant port location price for individual crops) (Table 3). Table 3 is preceded by a description of the various assumptions, definitions and methodology used in arriving at the FOB port prices and in the export basis calculation.

ii) Wheat Market Outlook Nov. 21/'16

2016/'17 World Wheat Overview:

Wheat production and wheat availability on the markets increased significantly during crop year 2016/17. Total consumption is also expected to be up meaningfully, but ending stocks will nevertheless rise by about 13 million mt over the previous crop year.

Below is the world wheat balance sheet for the past 10 years:

mln mt	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14	E2014/15	F2015/17	P2016/17	'16/17 over '15/16
Opening Stocks	134.4	131.1	171.5	197.3	192.6	192	•	•	•	221.5	108%
Production	609.2	687.2	681.7	653.8	699.4	657.4	717.1	730.3	737	748.6	102%
Imports	110.7	137.2	128.6	126.1	146.5	141.9	156.5	153.3	164.3	166.2	101%
Total Availability	743.6	818.3	853.2	851.1	892	849.5	888.4	920.1	941.8	970.1	103%
Food	442.5	444.3	452.3	454.9	459.5	464.3	474	480.6	486.9	493.3	101%
Feed	92.1	117.5	118.6	117.7	155.1	133.5	134.2	144.6	146.5	151.1	103%
Industrial	19.2	20.2	21.2	21.3	21.1	21.3	21.6	22	21.8	22.5	103%
Seed	35.6	35.3	35.5	36	35.9	35.8	36.3	36.2	36.5	36.3	99%
Other	23.2	29.6	28.4	28.7	28.5	23.2	32.4	32	28.7	32.3	113%
Total Consumption	612.5	646.8	655.9	658.5	700	678.2	698.5	715.4	720.3	735.6	102%
Exports	110.7	137.2	128.6	126.1	146.5	141.9	156.5	153.3	164.3	166.2	101%
Ending Stocks	131.1	171.5	197.3	192.6	192	171.3	189.9	204.8	221.5	234.6	106%

Source: IGC data



Global wheat and trade:

Below is a brief synopsis on this week's market events in the major wheat origins.

The markets have been very quiet over the holidays. We expect activity to increase during the last half of January.

Canadian wheat:

- As of shipping week 20 (to Dec. 18/'16), Canada exported 5.4 million mt of wheat. This is 33% lower than last year's wheat exports to date of 7 million mt.
- Week 20 Amber Durum exports were at 1.5 million mt, 13% lower than last year's 1.7 million mt. In comparison, US wheat exports are well ahead of last year's pace.
 US wheat:

Wheat futures are slightly higher Tuesday morning after ending Friday mostly 2 to 3 1/4 cents higher. All three classes took their March 17 contracts higher during the holidayshortened week.

o SRW remained the world's cheapest wheat and the GASC tender produced no cheap give-away prices.

EU wheat:

- European markets were very quiet and effectively closed down for the holiday. The only business focus was on the Egyptian GASC tender [see below].
- Over the past 14 days the European wheat market at the Paris Exchange (MATIF) has moved between Euro165/mt and Euro 168/mt. Traded volume was very small. Cash trade was virtually non-existent over the holidays.
- Egypt (via their purchase agency GASC) bought 235,000 mt of Russian and Ukrainian wheat at US\$197.50/ mt for February 1-10, 2017 shipment. The prices paid by GASC that were very similar to their previous purchase level.
 - The GASC tender was the only significant wheat business concluded over the past week.
- Morocco tenders January 17 for 364,000 mt of US milling wheat plus 327,000 mt of US durum wheat under preferential-tariff import quotas. Morocco is expected to return to the market the following day for 364,000 mt EU soft milling wheat.

Argentina:

- There were no Argentine wheat offers to the Egyptian GASC tender last week, while at the previous tender Argentine wheat was the cheapest.
- The Buenos Aires Grain Exchange (BAGE) raised their acreage estimate in Argentina by 400,000 ha to 4.7 million ha (+20%), and lifted their crop number by a hefty 2.5 million mt to 15 million mt (12.5 million mt last year). Harvest was put at 85% complete.

The World's Top ten Wheat Importers (Est. 2016)

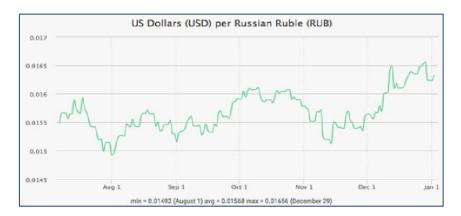
Rank Country	Imports (1000 MT)	
1 Egypt	11,800.00	
2 Indonesia	8,500.00	
3 Algeria	8,200.00	
4 EU-27	6,500.00	
5 Brazil	6,200.00	
6 <u>Japan</u>	5,800.00	
7 Korea, Republic Of	5,000.00	
8 Morocco	5,000.00	
9 Philippines	5,000.00	
10 Turkey	5,000.00	

Source: USDA



Wheat Market Outlook:

- Significant events this past week:
 - Futures: The grain futures ended the year 2016 with cereals higher and oilseeds lower. Chicago wheat was up 3 cents/bushel at \$4.08; up 15c/bu for the week. Minneapolis was wheat up 1 c/bu at \$5.36 up 5c/bu for the week. All the grain exchanges re-opened for trading on Monday evening Jan 2, 2017 at 7:00 pm.
 - USDA weekly US Export Sales Report: Expectations heading into the weekly USDA Export Sales Report were for sales between 200,000 to 500,000 mt plus 0-50,000 mt of new crop wheat sales. Reported net sales came in at 568,100 mt for delivery in marketing year 2016/2017; they were up 91% from the previous week and 25% from the prior 4-week average. Increases were reported for China, Mexico, South Korea, Japan, and Peru. For 2017/2018, net sales of 14,400 MT were reported for Mexico.
 - o The Black Sea wheat market was very quiet with no reported trade and no changes in nominal prices. However, the Russian Ruble, however, hit fresh 17 month highs against both the US\$ and €uro during the Christmas week, which is not helping their export prospects.



o **Russia, Australia and Argentina** combined produced about 25 million mt of additional wheat over last year.

Outlook:

- Large stock increases and higher Northern Hemisphere plantings (except in the US) provide a big cushion against any new season crop issues.
- Forward cash markets will be driven by:
 - Russia, Australia and Argentina have a combined 25 million mt of additional production over last year.
 - The additional wheat will be looking for markets in the coming ½ year, or so.
 - This means that price movements in wheat are likely to be confined to quality and origin spreads as the amount of wheat available in the world will make a sustained rally difficult.
 - Any price movements in wheat may be confined to quality/origin spreads, due to the volume of wheat around.
- > For now there is no change to the wheat outlook; the world has ample supplies of wheat, but quality issues may cause significant price re-alignments in 2017.



iii) Primary Elevator Price Tables and Grade Spreads

Table 1: Canadian Primary Elevator Bids, in Canadian Dollars per Bu and per MT

Date: January 3, 2017

		_			
Sp	oot	NIM/ Sack	Deferred		
(bu.)	(mt)	IVVV Sask	Mch. '17 (bu.)	Mch.'17 (mt)	
\$6.42	\$235.90	1 CWRS 13.5	\$6.57	\$241.41	
\$8.04	\$295.42	1 CWAD 13.0	\$8.28	\$304.24	
n/a	n/a	1 CPSR 11.5	n/a	n/a	
		SW Sask			
\$6.33	\$232.59	1 CWRS 13.5	\$6.51	\$239.20	
\$8.08	\$296.89	1 CWAD 13.0	\$8.23	\$302.40	
n/a	n/a	1 CPSR 11.5	n/a	n/a	
		NE Sask			
\$6.20	\$227.81	1 CWRS 13.5	\$6.36	\$233.69	
\$7.89	\$289.91	1 CWAD 13.0	\$8.02	\$294.69	
n/a	n/a	1 CPSR 11.5	n/a	n/a	
		SE Sask			
\$6.19	\$227.45	1 CWRS 13.5	\$6.37	\$234.06	
\$7.92	\$291.01	1 CWAD 13.0	\$8.04	\$295.42	
n/a	n/a	1 CPSR 11.5	n/a	n/a	
	\$6.42 \$8.04 n/a \$6.33 \$8.08 n/a \$6.20 \$7.89 n/a \$6.19 \$7.92	\$6.42 \$235.90 \$8.04 \$295.42 n/a n/a \$6.33 \$232.59 \$8.08 \$296.89 n/a n/a \$6.20 \$227.81 \$7.89 \$289.91 n/a n/a \$6.19 \$227.45 \$7.92 \$291.01	(bu.) (mt) NW Sask \$6.42 \$235.90 1 CWRS 13.5 \$8.04 \$295.42 1 CWAD 13.0 n/a n/a 1 CPSR 11.5 SW Sask \$6.33 \$232.59 1 CWRS 13.5 \$8.08 \$296.89 1 CWAD 13.0 n/a n/a 1 CPSR 11.5 NE Sask \$6.20 \$227.81 1 CWRS 13.5 \$7.89 \$289.91 1 CWAD 13.0 n/a n/a 1 CPSR 11.5 SE Sask \$6.19 \$227.45 1 CWRS 13.5 \$7.92 \$291.01 1 CWAD 13.0	(bu.) (mt) NW Sask Mch. '17 (bu.) \$6.42 \$235.90 1 CWRS 13.5 \$6.57 \$8.04 \$295.42 1 CWAD 13.0 \$8.28 n/a n/a 1 CPSR 11.5 n/a \$6.33 \$232.59 1 CWRS 13.5 \$6.51 \$8.08 \$296.89 1 CWAD 13.0 \$8.23 n/a n/a 1 CPSR 11.5 n/a NE Sask \$6.20 \$227.81 1 CWRS 13.5 \$6.36 \$7.89 \$289.91 1 CWAD 13.0 \$8.02 n/a n/a 1 CPSR 11.5 n/a \$6.19 \$227.45 1 CWRS 13.5 \$6.37 \$7.92 \$291.01 1 CWAD 13.0 \$8.04	

Table 2: Grade Spreads, in Canadian Dollars per Bu and per MT

Avg. Grade Spread/ Pro Discounts	Cdn\$/bu.	Cdn.\$/mt		
1 CWRS 13.5	Base Grade	Base Grade		
2 CWRS 13.5	(0.20)	(7.35)		
1 CWRS 12.5	(0.37)	(13.60)		
1 CWAD 13.0	Base Grade	Base Grade		
1 CWAD 13.5	0.03	1.10		
2 CWAD 13.0	(0.79)	(29.03)		
2 CWAD 12.5	(0.97)	(35.64)		

iv) FOB Wheat Prices and Export Basis Calculation

Background and Rationale:

Reporting FOB prices at port position and primary elevator prices allows the reader to gain an understanding of both local and international wheat prices and to understand the relationship between the two, as measured by the export basis. Export basis can be defined as FOB port position prices minus the primary elevator prices at any given prairie delivery location, and is therefore reflective of transportation costs plus any premiums being captured by terminal grain elevator companies or the railway companies, at any given time.



In general, a widening basis is indicative of decreasing system performance in terms of either reduced port capacity or rail service, or both. A narrowing basis is indicative of increased available port capacity and/or better ability of the railways to provide ample service to grain shippers. In this regard, tracking these prices over time has value both in terms of producers being able to time the selling of their grain but also in terms of evaluating and setting policy related to various transportation and capacity issues.

Gray (2015) has calculated a normal basis to be in the range of C\$72/tonne. During the 2013/14 crop year the export basis for wheat widened to approximately C\$250/tonne, which indicated an inability of the grain handling and transportation system to adequately handle the record crop produced that year. This occurrence has highlighted the need to improve the level of rail service and take measures to expand port capacity where possible. It has also underscored the need for better price transparency and market information within the grain sector.

Assumptions, Definitions, and Methodology

The following background information should assist in understanding and interpreting international market signals and to relate them to the 'local' Saskatchewan wheat market:

- The price information generated for the weekly report is designed to show farmers at what price levels several wheat classes are trading at local primary elevators (Table 1) and in nearby international markets (Table 3). To express the Export Basis¹ (see Export Basis in Table 3) defined as Cdn. FOB Prices minus primary elevator bids, the FOB prices are translated into Cdn. dollars from US dollars and compared to current actual primary elevator Street prices at Rosetown, Saskatchewan (see Street Prices in Table 3). Rosetown is used as a proxy for all primary elevators in the basis calculation. The actual handling and transportation costs from the West Coast to delivered elevator (Rosetown area) range from ~C\$58.00-C\$74.72/mt, depending on number of cars moved and elevator used.
- > Approximate relationship between U.S. wheat classes and Canadian wheat classes:
 - o DNS 14% in the Pacific North West (PNW) ≈ 1 CWRS 13.5% in Vancouver
 - o HRS in the Pacific North West (PNW) ≈ 2 CWRS 13.0% in Vancouver
 - o HRW in the Pacific North West (PNW) ≈ 3 CWRS in Vancouver
 - o SW (lowest price wheat) ≈ CPS red (mostly fed domestically)
 - HAD (Lakes) ≈ CWAD (Thunder Bay/ Lawrence)
 - Abbreviations: DNS (Dark Northern Spring Wheat); HRS (Hard Red Spring Wheat); HRW (Hard Red Winter Wheat); SW (Soft Wheat); HAD (Hard Amber Durum Wheat); CWRS (Canadian Western Red Spring Wheat); CPS (Canada Prairie Spring Wheat); CWAD (Canadian Western Amber Durum Wheat)

Hard wheat price calculations:

[&]quot;The difference between FOB Vancouver prices and the Saskatchewan elevator cash bids to producers is referred to as export basis: Basis can refer to the difference between any two prices. As the largest volume port, Vancouver FOB, minus the elevator bid prices representative measure of the "export" basis for grains in Western Canada."



¹ Gray, R.S. (2015). The Economic Impacts of Elevated Export Basis Levels on Western Canadian Grain Producers 2012/13, 2013/14 and 2014/15.

Exporters in Western Canada generally derive their primary elevator wheat prices from HRS values at the West Coast (Pacific Northwest - PNW).

Similarly, HRW values are used for lower grade (3) CWRS.

- West Coast HRS and HRW values essentially dominate the international hard wheat trade and determine its basic value.
- o If premiums are paid for 1 CWRS 13.5, elevator companies are often able to retain the premium

Durum wheat price calculations:

The primary export route for Canadian durum wheat is still through Thunder Bay, not the West Coast of Canada.

- Nevertheless, the Pacific Coast has increased in importance for durum over time with 38% of total export volume crop year to date.
- Italy is the single biggest buyer of Canadian durum wheat with 27% of total Canadian durum exports YTD (East Coast shipments).

Optional origin grain sales:

Most major international grain companies sell 'optional origin' wheat to their customers and often cover their sales 'at best' closer to the shipment position. The Canadian grain system is not conducive to servicing optional origin sales because the volume of wheat kept in storage in port today is much smaller than prior to deregulation of the Canadian wheat market.



Table 3: Relevant FOB Prices and calculated Basis, US & Canadian Dollars per MT

Relevea	ant FOB Prices ar			Jan. 3, 2017	
	FOB Prices CD	A¹ (calculated)	Street Prices	Export Basis ²	
Type of Wheat	West Coast (Cdn./mt\$)	Great Lakes (Cdn.\$/mt)	Rosetown (Cdn.\$/mt)	Basis: West Coast-Centr. SK (Cdn\$/mt)	
DNS 14.0	\$332.92	\$303.32			
HRS	\$327.49				
HRW 11.5	\$255.48				
SWW 12.0	\$231.31				
1 CWRS 13.53	\$332.92		\$232.22	\$100.69	
2 CWRS 13.03	\$327.49		\$212.01	\$115.48	
3 CWRS ³	\$255.48		\$200.25	\$55.23	
CPS ³	\$224.41		\$163.14	\$61.27	
1 CWAD⁴		\$411.83	\$304.98	\$106.85	
Competing wheat:	US\$	i/mt			
Russia 12.5 (Black Sea,					
25k mt)	\$18	1.00			
French 11.0 (Rouen)	\$18	3.38			
ASW 10.5 (W Coast) Jan.	\$18	7.00			
Argentine 12.0	\$170)-175			

¹ FOB Prices CDA = FOB US\$ converted into Canadian Currency



² Export Basis = FOB Prices CDA minus Cdn. Street Price

³ DNS 14% ≈ 1 CRWS 13.5%; HRS ≈ 2 CWRS 13.0%; HRW ≈ 3CWRS; SWW ≈ CPS

⁴ Values derived to Lakehead FOB

ADDENDUM

Futures Driven Basis Calculation, Canadian Dollars per MT

Canadian Wheat - World	l Price Parities				Jan. 3, 2017
Canadian Funds			Grade		
PNW value/Vancouver	1CWRS13.5	2CWRS	3CWRS	Winter wht.	CPS
Dec./Jan. delivery	\$8.87	\$8.72	\$6.77	\$6.11	\$6.11
Parity Track Rosetown	\$7.38	\$7.23	\$5.27	\$4.61	\$4.61
Track Bid Rosetown Area	\$6.32	\$5.77	\$5.45	\$4.44	\$4.44
Gross Margin at Elevator (\$/bu)*	\$1.06	\$1.46	-\$0.18	\$0.17	\$0.17
Gross Margin at Elevator (\$/mt)*	\$38.80	\$53.59	-\$6.66	\$6.28	\$6.28
* to cover elevation, elevator market risk, ma	argin				

