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The Kangaroo Industry

Catherine Money, March 2022 (Update of *Leather International*, October 2010, p28 Sustainable and Humane Kangaroo Industry)



This picture was published on March 4, 2022 during the devastating floods across Queensland and NSW

Ecologists want the Australian kangaroo industry to be expanded because it is a production system more attuned to Australia's fragile arid rangelands than European based agriculture. However, it comes under regular attack from radical animal liberation groups who want to ban the export of kangaroo products. If this occurred, kangaroos would still be culled by farmers but would not be utilised.

In 2018, H.J. Lavery edited a book, 'Kangaroos: A Long-Term Population Study'. The conclusion was that culling of the eastern grey kangaroo is scientifically justifiable as a management action – one that is in the broad interests of the kangaroo family to foster.

In 2021, Lavery wrote another important book, 'Conserving Nature: Fewer Laws, More Science'. In particular, it contains a case study on the need for kangaroo culling. Dr Hugh Lavery is one of Australia's longest serving environmental scientists.

Ruminant livestock produce the greenhouse gas methane and so contribute to global warming and biodiversity reduction. Methane from the foregut of cattle and sheep constitutes about 10% of Australia's total greenhouse gas emissions (GHG). In contrast, kangaroos are nonruminant, forestomach fermenters that produce negligible amounts of methane. Farmers have few options to reduce the contribution that livestock make to GHG production. Using kangaroos to produce low-emission meat is an option for the Australian rangelands for the long-term benefit of both humans and kangaroos.

Kangaroo leather is one of the strongest, light-weight leathers known. As a result it is the leather of choice for high stress, high performance applications such as premium soccer boots and other heavy duty sports and accessory applications. The light weight, strength and fine grain appearance of kangaroo leather also makes it desirable for fashion and casual footwear, apparel and accessories. Not only are kangaroo leather shoes extremely comfortable, many also consider them the most ecological shoes available.

A number of key independent expert associations endorse the Kangaroo industry on the basis of its long-term environmental sustainability and responsibility. The Royal Society for the Prevention of Cruelty to Animals (RSPCA) independently monitored the kangaroo harvest and have suggested that kangaroo harvesting could be one of the most humane slaughter methods possible. The kangaroos are killed instantly in their own environment without any of the stress of trucking and food deprivation involved in the beef or lamb industries.

Various organisations, including CSIRO, support the kangaroo industry for many reasons, mostly because they see kangaroos as a more environmentally friendly way to produce meat in Australia than introduced sheep or cattle. Kangaroos eat grasses not grain and the meat is low in fat and cholesterol. The Australian Veterinary Association (AVA) believes that the Australian kangaroo population is a unique and valuable resource and that harvesting is a legitimate and humane use of that resource.

The kangaroo harvest is strictly controlled by the Australian government and its Kangaroo Management Program ensures that the harvest is both sustainable and humane. After over 50 years of regulated commercial harvesting, kangaroo populations remain the same as the long run average, and are certainly more abundant than they were before European settlement.

References

2018, H.J. Lavery editor, 'Kangaroos: A Long-Term Population Study'
2021, H.J. Lavery 'Conserving Nature: Fewer Laws, More Science'.
2010, C A Money 'The Sustainable and Humane Kangaroo Industry': *Leather International Oct 2010* p 28

My article published in 2010 is attached.

Yours sincerely Catherine A. Money

Call A May

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The Sustainable and Humane Kangaroo Industry

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The kangaroo industry is widely hailed within Australia as something of a shining light in sustainable and environmentally friendly resource use. Many eminent ecologists regularly call for it to be greatly expanded

because it is a production system more attuned to our fragile arid rangelands than European based agriculture. However it also comes under regular attack from radical animal liberation groups. Recently some such activists wanted the EU to ban imports of kangaroo products. EU Parliamentarians and the media needed to understand that doing so would have been tantamount to supporting environmental vandalism in Australia. Kangaroos would still be culled but they would not be utilised.

Kangaroo leather is one of the strongest, light weight leathers known. As a result it is the leather of choice for high stress, high performance applications such as premium soccer boots and other heavy duty sports and accessory applications. The light weight, strength and fine grain appearance of kangaroo leather also makes it desirable for fashion and casual footwear, apparel and accessories. Not only are Kangaroo Leather shoes extremely comfortable, many also consider them the most ecological shoes available

The inherent strength of Kangaroo Leather is derived from its highly uniform orientation of fibre bundles in parallel with the skin surface, known as a low angle of weave. The kangaroo fibre structure has an angle of weave less than 30°. This differs significantly from the weaker bovine leathers which typically have weave angles in excess of 60°, and goat and cabretta leathers, which range between 45° and 60°. Further, the skin does not contain fat, sweat glands or erector pili muscles and elastin is evenly distributed throughout the skin thickness. This structure explains both the high tensile strength of kangaroo leather and the great retention of strength even in split leather.

In many other skin processing industries, salting is widely used to preserve hides and skins before tanning. However, in most cases fresh kangaroo skins are processed directly to pickled pelts without salting. This is a far more efficient handling system from both an economic and environmental point of view. It avoids double handling with all its associated on costs, and also reduces salt consumption and associated environmental considerations. The tanning of kangaroo skins in Australia uses world best environmental practice; environmental sustainability is excellent.

The kangaroo harvest is strictly controlled by the Australian government and its Kangaroo Management Program is designed to ensure that the harvest is both sustainable and humane. A key aspect of these controls is the tracking of Kangaroos along the full length of the value chain – a practice that more recently is being widely embraced by the global tanning industry. All harvesters must undergo training and assessment by regulatory authorities. Each kangaroo harvested is tagged, and intensive monitoring is involved in all aspects of the industry to ensure compliance.

There are 48 species of kangaroos in Australia of which only 4 can be commercially harvested. Kangaroo populations are estimated every year by Government authorities to determine a sustainable quota which is typically set at 10-15% of the total population. After 40 years of commercial harvesting, Kangaroo populations remain the same as the long run average, and are certainly more abundant than they were before European settlement. There are over 25 million kangaroos in Australia today; they are considered super-abundant and certainly not endangered.

A number of key independent expert associations endorse the Kangaroo industry on the basis of its long-term environmental sustainability and responsibility. The Royal Society for the Prevention of Cruelty to Animals (RSPCA) independently monitored the kangaroo harvest and have suggested that kangaroo harvesting could be one of the most humane slaughter methods possible. The kangaroos are

killed instantly in their own environment without any of the stress of trucking and food deprivation involved in the beef or lamb industries. Various organisations including CSIRO support the kangaroo industry for a wide range of reasons, mostly because they see kangaroos as a more environmentally friendly way to produce meat in Australia than introduced sheep or cattle. In addition, the meat is low in fat and cholesterol. Further, The Australian Veterinary Association (AVA) believes that the Australian kangaroo population is a unique and valuable resource and that harvesting is a legitimate and humane use of that resource.

Ruminant livestock produce the greenhouse gas methane and so contribute to global warming and biodiversity reduction. Methane from the foregut of cattle and sheep constitutes 11% of Australia's total greenhouse gas emissions (GHG). Kangaroos, on the other hand, are nonruminant, forestomach fermenters that produce negligible amounts of methane. Farmers have few options to reduce the contribution that livestock make to GHG production. Using kangaroos to produce low-emission meat is an option for the Australian rangelands for the long-term benefit of both humans and kangaroos. Also, kangaroos cause less damage to fragile Australian soils than introduced hooved sheep and cattle. Goats and kangaroos are often the most efficient way to produce food from marginal land as they convert inedible grasses in to food. Modest levels of grazing can in fact cause much less ecological damage than growing crops.

Vegetarian activists typically target high profile soccer players wearing kangaroo leather in order to generate publicity based on media hype and misinformation. These groups are generally opposed to any form of animal use by industry. However, what could possibly make greater environmental sense than Australians continuing to value and sustainably harvest an abundant native species? Because kangaroos eat grasses not grain and emit almost no methane, they produce the most environmentally-friendly meat we can eat and skins we can make into leather.

The kangaroo industry is sustainable and humane and works in close partnership with government and independent experts to continually review populations and enforce compliance. It is this cooperative commitment to an environmentally responsible use of a native resource which should be the focus of international attention rather than efforts by activists to use high profile sports people to create media hype and promote false perceptions.

References

- Native wildlife on rangelands to minimize methane and produce lower-emission meat: kangaroos versus livestock, George R. Wilson & Melanie J. Edwards, *Conservation Letters*, 1 (2008) 119–128.
- What happens if we all quit meat? A vegan world would not necessarily be a better one. *New Scientist*, **207**, 17 July 2010, 28-31.
- AVA (1998) Submission to Senate Inquiry into Wildlife Utilisation.
- CNCM (1990) Code of practice for the humane shooting of kangaroos. Environment Australia.
- RSPCA (1985). Incidence of cruelty to kangaroo. Report to Australian National Parks and Wildlife Service
- RSPCA (2002). Kangaroo Shooting Code Compliance.
- More detailed information on the kangaroo industry is available from the following website references:
 - http://www.kangaroo-industry.asn.au
 - http://www.kangaroo-industry.asn.au/morinfo/BACKGR1.HTM
 - http://www.kangaroo-industry.asn.au/morinfo/fs023.pdf
 - http://www.environment.gov.au/biodiversity/trade-use/wild-harvest/kangaroo/practice.html