Ukraine: Stand-off Threatens Europe Breadbasket

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ABSTRACT

This paper examines the current Ukraine wheat export condition after Russian-Ukrainian military confrontation. The political conflict in Ukraine and the recent military intervention of Russia in Crimea is raising concern full effect of the events there is still uncertain, but some hints can be seen in the wheat market by analyzing the trend and pattern of Ukraine wheat export. Crimea is extremely important as it is where most of Ukraine grain exported by ship from its ports of the black sea. European Union (EU) is a significant trading partner of Ukraine but geopolitical tension adversely affects the wheat trade from black sea, which threatens Europe breadbasket. This study also highlights an index of export intensity to analyze the intensity of existing trade for the period 2011-2014 between Ukraine and EU countries. The result show export has intensified over the years, but this year low trade intensity.

Keywords: Wheat export, Black sea ports, Breadbasket of Europe, EU

JEL Classification: F10, F13, F14, F17

A Review

Ukraine has tremendous agricultural potential and play significant role in contributing to global security. This sector potential has not fully exploited due to depressed farm income and lack of modernization. International wheat trade has exhibited several sticking features during last two decades. Among the top 10 major exporters Ukraine and Russia has been rapidly expanding their market shares, while the United State the largest exporter of wheat. Ukraine rank 9th in world wheat production and in exporting countries its rank is 6th till 2013. ¹It is projected by USDA total wheat exports from Russia, Ukraine and Kazakhstan

¹ www.ers.usda.gov/amberwaves/
likely will be more than double those of the United States by 2019 so the next decade is likely to see a major shift in global wheat production and trade. After 20 years the downfall of the Soviet Union, Ukraine is again seeking to establish itself a significant exporter of agricultural product with its rich black soil, it is chornozem the top soil layer that makes the country soil so fertile and become one of the major exporter of wheat in the world, its generous supply of wheat make Ukraine “Bread basket of Europe”. Ukraine possesses 30% of the world’s richest black soil; its agricultural industry has huge potential especially in grains. As global demand for wheat continues to build, the world increasingly looking towards the black sea region to produce the additional supplies needed to meet the growing requirements, to access the ever expanding opportunities in this important market Ukraine export black sea milling wheat, CBOT black sea wheat and future offer effective risk management. Over the past few years the export of black sea wheat is growing steadily in 2008-10 Russia and Ukraine together export an average of 29 million ton of wheat per year this accounted for 21.3% of the world wheat export.

In 2014 Crimean crisis create dispute between Russia and Ukraine and that will affect the world agricultural and financial market. The political situation in the southern region of Ukraine may affect the operation process of deep sea ports in Odessa blast, Russia’s annexation of Crimea risk costing Ukraine not only the grain export capacity in the region itself but in its two eastern ports of Mariupol and Berdyansk. These ports open indirectly on the black sea, but the Azor sea requiring vessels to negotiate, there is a narrow Kerch strait between Russia and Crimea to reach Ukraine’s grain export buyer’s, largely in Europe, middle east and north Africa. Looking the current circumstances of both countries in long term Ukraine might face bottleneck for new crop shipments which would be forced to pass through the western ports such as Odessa. If problem escalates this country have potential to push prices of grains, wheat is one that commodity which will face a problem since most of Ukrainian grain exported through the center of a dispute that is the Crimea, no shipment have been disrupted so far future where are chances that a military conflict could disrupt shipment. The other side of story is quite different with grain processors if price increase it is beneficial for grain processor and company earn profit, in Ukraine US have 2 big grains processor companies. The present crisis force Ukraine to announced the termination of their presidency of the CIS and there intension to leave the organization.

**Objectives**

The objectives of the present study are:

- To study the trend and pattern of Ukraine’s wheat export.
- To study the current scenario which threaten the Europe wheat market.

376
To analyse the export intensity of wheat from Ukraine to EU countries.

**Methodology**

Export Intensity Index (XII), \( XII_{ij} = \frac{X_{ij}}{X_i} / \left[ \frac{M_j}{(M_w - M_i)} \right] \)

Where:

- \( X_{ij} \): country i export to county j
- \( X_i \): total export of country i
- \( j = \) Ukraine
- \( M_j \): total import of country j
- \( M_i \): total import of country i
- \( j = \) EU countries
- \( M_w \): total world wheat import
- \( XII_{ij} \): export intensity index of wheat

The first term, the numerator of the formula, \( X_{ij}/X_i \), is the proportion of export of country ‘i’ to the bilateral trading partner as a percentage of its total exports. This indicates how significant the trading partner is to the home or ‘i’ country for its exports. The second term or the denominator, \( M_j/(M_w - M_i) \), is the trade partner’s total imports as a proportion of total world import less the import of the domestic economy or country ‘i’. The average value of this index is equal to unity. A trade intensity of unity would indicate that country ‘i’ export to each country j in accordance with trading partners’ purchasing power. A value greater than unity indicates a high degree of trade intensity between two countries, while a value less than unity indicates low trade intensity between partners. Trade intensity indices have been used in academic work since Brown (1947) and Kojima (1964) developed this method. From a regional perspective, the trade intensity index or export intensity index shows whether a region exports more as a percentage to a certain region than the rest of the world does (UNESCAP, 2005) also used by other international institutions such as UNCTAD, the World Bank and the IMF to examine the strength of the bilateral trading relation between two partners.

**Ukraine Wheat Export**

The current wheat export condition after military intervention of Russia in Crimea projecting is uncertain, but it’s sure that export in wheat decreases as a result of this political condition and black sea port which are controlled by Russia. Global wheat production is projected to reach 697035 thousand metric tons and its change in growth rate decline to -2.37%, black sea regional production decline, particularly in Ukraine production growth rate decline by -10.22% in 2014/15.

Table 1 show that World and Ukraine wheat export increases till 2013/14 but its projected decreases in 2014/15 as a result of the current military conflict between Russia and Ukraine. In 2013/14 Ukraine wheat export was 9500 thousand metric tons, which in 2014/15 projected 8500 thousand metric tons.
Table 1: Ukraine wheat export performance (thousand metric tons)

<table>
<thead>
<tr>
<th>Years</th>
<th>Ukraine’ wheat export</th>
<th>change in Growth rate</th>
<th>World</th>
<th>% share in world export</th>
</tr>
</thead>
<tbody>
<tr>
<td>2010/11</td>
<td>4302</td>
<td>-</td>
<td>134090</td>
<td>3.2</td>
</tr>
<tr>
<td>2011/12</td>
<td>5436</td>
<td>26.36 %</td>
<td>153779</td>
<td>3.5</td>
</tr>
<tr>
<td>2012/13</td>
<td>7190</td>
<td>32.27 %</td>
<td>146995</td>
<td>4.9</td>
</tr>
<tr>
<td>2013/14</td>
<td>9500</td>
<td>32.13 %</td>
<td>158404</td>
<td>6.0</td>
</tr>
<tr>
<td>2014/15 (projected)</td>
<td>8500</td>
<td>-10.5%</td>
<td>15156</td>
<td>5.6</td>
</tr>
</tbody>
</table>

**Source:** computed on the basis of data available from USDA, foreign agricultural service, May 2014.

The annual growth rate of Ukraine’s wheat export in 2013/14 was 32.13%, but this year it will decrease by -10.5%. Ukraine percentage share in world wheat export increase from 2010/11 to 2013/14 that is 3.2% to 6%, respectively but again this year the share decline by 5.6% (projected) that is 0.4% decrease in share from last year this clearly shows that if situation deteriorates more decline in share of export and badly affect the Ukraine trade market. The recent situation in Ukraine is difficult to ignore the importance of trade and Crimea crisis in the black sea region may disturb the trade mechanisms. This crises boon the other countries wheat export with increase in global wheat price which rises by 3% in a week’s time, if situation deteriorates and export cutoff in near future price will reach increase so traders and wheat processor have a good opportunity to earn profit.

**Europe’s Breadbasket**

Ukraine has rich black soil, which makes the top soil fertile, it increases the significance of the black sea wheat region in the international wheat market and
Ukraine: Stand-off Threatens Europe Breadbasket

its Agri- business is booming. Between 2000 and 2010 EU import from the CIS grows by 10.1 % a year, currently Ukraine intention to leave CIS might affect the Europe trade market since Ukraine is the 3rd main source of import for EU-27 and the breadbasket of Europe. Last year Europe share in Ukraine wheat export was 143.56 thousand metric tons, Europe import wheat all over the world in 2013/14 import 5500 thousand metric tons which is 2.4 % of import from Ukraine. From table 1 it’s clear that Ukraine projected wheat export decline by -10.5% that will surely affect the Europe wheat market and demand of wheat from Europe for this the main layout is the tension between Ukraine and Russia in black sea ports. Ukraine has been playing increasingly important role as a supplier of wheat to the EU countries, they import mostly medium and low quality wheat from Ukraine from 1999 to 2008 from 2% to 40% respectively but from last few years the share of wheat export from Ukraine declining from 40% in 2008 to 2.4 % in 2013. Ukraine share in EU common wheat import for 2008-2012 is 47% and in 2013 it reduces to 5% there is drastic decline in demand of Ukraine wheat from Spain and Italy. Ukraine contraction in winter wheat production after delayed in clod wet weather which hampered and reduced production and bumper harvest in Europe is also expected to keep import below the previous season’s in 2013 and now the problem in black sea, which is main route to export commodities threaten the European demand of bread from Ukraine. The European council adopted the negotiation directives in January 2007 as part an enhanced agreement between the EU and Ukraine. The enhanced agreement will cover all aspects of EU-Ukraine relations with the goal of creating a stable and prosperous European neighborhood through closer economic ties. The European commission always supports its trading partner, though partnership or any agreement so to overcome from this problem on 10 April 2014 EU set duty free import duty quotas for Ukraine grains for this European parliament adopted the draft regulation an reduction or cancellation of the custom duties on commodities import from Ukraine now it can supply 950 thousand tons of wheat and flow to the EU on duty free basis till 31st October 2014. The trade between Ukraine and the EU are very a symmetrical while the EU is Ukraine’s 1st trading partner in 2008, Ukraine has been preferential access to the EU market because of generalized system of preference (GSP) granted to Ukraine since 1993. Ukraine export of agricultural products can be sold duty free on the EU market (at MFN zero rates). Finally, we find that establishing a free trade agreement between Ukraine and the EU would benefit Ukraine.

Ukraine wheat export intensity to EU countries

Using wheat export data export intensity index was calculated for EU member countries for the year 2010/11 to 2013/14. The result is reported in Table 2 and describe below. The result demonstrate high export and export intensities of wheat between Ukraine and EU countries the majority of the value remain above one
except 2013/14 data which is 0.625 so it means this year value is less than unity indicates low wheat export intensity between Ukraine and EU countries

Wheat Export Intensity Index

Table 2.

<table>
<thead>
<tr>
<th>Years</th>
<th>$X_{ij}$</th>
<th>$X_i$</th>
<th>$M_j$</th>
<th>$M_w$</th>
<th>$M_i$</th>
<th>$X_{IIij}$</th>
</tr>
</thead>
<tbody>
<tr>
<td>2010/11</td>
<td>479.35</td>
<td>4302</td>
<td>4621</td>
<td>134090</td>
<td>41</td>
<td>3.235</td>
</tr>
<tr>
<td>2011/12</td>
<td>1559.5</td>
<td>5436</td>
<td>7362</td>
<td>153779</td>
<td>84</td>
<td>6.085</td>
</tr>
<tr>
<td>2012/13</td>
<td>996.43</td>
<td>7190</td>
<td>5277</td>
<td>146995</td>
<td>45</td>
<td>3.942</td>
</tr>
<tr>
<td>2013/14</td>
<td>142.59</td>
<td>9500</td>
<td>3800</td>
<td>158404</td>
<td>100</td>
<td>0.625</td>
</tr>
</tbody>
</table>

Source: Agro chart.com

From data it’s clear that even the reduction in wheat export but still till last year it had high degree wheat export intensity but in 2013/14 export intensity of wheat is low this show both has good bilateral trade relation but the Crimea crisis in the black sea region may disturb the mechanisms. To overcome from this problem on 10 April 2014 EU set duty free import duty quotas for Ukraine grains.

Conclusion

The article investigates Ukraine wheat export trends from last five years and its projected export in year 2014/15 will decline by ~10.5% in growth rate that affect the world export and decrease by 0.4%.

Ukraine wheat export to Europe already declining very fast from few years, but the recent annexation of Crimea threatens Europe countries if more decline takes place it’s tough to manage the demand of bread for Europeans.

Finding show that Ukraine-EU trade has intensified over the years, Ukraine wheat export intensity index shows high degree intensity between both of them but in 2013/14 it show low degree export intensity. There is also room for further growth deepening of this growing relationship so for this European commission cancels the custom duties on commodities import from Ukraine as a short term relief from the problem.

For now the overall consequence is hard to determine but if situation deteriorates and Ukraine cutoff export, international wheat price will hike and grain prices (wheat) also come under the current circumstances and the recent development
indicates how the grain market get affected and Agri future now in danger in Ukraine. and its forecast that Ukraine harvest low wheat crop this year and projected decline in export of wheat.

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