

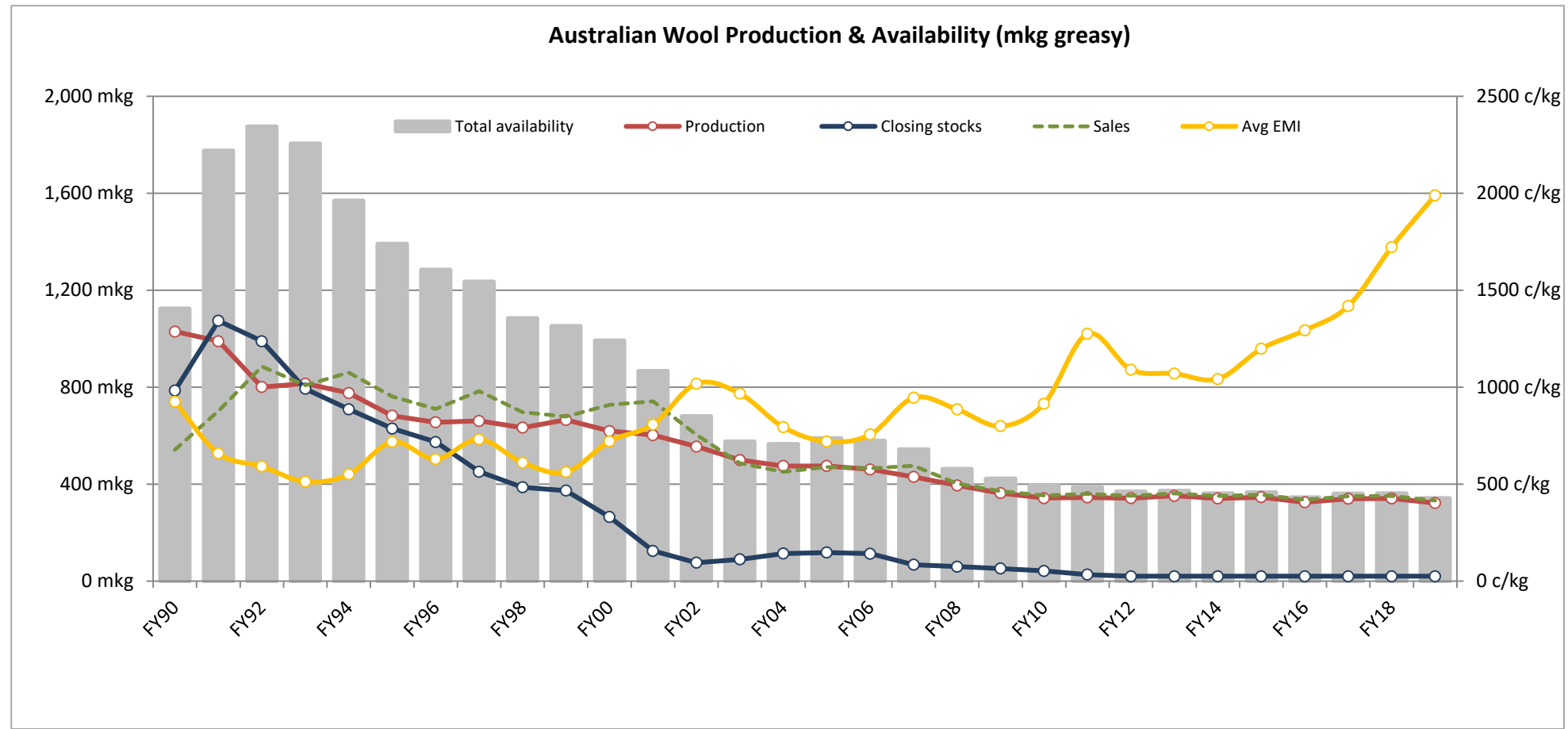


AWI Monitoring and Evaluation Review

Key measures for analysing wool grower profitability



Australian wool production continues to shrink despite strong price signals ...

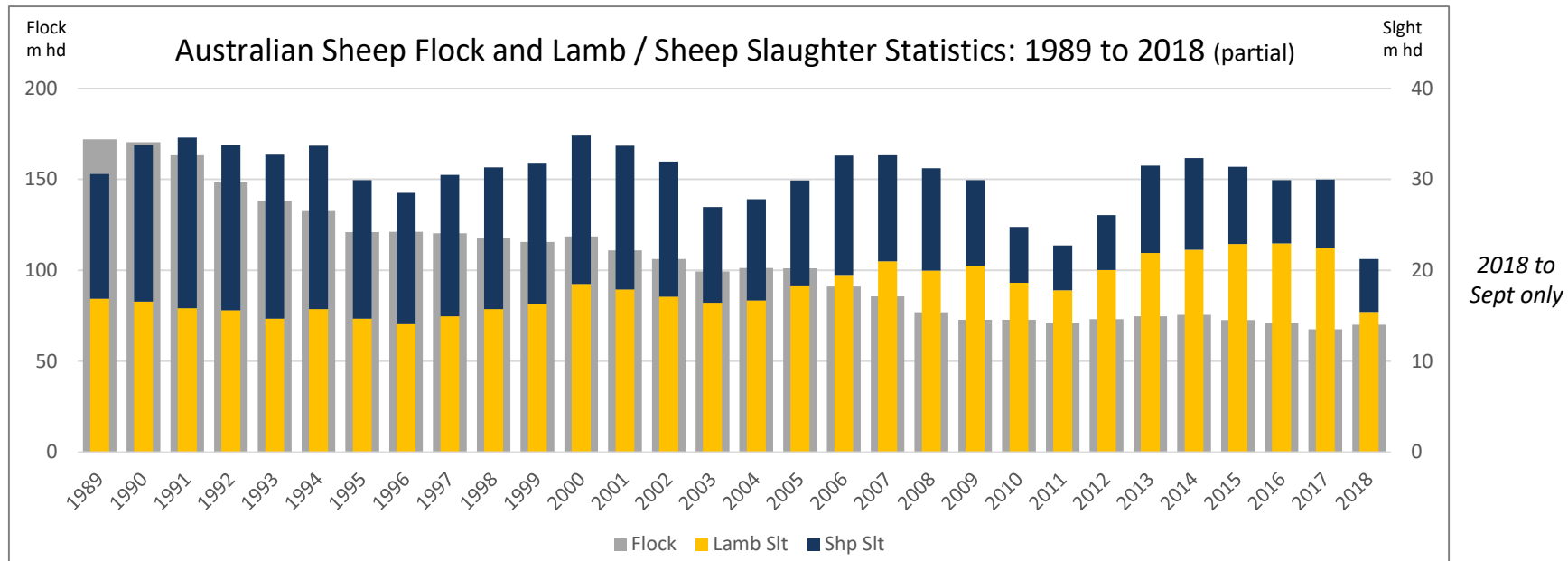


... indicating that wool price alone is not enough to reverse the contractionary trend

Source: ABARES.



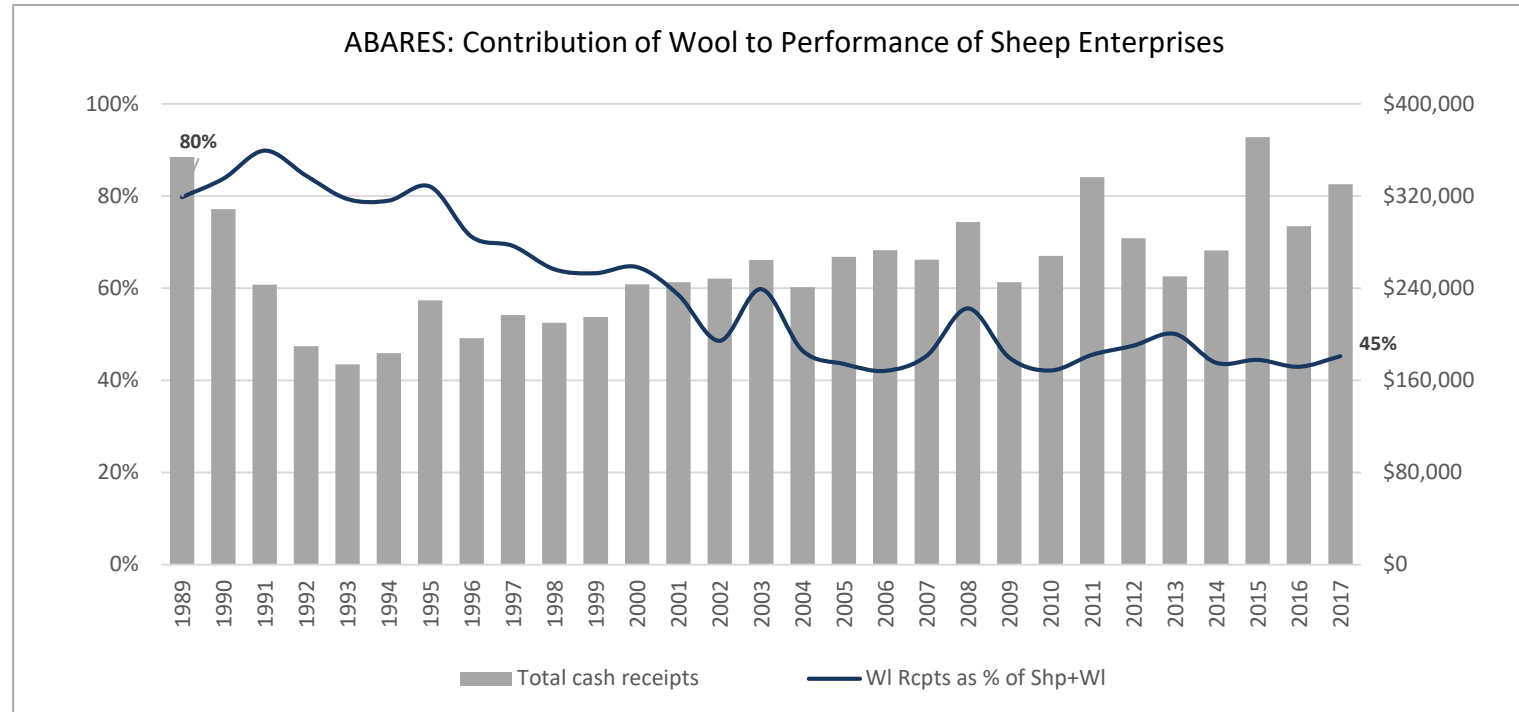
The sheep sector has clearly moved to meat as the primary driver for running sheep ...



... with wool being a co-product – albeit of increasing value



Wool has shifted from being 80% of the revenue stream from running sheep to less than half ...

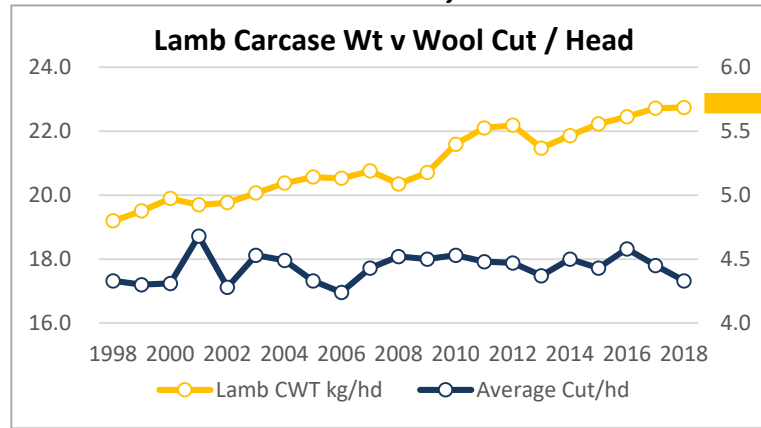


... despite the significant lift in wool prices in recent years



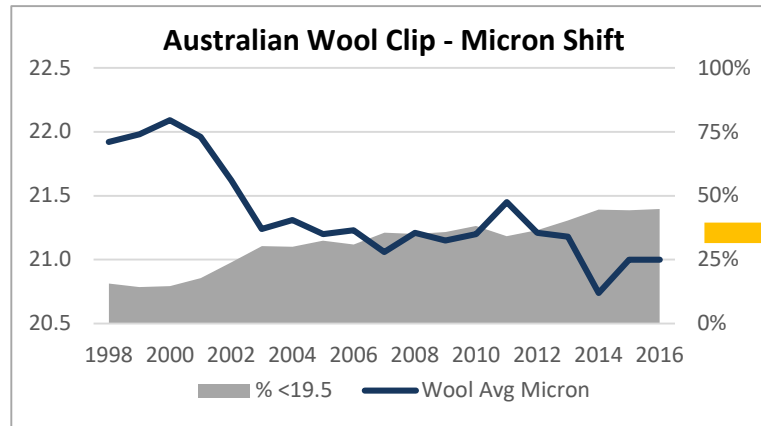
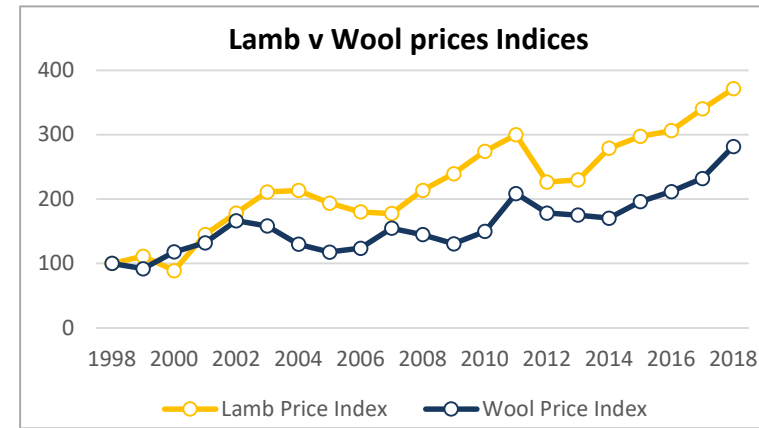
The value per unit of lamb production is outpacing wool ...

Productivity



\$495m impact

Price



\$374m impact

Simplification: Wool demand and price driven by fashion, growing middle class and competing fibres – meat demand and price by overall population growth, GDP growth, urbanisation and westernisation of diets in developing countries

The production decision is driven by profitability

... from both productivity and pricing perspectives

Source: ABARES, AWI, MLA – National data.



Australian broadacre operations utilise ~\$350 billion of assets
Specialist sheep (meat / wool) operations generate returns on assets below
the average for broadacre enterprises ...

Ungeared % return on farm assets managed across enterprise types (Broadacre)	Enterprise ↻	Cropping	Mixed	Beef	Sheep- Beef	Sheep	All
	1989	5.2	4.7	1.1	2.6	4.5	3.5
	1989-2017	3.7	1.4	0.4	0.4	0.2	1.4
	2013-2017	4.6	2.4	0.6	1.2	1.0	2.0
	2017	6.0	3.9	2.1	2.8	2.4	3.2

... although recent higher meat and wool prices have lifted performance



Segmenting the ABARES analysis by scale and management quartile identifies the opportunities for improvement ...

Australia: Sheep Enterprises – Ungeared % return on farm assets managed. 2013 to 2017 (average)

Ungeared % return on farm assets managed for specialist sheep / wool enterprises	Scale / Quartile	Q4	Q3	Q2	Q1	All
	> 1m	1.1	3.3	5.4	8.1	4.2
	500k – 1m	-0.3	1.6	3.4	6.1	2.6
	200k – 500k	-2.0	0.1	1.3	3.3	0.7
	< 200k	-5.2	-2.4	-0.8	0.8	-1.6
	All	-1.8	0.5	1.9	3.3	1.0

↑
Scale

→
Management / adoption of productivity initiatives

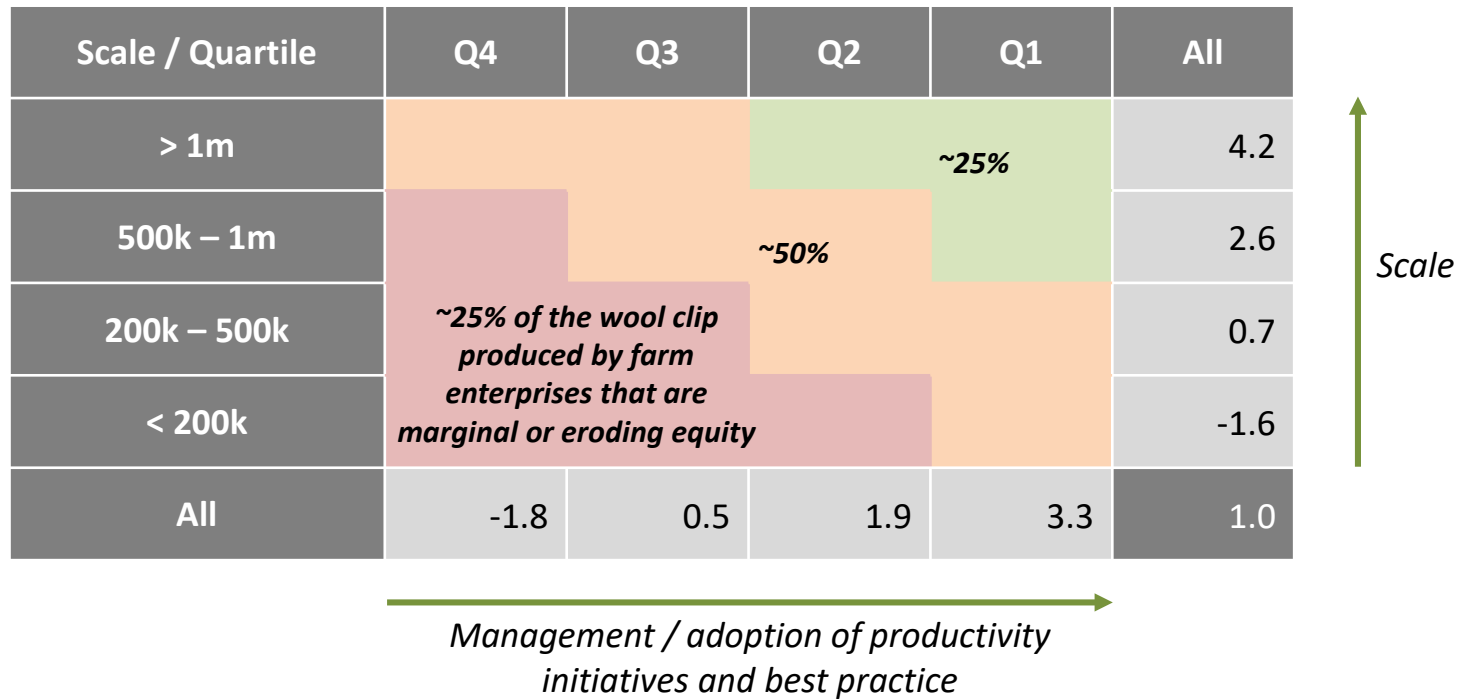
... as well as those segments at risk from further restructuring / consolidation

Source: ABARES. Farm gate returns – scale depicted by range of value of EVAO – estimated value of agricultural operations. Returns also segmented into quartiles indicating management impact.



Segmenting the ABARES analysis by scale and management quartile identifies the opportunities for improvement ...

Australia: Sheep Enterprises – Ungeared % return on farm assets managed. 2013 to 2017 (average)



... as well as those segments at risk from further restructuring / consolidation

Source: ABARES. Farm gate returns – scale depicted by range of value of EVAO – estimated value of agricultural operations. Returns also segmented into quartiles indicating management impact.



Specialist sheep (meat / wool) producers ultimately pursue a return on farm assets managed...

Australia: **Sheep** Enterprises – Capital employed per head of sheep. 2013 to 2017 (average)

Scale / Quartile	Q4	Q3	Q2	Q1	All
> 1m	1,150	1,002	738	557	840
500k – 1m	1,061	937	1,370	838	1,031
200k – 500k	1,362	1,194	1,068	784	1,054
< 200k	1,148	1,053	1,128	969	1,061
All	1,162	1,045	1,053	818	1,002

Average capital per head of sheep = \$1,002

Australia: **Sheep** Enterprises – Capital employed per kg of wool produced. 2013 to 2017 (average)

Scale / Quartile	Q4	Q3	Q2	Q1	All
> 1m	219	202	149	102	163
500k – 1m	231	184	312	193	223
200k – 500k	345	276	243	187	249
< 200k	297	285	306	248	279
All	262	237	242	188	228

Average capital per kilo of wool (greasy) of sheep = \$228

... and must match alternative commodities competing for the finite capital applied in agriculture

Source: ABARES. Farm gate returns – scale depicted by range of value of EVAO – estimated value of agricultural operations. Returns also segmented into quartiles indicating management impact. Capital inefficiency may be influenced by producers' capacity to fully stock subject to capital availability



The direct allocation of farm assets to wool production is estimated at ~\$27 billion ...

	\$/hd	\$/kg	
Sheep Enterprises – Capital employed	\$1002	\$228	
Sheep + Wool receipts = ~80% of total receipts	\$800	\$180	
Wool = ~45% of Sheep + Wool receipts	\$360	\$80	Estimated direct farm assets allocated to wool = ~\$27Bn

- *To achieve a 1% increase in Return on Farm Assets Employed (RoFAM) related to wool production an increase in profitability of ~\$3.60 per head of sheep or \$0.80 per kilogram of greasy wool is required (or a mix of the two)*
- *Alternatively, reducing the capital employed for a given unit of production (via productivity) will also increase capital yields*

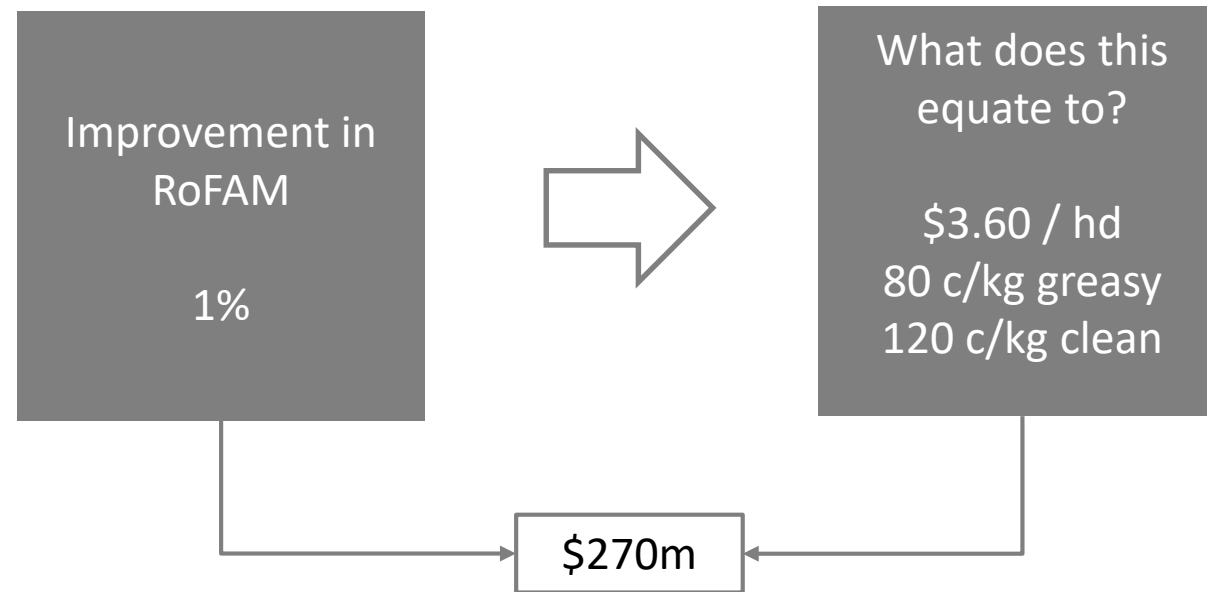
... implying each 1% increase in returns requires a net improvement of \$270m

Allocated capital to wool based on 340 mkg greasy and \$80/kg direct capital allocation



Focussing on improving RoFAM simplifies the process of evaluating programs...

Example only



... with every contributing project assessed on the impact it has on RoFAM

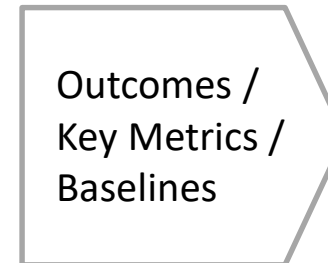


Focussing on improving RoFAM simplifies the process of setting targets and evaluating programs...

OVERALL AWI MEASURE			
Return on Farm Assets Managed			
PRODUCTIVITY Sheep Production Woolgrower Services Research Adoption	EFFICIENCY Sheep Production Woolgrower Services PIEE Research Adoption Supply chain	DEMAND Marketing Digital PIEE Market Access e.g. Emerging markets & new products Accessibility e.g. WoolQ	PRICE Marketing Digital PIEE Marketing Campaigns Supply Chain



Identifying measurable outcomes will define the baseline measures required ...



- On farm
 - ABS
 - ABARES
 - SBTM
 - AWI Surveys
 - Project based
- Supply chain
 - SBTM
 - IWTO
 - AWI Surveys
- Demand side
 - IWTO
 - Nielsen
 - FAO
 - EIU
 - AWI Surveys



Q & A