

## Kangaroo Partnership Project: Optimising kangaroo management in South Australia

EA Gregg\*, J Gregg-Smith\*\*

\* Kangaroo Partnership Project, SA

\*\*South Australian Arid Lands Landscape Board, SA

### ABSTRACT:

The Kangaroo Partnership Project aims to address kangaroo populations posing risks to animal welfare, conservation and land management, cultural values, and the livelihoods of local communities. This paper summarises the progress made by the project to date, including outcomes of funded projects addressing kangaroo management through pathways including land manager support, kangaroo industry opportunities, and public engagement. We present challenges identified through the project and suggest future priorities. The Kangaroo Partnership Project has taken crucial steps to improve kangaroo management in South Australia, however, much work remains to ensure long-term and ethical kangaroo management at a state and national level.

**Keywords:** overabundant species, macropod management, social licence, wildlife management, stakeholder engagement, public engagement

### Introduction

Since European settlement, some kangaroo populations (i.e., Western Grey Kangaroos, Eastern Grey Kangaroos, Euros, and Tammar Wallabies) have increased due to changing land management practices, such as increased water sources and predator removal (Morris and Letnic 2017). These increased populations can negatively impact animal welfare, biodiversity values, sustainable land management, cultural values, and the livelihoods and of local communities (Sharp 2015). In 2017, record high populations of kangaroo species in regional South Australia were followed by massive die-off due to the years of drought that followed, resulting in severe animal welfare impacts and distress to local communities (Wilson and Edwards 2019).

This paper presents an overview of the Kangaroo Partnership Project, a project aiming to support improved kangaroo management in the regions of South Australia following the severe impacts witnessed during the 2019 drought (Read *et al.* 2021). The initiative, spanning an initial duration of two years, and extended for a further six months (June 2021-December 2023), was funded through the South Australian Landscape Priorities Fund. The project is led by the SA Arid Lands Landscape Board and guided by a steering committee, including representatives from partner SA Landscape Boards, government departments, conservation organisations, pastoralists, and animal welfare interest groups.

### Project approach

A major success of the project was its partnership approach which allowed for collaboration between stakeholders who shared an interest in kangaroo management. A coordinator role, supported by Sevenses Creative, was

crucial in fostering these partnerships. Two stakeholder workshops were held in March 2022 to bring partners together to define and discuss the project themes and priorities: (1) animal welfare, (2) economic development and livelihoods, (3) environmental conservation, landscape management and sustainability, (4) improving social licence, and (5) moving forward together. This discussion was integral to how the project progressed, including guiding assessment criteria for a grant program. The grant program was initiated to engage relevant stakeholders and support projects aligned with the overall project goals. The grant program received over 30 enquiries, and 10 final submissions, with three projects funded following assessment. In addition, collaboration with the PIRSA Agricultural Kangaroo Taskforce resulted in co-funding of one additional project.

### Project outcomes

Through the *SA Arid Rangelands Kangaroo Collective Pilot*, land managers within the Gawler Ranges region worked to collaboratively manage kangaroos at a landscape scale. Land managers trialled allocating harvesting tags across properties according to expected landscape needs, with varying results. One challenge was the lack of demand for kangaroo products. In response, a portion of funds was used to subsidise kangaroo meat harvested on the properties, to increase local demand through 'Eat Local' initiatives. In addition to local corporate catering opportunities, local social organisations were provided with this local, healthy, and affordable source of protein.

Australian Wildlife Services conducted a report exploring pathways to *Increasing kangaroo value through improved quality, product diversity, and consistency*. Results indicated that high-value kangaroo products depend on better quality and more accurate product description branding and product diversity, and increased reliability of supply. The report also explored opportunities for credits from soil carbon sequestration plus potential carbon distance from a low emission meat, and for biodiversity stewardship.

The *Kangaroo management awareness raising* project led by the Nature Conservation Society of South Australia aimed to increase community understanding and awareness of kangaroo management through a social media campaign: A Kangaroo Conversation. The campaign launched on Facebook (Kangaroo Conversation), Instagram (@akangarooconversation), TikTok (@akangarooconversation) and X (@rooconvo) in March 2023, and now has an impressive, engaged audience.



Figure 1 A post from the A Kangaroo Conversation Instagram

An *economic analysis of the SA Kangaroo Industry* led by BDO EconSearch, indicated through cost benefit and economic impact analyses that the kangaroo harvesting industry holds potential for economic benefit, including increased GSP and employment in South Australia. Through interviews with stakeholders, the report identified additional costs, benefits, and challenges.

As well as supporting the funded projects, the coordinator role allowed for collaboration with other partners and projects. Of note is the partnership with the NSW Kangaroo Management Taskforce, which resulted in co-facilitation of a workshop with Bush Heritage Australia at the NRM Regions Australia Knowledge Conference in September 2022 and the formation of an ongoing NRM Regions Australia Community of Practice for Kangaroo Management to provide a space for NRM staff across Australia to share learnings and experience around kangaroo management.

### Insights and recommendations

In June 2023, the steering committee engaged in a strategic workshop to discuss project outcomes and insights, including challenges identified through the course of the project (Table 1). Through this discussion, key priorities for kangaroo management were identified including (1) national coordination and leadership, (2) land manager support and community engagement, (3) on-ground innovative projects and research, and (4) industry development. In addition, key next steps for the Kangaroo Partnership Project were discussed, aiming to utilise the strengths and expertise of the project and partners:

- Support land managers to manage kangaroos on their properties and at a landscape scale.
- Facilitate knowledge sharing with NRM organisations on a state and national level and work with relevant stakeholders to support alignment and collaboration.
- Facilitate community education and increased awareness and understanding.
- Provide support to on-ground and future facing projects that explore and trial pathways to improve kangaroo management.
- Provide guidance to relevant external projects that have clear implications for kangaroo management, e.g., industry development projects.

**Table 1** Summary of common challenges to kangaroo management identified through the Kangaroo Partnership Project.

Theme	Challenges
Animal welfare	<ul style="list-style-type: none"> <li>• Some animal welfare groups (e.g., RSPCA) and animal rights groups indicate there needs to be more quantitative evidence for kangaroo grazing impact to justify management of a native species</li> <li>• While harvesting has been assessed as the best management strategy for welfare outcomes, concerns remain about regulating best practice within the industry and whether this is even possible, e.g., <i>management of pouch young and young-at-foot</i></li> </ul>
Economic development and livelihoods	<ul style="list-style-type: none"> <li>• Lack of public demand for kangaroo products</li> <li>• Low meat processing capacity for kangaroo products</li> <li>• Lack of market diversification in harvesting industry leading to low product choice</li> <li>• The many options to increase kangaroo value outlined in Project 2 may increase difficulty in deciding how to progress</li> <li>• Even seemingly simple existing methods to increase kangaroo value are not currently being implemented, and it is unclear why</li> <li>• Very little research and development going into kangaroos, particularly in comparison to other red-meat industries</li> <li>• Time and resources required to acquire harvesting tags</li> </ul>

	<ul style="list-style-type: none"> <li>• Low land manager understanding of the numbers of kangaroos on their properties and the number harvested in recent years</li> </ul>
<b>Environmental conservation, landscape management and sustainability</b>	<ul style="list-style-type: none"> <li>• Harvest quotas may be insufficient to bring numbers down to recommended levels consistently and when needed</li> <li>• High resource requirement for Landscape Boards to follow amendment process to control kangaroos on public land through management plans</li> </ul>
<b>Improving social licence</b>	<ul style="list-style-type: none"> <li>• Public pushback due to unawareness of issue or value differences</li> <li>• Lack of understanding and clarity around impact-causing kangaroo populations</li> <li>• Meat safety concerns</li> <li>• Concern around controlling native species</li> <li>• Lack of consensus around the most accurate and effective language to use around kangaroo management, including lack of clear definitions e.g. Overabundance vs impact-causing, unsustainable for harvesting industry vs unsustainable for land management</li> <li>• Concerns the harvesting industry is not based on managing populations sustainably</li> <li>• Opposition from animal rights groups against lethal control and/or industrial use of animals</li> <li>• Securing engagement from stakeholders can be challenging due to perceived and actual risk of public perceptions of kangaroo management</li> </ul>
<b>Moving forward together, engagement and alignment</b>	<ul style="list-style-type: none"> <li>• National steering committee level actions</li> <li>• Lack of a coordinated and coherent national strategy</li> <li>• Differing objectives of land management and conservation agencies and the harvesting industry (i.e., means to an end vs the end)</li> <li>• Kangaroos are Totemic species for some First Nations communities, which may prevent management in certain areas</li> <li>• Poor communication between land managers and harvesters on their properties</li> <li>• The role and responsibility of different entities in managing kangaroos e.g., the Landscape Boards versus the Department of Environment and Water around managing impact-causing native species is unclear in practice (i.e., protocol vs. process)</li> </ul>

## Conclusion

The Kangaroo Partnership Project has taken crucial steps to improve the way kangaroo management occurs in South Australia and beyond. By continuing to address key priorities through on-ground projects and meaningful engagement, improvements can be made to animal welfare and ecological and cultural landscape values, while supporting local livelihoods.

## Conflicts of Interest

Nil

## References

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