Teagasc National Farm Survey Results 2014



Cereals Enterprise

The 2014 National Farm Survey (NFS) recorded data on 895 farms. The full financial results for these farms are available in the National Farm Survey 2014 report, (www.teagasc.ie/publications). This publication summarises the results for the major cereal enterprises (Winter wheat and Spring barley) on these farms.

In terms of representation, there were 80 farms with a Spring barley enterprise in the survey in 2013, representing approx. 84,000 hectares. Farms with less than 10 hectares of Winter wheat or Spring barley are excluded from the following analysis.

Table 1: Average gross and net margin € per hectare: Main cereal crops

	2013 Spring barley	2014 Spring barley	% Change (Spring barley)	2013 Winter wheat	2014 Winter wheat	% Change (Winter wheat)
			'13 to '14			'13 to '14
Yield per hectare	7	7	ο%	8.8	10	14%
Price per tonne	164	145	-12%	180	158	-12%
Gross Output per hectare	1229	1099	-11%	1714	1664	-3%
Fertiliser, Seed, Crop Protection	512	499	-3%	668	620	-7%
Machinery Hire	151	160	6%	109	66	-40%
Other direct costs	12	11	-8%	18	10	-44%
Total Direct Costs	675	670	-1%	799	697	-13%
Gross Margin	534	429	-20%	915	967	6%
Land Rent	45	40	-11%	80	93	16%
Other Fixed Costs	478	431	-10%	595	659	11%
Total Costs	1198	1141	-5%	1474	1449	-2%
Net Margin	31	-43	-239%	240	215	-10%

1. Analysis of Financial Performance

2014 was an exceptionally good year in terms of cereal yield which would have translated into a substantial improvement in output value were it not for the decrease in prices which were received. Cereal yields for Winter wheat, increased by 14%, whilst Spring barley yields were similar to those achieved in 2013, which were also relatively good in yield terms. However, prices for the afore mentioned crops decreased by between 12%. This resulted in a decrease in output value for both Spring barley and Winter wheat Table 1). Whilst direst costs deceased for both crops, fixed costs allocated to the cereal enterprise decreased also for Spring barley but increased for Winter wheat.

Hence, net margin decreased on Spring barley farms, by €74 per hectare, whereas net margin for the Winter wheat crop decreased by €25 per hectare, in 2014 relative to 2013. This resulted in a net margin of -€43 for Spring barley and €215 per hectare for Winter wheat (excluding Single Farm Payment figures).

Table 2 presents average margins per tonne of crop produced for 2013 and 2014. Total costs per tonne decreased for the two main crops. This cost decrease was not large enough counterbalance the decrease in prices received per tonne. In 2014 net margins for S. barley and W. wheat were -€6 and €22 per tonne respectively.

Table 2: Average gross and net margin € per tonne of S. Barley and W. Wheat

	2013 Spring barley	2014 Spring barley	Change (Spring barley) '13 to'14	2013 Winter wheat	2014 Winter wheat	Change (Winter wheat) '13 to '14
Cereal price per tonne	164	145	-12%	180	158	-12%
Total Gross Output (incl. straw)	176	157	-11%	195	166	-15%
Fertiliser, seed, crop protection	73	71	-2%	76	62	-18%
Machinery Hire	22	23	6%	12	7	-47%
Other direct costs	2	2	-8%	2.0	1.0	-51%
Total Direct Costs	96	96	-	91	70	-23%
Gross Margin	76	61	-19%	104	97	-7%
Land Rent	6	6	-11%	9	9	2%
Other Fixed Costs	68	62	-10%	68	66	-3%
Total Costs	171	163	-5%	168	145	-14%
Net Margin	4	-6	-154%	27	22	-20%

2. Variation in Financial Performance

The data in Tables 1 and 2 presents the average across all hectares and tonnes of S. barley and W. wheat in the country. The wide variation that occurs throughout the country in financial performance between different cereal producers is not apparent. Table 3 shows the average costs of production and margin for farms and splits the sample into top and bottom performers on the basis of net margin per hectare per farm.

Total costs of production per hectare are more variable in the Spring barley sample than the Winter wheat sample, with over a 20 per cent cost differential on Spring barley farms (per hectare) and only a 14% differential on Winter wheat farms. However, in 2014, less dramatic differences were evident in in gross output per hectare between the groupings for both crops. Gross output per hectare for the top half of Spring barley farms was 9% higher than the bottom half, and the same figure on Winter wheat farms was 14%. Overall, this results in a €373 and €440 per hectare difference in net margin per hectare between the bottom and top performing S. barley and W. wheat farms.

Table 3: Variation in output and margin 2014: top and bottom performing cereal farms

	Spring Barley			Winter Wheat		
	Bottom	Тор	% Diff.	Bottom	Top	% Diff.
Average crop area (hectares)	21	20		33	47	
Yield (tonnes per hectare)	6.9	7	1%	10	9.9	-1%
Price per tonne	141	148	5%	150	183	22%
Gross output (€ per hectare)	1054	1148	9%	1547	1762	14%
Fert., seed, spray (€ per hectare)	525	470	-10%	630	612	-3%
Machinery hire (€ per hectare)	198	118	-40%	82	52	-37%
Other direct costs (€ per hectare)	215	122	-43%	98	58	-41%
Gross Margin (€ per hectare)	314	556	77%	819	1093	33%
Land rent (€ per hectare)	44	35	-20%	107	82	-23%
Other Fixed Costs (€ per hectare)	270	367	35%	736	594	-20%
Total Costs (€ per hectare)	1273	994	-22%	1571	1346	-14%
Net Margin (€ per hectare)	-219	154	-170%	-24	416	-1833%

Table 4 shows the distribution of net margin per hectare on S. barley and W. wheat farms in 2013 and 2014. In 2013, 45% of S. barley farms and 21% of W. wheat farms earned a negative net margin, i.e. made a loss when all overhead costs were considered. In 2014 this proportion increased for Spring barley farms to 53% and also increased for Winter wheat farms to 25%. At the opposite end of the distribution only 4% of Winter wheat farms earned a net margin of €750 or more in 2014, with no Spring barely farms falling into this category in 2014.

Table 4: Distribution of net margin € per hectare: 2012 and 2013

Net Margin €/hectare	% of 1	farms	% of farms		
	S. Ba	arley	W. Wheat		
	2013 2014		2013	2014	
<0	45	53	21	25	
0 to 250	33	39	46	21	
250-500	19	6	17	37	
500-750	3	2	16	13	
>750	0	0	0	4	

3. Variation in Technical Performance

Table 5 presents average technical performance across all hectares in 2010, 2011, 2012, 2013 and 2014 along a number of indicators. A number of additional indicators were selected for 2014, and back casted for a number of years. Technical performance increased along all various measures examined in 2014 relative to 2013.

In addition, various Teagasc strategy documents have outlined a number of performance indicators for tillage crops for farms for the year 2025. Table 6 shows the percentage of farms that achieved a selection of these targets in 2014.

Table 5: Technical Performance Indicators

	Average 2010	Average 2011	Average 2012	Average 2013	Average 2104
S. barley land productivity (yield per hectare)	6.4	6.8	5.6	7.0	7.0
W. wheat land productivity (yield per hectare)	8.8	9.7	7.2	8.8	10.0
Labour productivity (W. wheat yield per labour unit)	774	787	666	700	756
Crop protection usage (Cost per tonne of W. wheat crop)	28	25	37	30	26
Land Rent (cost per rented hectare on specialist tillage farms)	NA	NA	NA	€311	€300
Machinery hire (cost per UAA on specialist tillage farms)	€118	€114	€100	€120	€94

Table 6: Percentage of farms achieving selected Teagasc tillage road map targets

	Percentage 2014
Barley yield >=7.3t/ha	38%
Wheat yield>=9.5t/ha	79%
Barley yield > =9 t/ha (target for top 10% of producers)	2%
Wheat yield >= 11 t/ha (target for top 10% of producers)	29%
Wheat costs <=€1,100 per ha	4%
Barley costs < =€950 per ha	24%