# CANTERBURY/MARLBOROUGH BREEDING AND FINISHING SHEEP AND BEEF

# **KEY POINTS**

- Net cash income rose \$128 000 (24 percent) in 2011/12, with high lamb, sheep, wool and cattle prices and good production levels.
- Farmers and industry commentators describe 2011/12 as the "best season ever" for weather and pasture growth.
- Farm working expenses rose 11 percent from \$294 000 in 2010/11 to \$326 000 in 2011/12. Increased disposable cash becoming available through the season as a result of improved prices and production levels enabled increased inputs into the farming system.
- Farm profit before tax nearly doubled to \$220 000 in 2011/12 but is budgeted to fall to \$185 000 in 2012/13, which is still \$75 000 above 2010/11 levels.

# Key results from the Ministry for Primary Industries 2012 sheep and beef monitoring programme

- Farmers are budgeting for a 6 percent drop in net cash income for 2012/13, due to falls in sheep and wool revenue.
   In contrast, grazing income is expected to increase and cattle and other farm income to hold.
- Following high farm profits in 2011/12, farmers will face increased terminal and provisional tax liabilities in 2012/13.
- Industry commentators observe that this exceptional season has lowered stress levels. Farmers are feeling optimistic and are well-positioned to make good decisions regarding on-farm management and longer term planning.

Table 1: Key parameters, financial results and budget for the Canterbury Marlborough breeding and finishing sheep and beef farm model

Year ended 30 June	2008/09	2009/10 <sup>1</sup>	2010/11	2011/12 actual	2012/13 budget
Effective area (ha)	469	469	475	478	478
Breeding ewes (head)	2 250	2 250	2 070	2 070	2 075
Replacement ewe hoggets (head)	415	380	465	485	500
Other sheep (head)	93	284	281	352	322
Breeding cows (head)	0	0	0	0	0
Rising one-year cattle (head)	75	60	60	70	65
Other cattle (head)	75	60	80	70	70
Opening sheep stock units (ssu)	3 084	3 212	3 076	3 146	3 159
Opening cattle stock units	1 012	913	1 280	1 482	1 572
Opening total stock units (su)	4 096	4 300	4 552	4 628	4 730
Stocking rate (stock unit/ha)	8.7	9.2	9.6	9.7	9.9
Ewe lambing (%)	125	138	136	138	136
Average lamb price (\$/head)	80.92	79.94	99.35	112.56	99.37
Average store lamb price (\$/head)	66.31	76.00	83.00	105.00	90.00
Average prime lamb price (\$/head)	84.09	80.00	100.50	113.00	100.00
Average wool price (\$/kg)	2.58	2.67	3.90	4.60	3.50
Total wool produced (kg)	13 736	13 215	12 720	13 230	13 285
Wool production (kg/ssu)	4.5	4.1	4.1	4.2	4.2
Average rising two-year steer (\$/head)	980	840	960	1 070	1 100
Average cull cow (\$/head)	NA	NA	NA	NA	NA
Net cash income (\$)	406 032	452 965	528 827	656 463	615 205
Farm working expenses (\$)	225 476	274 250	294 236	325 748	334 295
Farm profit before tax (\$)	58 693	46 615	111 496	220 039	185 144
Farm surplus for reinvestment (\$) <sup>2</sup>	20 827	15 139	69 937	151 361	74 909

# Notes

- 1 The sample of farms used to compile this model changed between 2008/09 and 2009/10. Caution is advised if comparing data between these two years.
- 2 Farm surplus for reinvestment is the cash available from the farm business, after meeting living costs, which is available for investment on the farm or for principal repayments. It is calculated as farm profit after tax plus depreciation plus stock adjustments less drawings.

Table 2: Canterbury Marlborough breeding and finishing sheep and beef model budget

	2011/12			2012/13 budget			
	Whole farm (\$)	Per hectare (\$)	Per stock unit <sup>1</sup> (\$)	Whole farm (\$)	Per hectare (\$)	Per stock unit <sup>1</sup> (\$)	
Revenue							
Sheep	386 025	808	122.71	342 800	717	108.53	
Wool	60 858	127	19.35	46 498	97	14.72	
Cattle	165 370	346	111.61	165 000	345	104.98	
Grazing income (including hay and silage sales)	98 295	206	21.24	115 933	243	24.51	
Other farm income	89 400	187	19.32	88 000	184	18.60	
Less:							
Sheep purchases	52 920	111	16.82	50 395	105	15.95	
Cattle purchases	90 565	189	61.12	92 630	194	58.94	
Net cash income	656 463	1 373	141.86	615 205	1 287	130.06	
Farm working expenses	325 748	681	70.39	334 295	699	70.67	
Cash operating surplus	330 715	692	71.47	280 910	588	59.39	
Interest	67 688	142	14.63	67 601	141	14.29	
Rent and/or leases	14 700	31	3.18	15 400	32	3.26	
Stock value adjustment	- 2 580	- 5	-0.56	11 775	25	2.49	
Minus depreciation	25 708	54	5.56	24 540	51	5.19	
Farm profit before tax	220 039	460	47.55	185 144	387	39.14	
Income equalisation	0	0	0.00	0	0	0.00	
Taxation	31 966	67	6.91	60 000	126	12.68	
Farm profit after tax	188 073	393	40.64	125 144	262	26.46	
Allocation of funds							
Add back depreciation	25 708	54	5.56	24 540	51	5.19	
Reverse stock value adjustment	2 580	5	0.56	- 11 775	- 25	-2.49	
Drawings	65 000	136	14.05	63 000	132	13.32	
Farm surplus for reinvestment <sup>2</sup>	151 361	317	32.71	74 909	157	15.84	
·							
Reinvestment	25.000	72	7.50	16.000	22	2.20	
Net capital purchases	35 000	73	7.56	16 000	33	3.38	
Development	5 258	11	1.14	4 780	10	1.01	
Principal repayments	49 388	103	10.67	30 641	64	6.48	
Farm cash surplus/deficit	61 715	129	13.34	23 488	49	4.97	
Other cash sources							
Off-farm income	6 500	14	1.40	3 000	6	0.63	
New borrowings	4 780	10	1.03	6 600	14	1.40	
Introduced funds	0	0	0.00	0	0	0.00	
Net cash position	72 995	153	15.77	33 088	69	6.99	
Assets and liabilities							
Farm, forest and building (opening)	5 773 125	12 078	1247.55	5 790 174	12 113	1224.06	
Plant and machinery (opening)	165 050	345	35.67	157 293	329	33.25	
Stock valuation (opening)	555 371	1162	120.01	552 791	1156	116.86	
Other produce on hand (opening)	0	0	0.00	0	0	0.00	
Total farm assets (opening)	6 493 546	13 585	1403.23	6 500 258	13 599	1374.18	
Total assets (opening)	6 496 546	13 591	1403.88	6 503 258	13 605	1374.81	
Total liabilities (opening)	1 126 430	2 357	243.42	1 087 430	2 275	229.89	
Total equity (farm assets - liabilities)	5 370 116	11 235	1160.46	5 412 828	11 324	1144.29	

Notes

1 Sheep stock units are used in the per stock calculation for sheep and wool income and sheep purchases. Cattle stock units are used for cattle income and purchases. The remainder of the time total stock units are used.

2 Farm surplus for reinvestment is the cash available from the farm business, after meeting living costs, which is available for investment on the farm or for principal repayments. It is calculated as farm profit after tax plus depreciation plus stock adjustments less drawings.

Table 3: Canterbury Marlborough breeding and finishing sheep and beef model expenditure

	2011/12			2012/13 budget			
	Whole farm (\$)	Per hectare (\$)	Per stock unit (\$)	Whole farm (\$)	Per hectare (\$)	Per stock unit (\$)	
Farm working expenses							
Permanent wages	27 724	58	5.99	28 680	60	6.06	
Casual wages	5 736	12	1.24	6 692	14	1.41	
ACC	1 086	2	0.23	1 148	2	0.24	
Total labour expenses	34 546	72	7.47	36 520	76	7.72	
Animal health	19 120	40	4.13	19 120	40	4.04	
Breeding	3 824	8	0.83	3 824	8	0.81	
Electricity	7 170	15	1.55	7 648	16	1.62	
Feed (hay and silage)	17 686	37	3.82	15 774	33	3.33	
Feed (feed crops)	1 912	4	0.41	1 912	4	0.40	
Feed (grazing)	3 346	7	0.72	3 824	8	0.81	
Feed (other)	6 214	13	1.34	6 692	14	1.41	
Fertiliser	57 360	120	12.40	58 316	122	12.33	
Lime	6 750	14	1.46	6 750	14	1.43	
Cash crop expenses <sup>1</sup>	8 920	19	1.93	9 000	19	1.90	
Freight (not elsewhere deducted)	10 516	22	2.27	10 516	22	2.22	
Regrassing costs	16 730	35	3.62	16 730	35	3.54	
Shearing expenses <sup>2</sup>	17 617	37	5.60	18 004	38	5.70	
Weed and pest control	16 730	35	3.62	16 730	35	3.54	
Fuel	16 730	35	3.62	17 686	37	3.74	
Vehicle costs (excluding fuel)	11 950	25	2.58	12 906	27	2.73	
Repairs and maintenance	26 290	55	5.68	26 290	55	5.56	
Total other working expenses	248 865	521	53.78	251 722	527	53.21	
Communication costs (phone and mail)	3 824	8	0.83	3 824	8	0.81	
Accountancy	4 302	9	0.93	4 302	9	0.91	
Legal and consultancy	2 390	5	0.52	2 390	5	0.51	
Other administration	3 346	7	0.72	3 346	7	0.71	
Water charges (irrigation)	1 912	4	0.41	1 912	4	0.40	
Rates	10 516	22	2.27	10 994	23	2.32	
Insurance	10 038	21	2.17	11 950	25	2.53	
ACC employer	3 619	8	0.78	4 467	9	0.94	
Other expenditure	2 390	5	0.52	2 868	6	0.61	
Total overhead expenses	42 337	89	9.15	46 053	96	9.74	
Total farm working expenses	325 748	681	70.39	334 295	699	70.67	
Calculated ratios							
Economic farm surplus (EFS <sup>3</sup> )	227 427	476	49.15	193 145	404	40.83	
Farm working expenses/NCI <sup>4</sup>	50%			54%			
EFS/total farm assets	3.5%			3.0%			
EFS less interest and lease/equity	2.7%			2.0%			
Interest+rent+lease/NCI	12.6%			13.5%			
EFS/NCI	34.6%			31.4%			
Wages of management	75 000	157	16.21	75 000	157	15.86	

Includes forestry expenses.

2 Shearing expenses per stock unit based on sheep stock units.

3 EFS is calculated as follows: net cash income plus change in livestock values less farm working expenses less depreciation less wages of management (WOM). WOM is calculated as follows:

\$31 000 allowance for labour input plus 1 percent of opening total farm assets to a maximum of \$75 000.

<sup>4</sup> Net cash income.

# FINANCIAL PERFORMANCE OF THE **CANTERBURY/MARLBOROUGH BREEDING** AND FINISHING SHEEP AND BEEF FARM **MODEL IN 2011/12**

Better prices and improved production levels for lambs, sheep, cattle, wool and grazing increased the cash operating surplus for the breeding and finishing sheep and beef farm model by \$96 000 (41 percent).

# HIGHER PRICES AND HEAVIER WEIGHTS LIFT INCOME

Net cash income increased 24 percent to \$656 500 in 2011/12, compared with the previous year's result, which was also a good year. This year's exceptional result is not expected to be repeated in 2012/13. Sheep sales less purchases increased 18 percent from 2010/11, with a lift in prices for all classes of stock and higher lamb numbers from a 138 percent lambing.

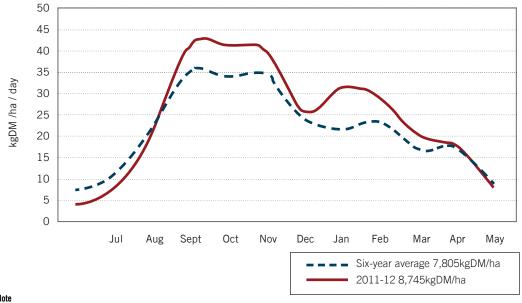
# Lamb prices up but fell from early season peak

The average lamb price, at \$112 per head, was up 13 percent on 2010/11. Farmers are accustomed to a falling lamb schedule through the season, but the 2011/12 fall was greater than expected, disappointing farmers. The lamb schedule fell from a peak of \$8.00 per kilogram carcass weight (\$140 per lamb) in December to \$5.60 per kilogram (\$100 per lamb) in May. Store lamb prices were strong early in the season, with typical sales at \$3.50 to \$3.70 per kilogram liveweight (\$90 to \$110 per lamb) in Canterbury during November and higher prices paid in Marlborough. Store lamb prices declined from \$2.90 per kilogram in February (\$80 per lamb) to \$2.80 per kilogram in May (\$70 per lamb). This disappointed some farmers as they would have received more for lambs had they sold earlier in the season than they did finishing them in late autumn. These prices were partly driven by the exceptional pasture growth during the season. As shown in Figure 1, pasture production at Hororata was 12 percent above usual levels.

# Wool prices and weights both up

The average wool price of \$4.60 per kilogram in 2011/12 was 18 percent above the previous year's price of \$3.90, which was itself 46 percent above the 2009/10 price of \$2.67. Wool weight lifted slightly to 4.21 kilograms per sheep stock unit, due to good feeding levels in both the 2010/11 and 2011/12 seasons. A change in shearing policy to six or eight month shearing has occurred on some farms this year as a means of improving wool clip quality with the longer fleece growth. At lower prices, this practice is uneconomic.





# Flexible cattle policies with an increase in grazing systems

Various cattle policies are farmed in this model. Cattle sale prices were up for all classes of stock in 2011/12, due to heavier individual animal weights, resulting from ample feed supplies. Rising two-year cattle prices increased 11 percent from \$960 to \$1070 reflecting the heavier weights. Cattle income less purchases rose 28 percent in 2011/12 to \$74 800. The cattle stocking rate is steadily increasing in the model, due to greater grazing stock numbers, while finishing cattle numbers remain stable. For these farmers, having flexibility to change and move between cattle policies is important to maximise cattle returns. Climatic conditions are also important, and farmers value the ability to dispose of stock if feed supply tightens.

# Grazing income climbs

Income from grazing has increased more than any other income source, rising 38 percent from \$71 000 in 2010/11 to \$98 300 in 2011/12. The increasing importance of grazing stock to this farm model has been identified for several years now and is expected to continue. Dairy grazing is the largest class and offers a range of policies outside the traditional cattle policies of growing young stock or wintering cows. Other dairy cattle policies include buying Jersey bull calves for later sale as bulls to mate heifers, buying good "carryover" cows (pregnancy tested as empty) for mating and later sale as in-calf cows or buying and rearing recorded heifer calves for later sale.

Increasing flexibility is apparent with a variety of cattle, and now also sheep, grazing policies. In 2011/12, farmers also grazed lambs on contract at a price per kilogram of liveweight gain. Some sold their own lambs early at higher prices and later,

with good feed levels, were happy to be paid to grow lambs on a per kilogram contract.

# Other income stable

Cereal crops also benefited from good growing conditions in 2011/12. Record cereal yields of over 10 tonnes per hectare were recorded on land that might usually average 6 tonnes per hectare. However, with the good harvest, prices fell so income remained static.

# SIGNIFICANT RISE IN EXPENDITURE AS CASH SURPLUSES SPENT ON **FARM INPUTS**

Farm working expenses rose 11 percent, from \$619 per hectare in 2010/11, to \$681 per hectare in 2011/12, as a result of disposable cash becoming available through the season with improved prices and production levels. Better product prices made it economic for farmers to increase inputs on productive parts of the farm system. Expenditure in several areas increased by more than 10 percent: animal health (15 percent), breeding (12 percent), feed (22 percent), fertiliser (15 percent), weed and pest control (24 percent) and repairs and maintenance (13 percent). Despite this increased spending, and due to the higher income, farm working expenses as a percentage of net cash income fell to 50 percent in 2011/12 after two years at 56 percent.

# Fertiliser

Fertiliser expenditure rose 15 percent, half from cost increases and half from increased tonnage. The cost rises included increases in freight, spreading charges and the price per tonne of some fertilisers. The additional fertiliser was applied to feed crops to increase quality and yield. Farmers recognise the value in yield of feed crops, which are generally sold per kilogram of dry matter.

Table 4: Canterbury Marlborough breeding and finishing sheep and beef model

Year ended 30 June	2008/09 (\$)	2009/10 (\$)	2010/11 (\$)	2011/12 (\$)	2012/13 budget (\$)
Sheep sales less purchases	230 519	254 295	282 734	333 105	292 405
Cattle sales less purchases	66 875	37 015	58 550	74 805	72 370
Wool	35 438	35 284	49 608	60 858	46 498
Grazing income (including hay and silage sales)	49 800	64 128	71 030	98 295	115 933
Other income	23 400	62 243	66 905	89 400	88 000
Net cash income	406 032	452 965	528 827	656 463	615 205

# Note

The sample of farms used to compile this model changed between 2008/09 and 2009/10. Caution is advised if comparing data between these two years.

# Feed expenditure soars

Feed expenses rose 22 percent in 2011/12 due to increased conservation of surplus pasture as baleage, silage and hay. Kind weather conditions in winter 2011, with record winter feed crop yields, were followed by strong pasture growth in spring and early summer. The good growing conditions resulted in more silage and baleage being made than normal and some harvesting of hay – a practice rare in recent years. Farmers have rebuilt conserved feed reserves, with extra supplies of silage now stored for the long term.

The areas of forage crops grown for feed as a cash crop for dairy grazing have increased. Such crops are sold at a price per kilogram of dry matter. Weed and pest expenses have also risen with the increase in feed crops and cereal crops being sown.

# Insurance climbs, interest falls

As predicted, insurance costs have climbed in response to the Christchurch earthquakes. The 17 percent increase in 2011/12 is expected to be followed by another 19 percent increase in 2012/13. In contrast, further falls in interest rates in 2011/12 have resulted in a 20 percent reduction in interest costs as fixed-term loans finish and move onto floating

or short-term fixed rates of less than 6.5 percent. Debt servicing, including rent and lease for the farm model, dropped to 13 percent of the net cash income in 2011/12, from 19 percent in 2010/11, mostly as a result of the increased income.

Farmers have taken the opportunity to consolidate their financial position by reducing debt to put them in a stronger position for the future. Industry commentators suggest this debt reduction has largely focussed on the current account rather than on long-term debt.

# FARM PROFIT BEFORE TAX NEARLY DOUBLES

The 24 percent rise in net cash income and relatively modest 11 percent increase in farm working expenses resulted in farm profit before tax of \$220 000 in 2011/12. This was nearly double the 2010/11 figure, which was said at the time to be at the highest level for many years. The resulting farm cash surplus increased four-fold to \$61 700. Industry commentators observe that low farmer stress from this exceptional season has farmers feeling optimistic and well positioned to make good decisions in on-farm management and longer term planning.

# BUDGET FINANCIAL PERFORMANCE OF THE CANTERBURY/MARLBOROUGH BREEDING AND FINISHING SHEEP AND BEEF MODEL FARM IN 2012/13

With a drop in sheep and wool revenue, the cash operating surplus for the breeding and finishing sheep and beef farm model for 2012/13 is expected to fall 15 percent to \$280 900, compared with the exceptional 2011/12 year. In contrast, grazing income is budgeted to increase 18 percent and cattle and other farm income to hold. All income and profit expectations are still above 2010/11 levels, except for wool revenue.

# REVENUE EXPECTED TO FALL 6 PERCENT

Farmers are cautious about lamb and sheep prices for next year and are budgeting for a return to the \$99 average lamb price of 2010/11. Cattle and grazing prices are expected to increase slightly, but a large fall of 24 percent in the wool price, to \$3.50 per kilogram, is expected.

# Good lambing expected

Lambing is expected to be 136 percent for 2012, and ewes and hoggets entered winter in good condition. Lambing would have been budgeted higher if ewes had been on higher quality feed with a rising plane of nutrition to give a flushing effect. However, this was not the case on many farms, which had poor-quality feed following the growthy season.

# Cattle revenue supported by heavier weights

Cattle prices are expected to increase slightly in 2012/13 due to heavier stock being carried through winter after the ample feed supply of 2011/12. Young cattle will also carry extra weight into the new season and this is expected to reflect in sale prices.

# Dramatic fall in wool price

Farmers were predicting \$4.60 per kilogram for wool would carry through to 2012/13, but the price dropped considerably towards the end of the 2011/12

season and industry commentators advise a forecast price of \$3.50 per kilogram is more appropriate. Wool weights are expected to stay at the 2011/12 level of 4.21 kilograms per sheep stock unit due to good feeding levels throughout the past 12 months.

# Grazing continues to grow

The trend to increase income from dairy and other cattle and sheep grazing is expected to continue, with grazing revenue budgeted to rise 18 percent in 2012/13. An ongoing annual increase in the cattle stocking rate reflects this trend.

# Crop policy price dependent on spring prices

Farmers indicate that the 2012/13 area grown in wheat and barley will be similar to 2011/12, despite indications of a drop in feed grain prices. However, if prices are low in spring they may replace springsown barley with feed crops. Winter brassicas are starting to be considered a cash crop. They occupy land from October to the following August and are sold per kilogram of dry matter for dairy grazing.

# EXPENDITURE HELD AT NEW HIGHER LEVEL

Following a year of high expenditure, farmers expect to hold or reduce discretionary spending in 2012/13. However, industry commentators predict expense levels will remain at or exceed the higher levels of 2011/12 if anticipated price and production levels are achieved.

# Grazing feed costs and insurance to rise again

Farmers are budgeting for only a few large cost increases in 2012/13, these being grazing (14 percent) and insurance (19 percent). Smaller increases have been budgeted for electricity (7 percent), feed other (8 percent), fuel (6 percent), vehicle (8 percent) and rates (5 percent).

# Most expenses unchanged

Farmers expect most expenses for 2012/13 to be similar to 2011/12 levels. Feed expenses for 2012/13 are anticipated to be slightly lower, with a more normal season expected and less feed conservation planned. Weed and pest control and regrassing are being held constant. However, grass grub damage in pastures following the moist growthy season in 2011/12 may mean some pastures require treatment or repair in 2012/13.

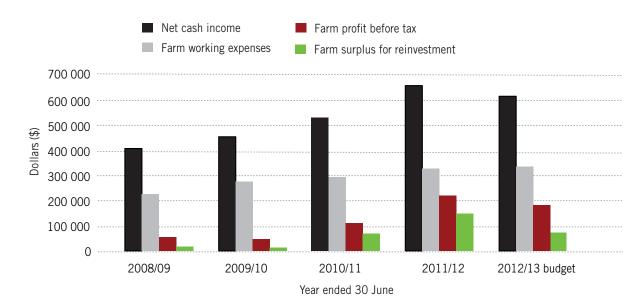
# Tax planning is important

Following the high farm profit in 2011/12, farmers will face increased terminal and provisional tax liabilities in 2012/13. Accountants have commented that tax planning will be important to their farming clients this year. The farm model has budgeted taxation of \$60 000, an increase of 88 percent over 2011/12. Most farmers no longer have tax losses carried forward from previous years to reduce their tax liability. Farmers entered 2012/13 with advice that they will benefit from forward planning and good management of expenditure in the coming year.

# **NET RESULT WEAKENS**

Net farm profit before tax is expected to decrease 16 percent to \$185 100 in 2012/13. This profit is sufficient to cover expected tax, and reduced capital, development and principal payments and leave a net cash position of \$33 100.

Figure 2: Canterbury/Marlborough breeding and finishing sheep and beef model profitability trends



# INFORMATION ABOUT THE MODEL

This model represents 1555 finishing breeding farms in coastal Marlborough and Canterbury. Farms are located on the dry downs and plains, in irrigated areas and in the higher rainfall upper plains. Farm sizes, stocking rates, stock classes and performance vary in this region. The farms in the model have an average effective area of 478 hectares and normally run nine to ten stock units per effective hectare.

Breeding ewe flocks with lamb finishing predominate, with cattle finishing and/or grazing generating income on many properties. Some farmers also derive income from cash cropping, deer, beef breeding cows, lamb finishing, farm forestry and off-farm sources. Cattle returns are calculated on a beef finishing policy.

Please note that the sample of farms has changed between 2008/09 and 2009/10. Caution should be taken if comparing data between these two years.

Farm monitoring models calculate sheep stock units based on lambing performance. One standard sheep stock unit is based on a ewe lambing greater than 111 and less than 120 percent. Based on the lambing percentage for this model breeding ewe numbers were multiplied by 1.2 stock units in both years. Any per stock unit calculations or indices should take this into account when comparing to other sources of financial information.

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ISBN 978-0-478-40401-2 (Print) ISBN 978-0-478-40400-5 (Online)

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