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# RaY

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1

2 **Abstract:**

3 Animal geographers have become increasingly interested in different methodological approaches to  
4 understanding animals' experiences and geographies. These interests arise from a need to mitigate and  
5 challenge anthropocentrism within animal geographies and help us develop methods to understand  
6 animals as individual beings (Urbanik, 2012). This chapter develops walking methods as one such  
7 approach to centre animals' experiences within geographical research. Walking methods contribute to  
8 new forms of knowledge production in animal geographies by: offering a means of exploring practices  
9 and experiences within space and place; centring the affective and sensuous nature of human-animal  
10 lifeworlds; and providing a flexibility and resourcefulness that can complement a wide range of other  
11 methods. This chapter concludes by addressing limitations, ethical considerations, and future directions  
12 in advancing walking methods in animal geographies.

13

14 **Key words:** animal geographies, animals, lifeworlds, mobile methods, walking, walking methods

15

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17

18 **Short Biography:**

19 Jamie Arathoon is a funded Human Geography PhD student at the School of Geographical and Earth  
20 Sciences, University of Glasgow. His PhD research explores the contexts in which care crosses species  
21 boundaries between people with disabilities and their assistance animals. He has a wider interest in  
22 animals geographies, disability geographies, health and wellbeing, more-than-human geographies, and  
23 pet theft.

24

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# 32 <a> Researching animal geographies through the 33 use of walking methods <a> 34

## 35 <b> 1. Introducing a walking-focused research agenda <b>

36 Animal geographies research has thus far largely concentrated on the human side of the human-animal  
37 relationship, namely the animal spaces, rather than the animal side of the relationship, the beastly places  
38 (Philo and Wilbert, 2000; Buller, 2015; Gibbs, 2019). Many animal geographers have critiqued the  
39 anthropocentric nature of geography and aim to ‘bring the animals back in’ to geographical inquires  
40 (Wolch and Emel, 1995: p.636; Johnston 2008). One significant challenge in moving towards this goal  
41 has been developing a methodological framework ‘that will allow us to move closer to the animals  
42 themselves as individual, subjective beings’ (Urbanik, 2012: p.186). Methodological approaches to  
43 animal geographies so far have been anthropocentric as animal experiences often remain in the  
44 background. To move away from understanding animals through anthropocentric lens towards  
45 understanding animals’ experiences on their own terms is of critical importance<sup>1</sup>. A plethora of  
46 ontological and epistemological shifts have preceded in animal geographies, recognising the array of  
47 different theoretical and methodological approaches that pay greater attention to the multi-species world  
48 in which we live. Animal geographers have championed a multitude of methods such as ethology  
49 (Chapter 6; Barua and Sinha, 2019), multispecies ethnography (Chapter 7; Kirksey and Helmreich,  
50 2010), photovoice (Margulies, 2019), and visual ethnography (J. Lorimer, 2010; Bear *et al* 2017), that  
51 attempt to pay greater attention to animals’ lived experiences. However, there has been little  
52 engagement with walking methods and their potential to bring animals’ experiences to the forefront  
53 within animal geographies research<sup>2</sup>. Walking methods contribute to new forms of knowledge  
54 production in animal geographies by: offering a means of exploring practices and experiences within  
55 space and place; centring the affective and sensuous nature of human-animal lifeworlds; and providing  
56 a flexibility and resourcefulness that can complement a wide range of other methods. I therefore  
57 advance that there is a need to pay greater attention to walking methods as an approach to exploring  
58 multispecies lifeworlds within animal geographies.

59 This chapter begins by discussing how walking methods have been theorised and practiced within  
60 geography. Walking methods emerged as part of the ‘mobilities turn’ as an approach to explore the  
61 increasingly mobile world around us and its fleeting and sensuous characteristics (Sheller and Urry,  
62 2006). In more-than-human research contexts, walking methods allow for an exploration of practices  
63 within the places they occur, foregrounding the role place has on humans’ and animals’ social and  
64 cultural milieus and practices. This chapter will discuss further how walking methods can contribute to  
65 the field of animal geographies, particularly by addressing the key challenge of developing methods  
66 which centre animals’ geographies. Despite the lack of applied examples of walking methods within

67 animal geographies, they provide a creative means of exploring the affective, embodied, fleeting, and  
68 sensuous characteristics of animals' experiences and human-animal relations. Walking methods can  
69 foreground animals' experiences within research, helping mitigate the challenge of representation and  
70 anthropocentrism that has troubled animal geographers. In addressing this gap in the scholarship, this  
71 chapter will discuss practicalities of walking methods, with a focus on video as a way of documenting  
72 walking research. Animal geographers have applied videographic research in various forms, arguing  
73 that video provides 'a means through which nonhumans might "speak for themselves"' (Bear *et al*,  
74 2017: p.225). The chapter then discusses ethical considerations when practising walking methods in  
75 research with animals. Animal geographers have long been concerned with ethical questions regarding  
76 how we: make animals visible within our discipline; understand our relationships with them; recognise  
77 animals as co-responding subjects; and place them morally within the world (Johnston, 2008; Buller,  
78 2016). Finally, this chapter concludes by reflecting on limitations and future directions that researchers  
79 can take when adopting and developing walking methods beyond domestic animals' lifeworlds to  
80 incorporate a range of other non-domestic animals. Though I do not offer walking methods as a panacea  
81 for the complex methodological challenges animal geographers face, I advance it as one approach that  
82 might mitigate the overriding anthropocentrism that troubles researchers in the subdiscipline.

83

## 84 **<b> 2. Walking methods within geography <b>**

85 Walking methods emerged as part of the wider 'mobilities turn' within the social sciences in the mid-  
86 2000s. The mobilities turn aimed to challenge how social science research had been vastly 'a-mobile'  
87 by developing mobile theories and mobile methods to explore a world that is constantly on the move  
88 (Sheller and Urry, 2006). Mobile methods have become common within geographical research since  
89 Sheller and Urry (2006) proposed an array of mobile methods that could be applied within geographical  
90 research, including walking methods. Walking methods involve walking a pre-designed (or  
91 occasionally unstructured) route with participants while talking to them and/or observing things of  
92 interest. Ideally routes will be co-designed with participants so that they are important to their everyday  
93 lives as this attachment will help produce an understanding of the participant's practices (Kusenbach,  
94 2004). Walking methods, also termed 'go-alongs' (Carpiano, 2009) or 'walking-whilst-talking'  
95 (Anderson, 2004), are often considered extensions of interviews and observational research. Offering  
96 both the conversation from an interview and the observation of practices from participant observation,  
97 walking methods aim to research social-cultural practices within the spaces and places they occur. Place  
98 plays an important and overlooked role within research methodologies influencing not only power  
99 relations, positionality, and rapport, but also the production of knowledge (Elwood and Martin, 2000;  
100 Anderson, 2004). As Anderson (2004: p.254) contends 'conversations held whilst walking through a  
101 place have the potential to generate a collage of collaborative knowledge'. This is because walking  
102 methods allow researchers to 'observe spatial practices in situ' (Kusenbach, 2004: p.463) while

103 facilitating discussion about these practices. Observing practices within the places they occur allows  
104 the researcher to understand how places shape practices and how these practices then shape social and  
105 cultural doings and identities. Therefore, social constructions of knowledge can be enhanced through  
106 harnessing the inherently socio-spatial character of human knowledge through walking methods  
107 (Anderson, 2004).

108 ‘Go-alongs’ are not the only walking methodological approaches one can use, others include walking  
109 group interviews (Inwood and Martin, 2008), observational walks (Pierce and Lawhon, 2015), walking  
110 diaries (Middleton, 2010), walking and mapping (Evans and Jones, 2011), sound/listening walks  
111 (Gallagher and Prior, 2014), and video walks (Pink, 2007; Brown and Banks, 2015). The utility and  
112 flexibility of walking methods to mix and combine with other methods provides diverse opportunities  
113 to modify and implement walking methods in accordance with specific research goals. For example,  
114 Pink (2007: p.40) uses walking methods and video ‘as a phenomenological research method that attends  
115 to sensorial elements of human experience and place-making’. Pink walks with and video-records  
116 participants as they share their knowledge of a community garden. Walking and video allowed the  
117 researcher to delve into the personal, social, and cultural ways the participants construct the garden,  
118 showing how it is a place continually in process with present sensory embodied experiences while  
119 having the potential for new knowledges and place-making. This approach combining walking and  
120 video methods helps explore intimacies that otherwise might not have been represented through other  
121 approaches. The combination of walking methods with other methods allows for creative approaches,  
122 such as Pink’s research, that take the strengths of multiple methods to create a more rigorous research  
123 methodology.

124 More generally the use of walking methods can be beneficial by allowing the research greater time to  
125 collect thoughts and reflect on the discussions and observations and what new lines of questioning may  
126 follow (Riley, 2010). Walking can help the researcher move the conversation on, or redirect the  
127 conversation, by literally walking to another point of interest (Riley, 2010), using the environment as a  
128 conversational aid. Whilst walking methods have a greater presence within human geography as a  
129 whole, within animal geographies less has been said about the role walking methods can play in  
130 exploring the intimate lifeworlds of humans and animals. The next section reviews some of the current  
131 animal geographies literature that makes use of walking methods and argues that walking methods can  
132 help mitigate some of the methodological challenges that animal geographers face.

133

### 134 <b> 3. Walking methods within animal geographies <b>

135 Despite the vast amount of work championing and practicing walking methods there has been limited  
136 application of walking methods within animal geographies. Walking methods are generally considered  
137 as a tool for exploring *human* experiences and place-making (see for example: Pink 2007; Büscher *et*

138 *al* 2011), not animal experiences. Furthermore, when walking methods have been used within animal  
139 geographies, they are often subsumed under wider ethnographic approaches. For example, Ginn (2014)  
140 mentions walking interviews once under the wider ‘show me your garden’ methodology, and Brown  
141 and Dilley (2012) mention walking methods within a ‘mobile video ethnographic approach’ but do not  
142 discuss how walking affected the research. In such instances the potential strengths of walking methods  
143 to compliment other approaches tend to be overlooked, as they become neglected within wider  
144 methodologies. However, walking methods can play a very important role within animal geographies  
145 by focussing on animals’ experiences and opening up encounters with animals.

146 Walking methods can be of use to animal geographers through their ability to engage with the affective,  
147 embodied, fleeting, and sensuous characteristics of human-animal lifeworlds. Hodgetts and J. Lorimer  
148 (2018) argue that affect acts as a shared concern bridging both animal geographies and mobility studies.  
149 This is through walking being regarded as an affective and sensuous cultural practice (H. Lorimer, 2011)  
150 with research focussing on the embodied practices, skills, and experiences of participants. While  
151 similarly, animal geographies have explored the affective and sensuous characteristics of pet-keeping  
152 (Charles, 2014), livestock herding (H. Lorimer, 2006), and encounters with wild animals (H. Lorimer,  
153 2010). Walking can help foreground the experiences of highly mobile research subjects such as animals  
154 through engaging with the non-representational dimensions of human and animal life such as affect.  
155 Walking methods can provide distinct ‘techniques for witnessing animals’ affective experiences’  
156 (Hodgetts and J. Lorimer, 2018: p.8) such as ‘learning by witnessing’ (H. Lorimer, 2010: p.72) more-  
157 than-human lives in action. Through witnessing animal lives in action animals can express their agency  
158 without constant interference by humans (although these power dynamics are always present and  
159 uneven). One important example of this is through human-animal communication, as talk alone is  
160 inadequate for understanding the related doings of humans and animals (Laurier *et al* 2006). Instead,  
161 there is a need to focus on the intercorporeal ways humans and animals communicate through affective,  
162 fleeting and sensuous bodily engagements (Despret, 2004). We communicate with animals through a  
163 mixture of auditory, visual, and tactile engagements that walking methods can help illuminate. Walking  
164 methods open up the ability to sense this relationship as it occurs rather than just talking about it.  
165 Walking methods are valuable in their ability to explore expression of non-representational modes of  
166 communication that might through other means have been lost.

167 Walking methods can be particularly useful if they are part of the practice that is being explored. Many  
168 scholars who are exploring walking often use walking methods to do so. As Dewsbury (2010) maintains,  
169 attending to the practice you are exploring by doing it will help the researcher understand its affective,  
170 performative, and sensuous nature to a greater degree. Brown and Dilley’s (2012) examination of dogs  
171 and dog walkers and their response-ability and capacity to manage engagements with other humans and  
172 animals is an example of using both walking methods and video to explore the practice of walking.  
173 While Brown and Dilley (2012) are not directly involved with the walks, mini cams attached to the

174 human participants were able to capture the practice as it was being undertaken. They were able to show  
175 the corporeal spatialities of human-dog attunement and more-than-verbal communication which are  
176 vital to response-ability and capacity to respond in encounters with other animals and humans. Through  
177 this approach walking methods were able to account for ‘the interbodily comportments, motions,  
178 gestures, timings, responses, glances, enrolment of objects, as well as vocal expressions’ between  
179 human and animal (Brown and Dilley, 2012: p.39). Walking methods thus have the potential to enliven  
180 research and focus on animals’ experiences by exploring these sensuous and affective engagements and  
181 by attending to the practice of walking.

182 Walking methods are also suited to exploring the fleeting encounters humans often have with animals.  
183 Gillon (2014) uses walking interviews to explore unexpected encounters within the home and garden  
184 with non-human animals. Walking with his participants through their gardens acted as a memory  
185 inducing prompt, allowing the participants to discuss encounters with uninvited animals such as ducks,  
186 kangaroos, and snakes, in the spaces they occurred. Moments of trouble, care, and co-habitation  
187 emerged from the narratives of inter-species encounters; however, due to the fleeting nature of  
188 encountering these animals, they never fully feature in the research as active agents or as research  
189 participants. In contrast, Ginn’s (2014) ‘show me your garden’ methodology, mixing walking methods  
190 and observation, allowed more sticky and monstrous animals to become involved within a walking-  
191 based approach. Ginn encountered slugs with experienced gardeners and was shown methods of  
192 detachment that gardeners use to often distance themselves from their slimy neighbours. Unlike Gillon’s  
193 research, Ginn’s features animals coming into the research and becoming active participants. This might  
194 be because of the differences in the embodied nature of animals like ducks, snakes, kangaroos, versus  
195 slugs. This builds on a key issue with using walking methods within animal geographies: it may  
196 privilege certain relationships with animals such as those with domestic animals like dogs. Geographers  
197 therefore need to open up walking methods to extend beyond the cute and cuddly to the monstrous,  
198 slimy, and wild. Ginn (2014: p.543) does this to an extent explaining how in his research ‘the slug slid  
199 into view as the research unfolded’ rather than being an initial concern. The encounter with slugs  
200 reshaped the research as ‘gardens were scattered with the material evidence of slug defences, from  
201 companion planting, to protective containers, to pellets. . .’ and the ubiquity of slugs throughout every  
202 garden made them easy to talk about (Ginn, 2014: p.534). Including a broader range of species within  
203 walking methods research is an important challenge that is further discussed in the last section of this  
204 chapter.

205

#### 206 <b> 4. Case study illustration: human-assistance-dog relationships <b>

207 To illustrate the potentials of walking methods in exploring the affective, embodied, fleeting, and  
208 sensuous lifeworlds of humans and animals I draw on my own empirical research with four participants

209 and their assistance dogs. This ethnographic research took place over a 3-month period, with  
210 participants choosing a range of methods to engage with, including interviews, walking interviews, and  
211 walking observations. Sketch maps, audio recordings, and video recordings were used to understand  
212 participants' relationships 'in action' (Arathoon, 2018). The route and duration of walking interviews  
213 and observations were controlled by the participants as they chose routes which they walk daily. The  
214 walking interviews became more observational and less conversational, as human and animal had to  
215 concentrate on one-another to navigate space safely. Observation, in this instance, allowed the  
216 researcher to focus on the embodied interactions between human and animal, rather than talk between  
217 humans, although follow-up interviews helped make sense of what was observed.

218 Using observational and interview walking methods to explore human-assistance-animal lifeworlds  
219 drew out the more-than-visual, more-than-verbal engagements that operate when visually impaired  
220 humans and their assistance animals walk together, such as agency, commands, hand gestures, pace,  
221 power dynamics, sounds, tactile engagement, and voice tones (Arathoon, 2018). Observing these  
222 engagements in action allow the nuances of the relationship to emerge. For instance, commands such  
223 as "find right" acted as a primary way to negotiate space. These commands are accompanied by hand  
224 gestures, specific vocal tones, and slight movements in the harness and lead. Hand gestures offer a  
225 visual queue to the command, while slight movements in harness and lead offer a tactile cue to "find  
226 right". These embodied engagements, some spoken, some quickly acted, operate to allow the joint  
227 movement of human and animal through space with the aim of becoming a multispecies team (Arathoon,  
228 2018).

229 Within this research, walking methods represented an ideal means of exploring the affective, embodied,  
230 fleeting, and sensuous engagements, as they relied on the practice being explored to be undertaken in  
231 situ. The fleeting characteristics of embodied engagement between human and animal emerge while  
232 moving through space and the use of walking methods can be attentive to the multiple affective and  
233 sensuous engagements occurring.

234

## 235 <b> 5. Practicalities, documentation, and the technological fix <b>

236 Having discussed walking methods through both theoretical and empirical examples, it is important to  
237 highlight some of the practicalities when doing walking methods, how to document walking methods,  
238 and the role of technologies such as video in doing so. Walking methods require a lot of thought and  
239 planning, with some considerations of particular relevance for animal geographers. Critical to  
240 undertaking walking as a method is thinking about 'the rhythm and style of the walk, the walk route  
241 terrain and distance, and the fitness and embodied dispositions of the walker' (Macpherson, 2016:  
242 p.425). These factors will have different impacts upon the research and those involved. If the route is  
243 too long the research may become boring, dull, and the participants may become disinterested. On the

244 other hand, if the route is too short the research may not go into enough depth into the practices and  
245 conversations the researcher is trying to explore. Walking interviews can last anywhere from a matter  
246 of a few minutes to hours (Kusenbach, 2004), thus aligning the route with the data collection aims is  
247 imperative. The route is also important as it will help facilitate the discussion while shaping the practices  
248 that the researcher aims to explore. It is necessary then to link the route to the aims of the research.

249 A further point of consideration is the practicalities of documenting walking research. Due to its mobile  
250 nature, note-taking during the walk is not always useful for three reasons: disrupting the research;  
251 climatic conditions; and limited ability to explore affective and sensuous engagements through  
252 notetaking. While note-taking and sketching is often employed during and after data collection, there is  
253 a need to go beyond the written word to understand 'our self-evidently more-than-human, more-than-  
254 textual, multi-sensual world' (H. Lorimer, 2005: p.83). Walking methods open up an array of media-  
255 directed documentation approaches that are better at capturing multi-sensual and fleeting experiences  
256 (J. Lorimer, 2010). Some animal geographers have argued that video can document fleeting  
257 engagements and human-animal encounters instead of relying solely on human articulation after the  
258 encounter has occurred (J. Lorimer, 2010; Bear *et al* 2017). Therefore, through video documentation  
259 animals can be brought into the research and 'speak for themselves' (Bear *et al* 2017: p.225) thus  
260 centring animals within the research (Gibbs, 2019).

261 However, when video is engaged, it is important to consider the camera's gaze: who should record and  
262 document the research? Who should the camera be focussed on? The camera's gaze is not an exact  
263 representation of reality, rather the researcher choses who should record and what should be recorded  
264 (Rose, 2016). This is important in animal geographies research where unique challenges and questions  
265 of power can emerge. For example, there are beings too small, or too far away, to be captured by camera  
266 but who may otherwise be sensed within the research situation. How do we involve these animals within  
267 the research? Other challenges may emerge, for example, Brown and Dilley (2012) use headcam  
268 footage from dog walkers but discuss the difficulty of interpreting headcam footage without further  
269 discussion from participants. With headcam footage the human becomes less of a focus as occasionally  
270 only arms, legs, and voices are heard from the participant and the video is much more focused on  
271 animals and other humans. This should not be taken as solely a limitation, as discussion with  
272 participants about the videos allows the participant's insights to be heard, adding greater reflexivity to  
273 the research. There are also possibilities to be considered concerning whether animals could wear  
274 cameras to focus on their point of view and experiences. It is important therefore to consider how the  
275 research may be recorded and the implications this choice may have.

276

277 **<b> 6. Ethical considerations when researching with animals <b>**

278 Having touched briefly on the practicalities of undertaking walking methods, this section outlines some  
279 ethical concerns when conducting research with animal participants. Of particular importance is how  
280 we make animals visible within human geography and how we recognise them as co-responding  
281 subjects (Johnston, 2008; Urbanik, 2012; Buller, 2015, 2016). The concern here is one of  
282 anthropocentrism: viewing animals solely through human terms. Anthropocentrism is an issue animal  
283 geographers have been grappling with since the inception of the subdiscipline, and one which still  
284 occupies a prominent place, especially within methodological agendas.

285 By using walking methods researchers can begin to challenge anthropocentrism as animals can become  
286 actively involved in the research rather than remaining as passive objects represented through human  
287 experiences. Through walking methods, particularly those incorporating video, geographers can help  
288 move animals from the periphery of the research to the centre offering a way in which ‘nonhumans  
289 might “speak for themselves”’ (Bear et al, 2017: p.225). For example, Brown and Banks (2015) use a  
290 combination of walking and video recording to show how dogs become actively engaged within their  
291 research through expressions of agency. Expressions of agency permeated through the research as dogs  
292 performed their alternative ways of knowing and making sense of the world, through tactile, olfactory,  
293 and kinaesthetic engagements with their surroundings (Brown and Banks, 2015). These acts of  
294 understanding the world along with more subtle modes of engagement such as shifting power dynamics  
295 when walking (Arathoon, 2018) position animals’ experiences more prominently within the research.  
296 Agency of the animal is therefore a factor in recognising animals as co-responding subjects and in  
297 showing how animals’ lifeworlds warrant attention. However, through tracing the agency of animals,  
298 Brown and Banks (2015) argue that it is still difficult to escape anthropocentrism as humans wear the  
299 cameras so have more of a chance than animals to control how they make themselves and animals  
300 visible within the research. Animals’ experiences still remain largely in the control of humans, but  
301 walking methods go some way, compare to interview/text-based research, in mitigating  
302 anthropocentrism by opening up space to focus on animals’ experiences.

303

304 **<b> 7. Conclusion: future engagements between animal geographies and walking**  
305 **methods <b>**

306 Walking methods are a useful technique for exploring animals’ geographies. Walking methods can  
307 produce socio-spatial knowledge by grounding explorations in space and place. Their flexibility and  
308 resourcefulness can be adapted to compliment a wide range of other methods, offering new modes of  
309 engagement and exploration. The affective, embodied, fleeting, and sensuous characteristics that  
310 compromise both human-animal relations and walking practices make walking methods an excellent  
311 tool of methodological enquiry into animal geographies. Furthermore, walking methods can provide an

312 approach to mitigate the dominant anthropocentrism within animal geographies as animals move from  
313 the periphery to the centre of the research.

314 Walking methods are a valuable component of an extended repertoire of mobile methodologies aimed  
315 at considering animals' spatial experiences and lifeworlds. With this in mind two recommendations  
316 stem from this consideration of walking methods and their potential within research in animal  
317 geographies. First, it is important to thoroughly report the ways in which walking methods are used  
318 within animal geographies research and their impact on empirical work. Walking methods have been  
319 used in many approaches and are often subsumed under wider (often visual) ethnographic approaches.  
320 This has left little understanding in how walking impacted the research. Instead, animal geographers  
321 who use walking methods should consider how the practice of walking has impacted their research  
322 process, findings, and conclusions. Doing this will help in moving towards a better understanding of  
323 how walking methods can help explore the lifeworlds of humans and animals.

324 Secondly, it is important to develop ways in which walking methods, or by extension, mobile methods,  
325 can be pushed in radically different contexts to go beyond exploring human relations with domestic  
326 animals and to develop a greater understanding of the lifeworlds of other aquatic, avian, micro-biotic,  
327 stationary, subterranean, and wild, animals. Doing so requires a wider engagement with mobile methods  
328 but one that keeps in mind walking methods core concerns to explore practices and experiences in situ  
329 and to capture the affective, embodied, fleeting, and sensuous characteristics of animal lifeworlds. The  
330 feasibility to expand and develop walking and mobile methods into other worldly realms can emerge  
331 from engaging with these key concerns and with other methods and forms of data in creative ways, as  
332 one of walking methods greatest strengths is its ability to be used with, and compliment, a range of  
333 other methods. For example, tracking methods have begun to emerge for avian animals. Kirksey *et al*'s  
334 (2018) multi-species ethnographic work on cockatoos in Sydney relies on residents to upload sightings  
335 of cockatoos and their interactions with them to a Smartphone app and Facebook page. This creates an  
336 interactive profile of the cockatoos' mobilities and their spatial interactions with humans. Kirksey *et al*  
337 (2018) also combined this ethnographic and digital work with ethological methods by exploring animal  
338 behaviour through basic ethological methods such as audio recording, observation, photography, and  
339 an ethogram (a list of cockatoo behaviours). This ethological approach helped attune the researchers to  
340 the lifeworlds of the cockatoos through affective and sensuous engagement with the cockatoos  
341 themselves. This approach combines the in-situ nature of both sighting and siting cockatoos, within a  
342 wider ethological approach and with a mixture of different (digital, qualitative, and spatial) data. It  
343 shows how the key concerns of walking methods, in this case to explore practices and experiences in-  
344 situ and affective and sensuous engagement, can be taken forward into a project with a range of different  
345 methods and data to explore avian animals' lifeworlds.

346 Future research centring the concerns of in-situ exploration and affective, embodied, fleeting, and  
347 sensuous engagement could potentially result in development of ‘diving/underwater’ methods  
348 combining technologies such as diving equipment and video cameras to explore the lifeworlds of  
349 aquatic animals. A variety of diving methods used to survey coral reefs and fish populations are already  
350 being undertaken in the marine sciences (Caldwell *et al*, 2016) and can offer a potential collaborative  
351 engagement with geographers aiming to explore aquatic animals’ lifeworlds. Similarly, the adoption of  
352 camera traps and telemetry along with a wider engagement with ecology and walking methods could  
353 potentially be another exploratory way into exploring the affective and fleeting characteristics of other-  
354 than-domestic animals. These types of examples offer a glimpse into how walking methods, along with  
355 other methods and forms of technology, could be used together to explore animals’ lifeworlds and  
356 mobilities.

357

#### 358 **<b> Notes <b>**

- 359 1. I adopt the use of the apostrophe within animals’ experiences rather than animal’s experiences,  
360 after Hodgetts and Lorimer (2018: p.1) who ‘foreground a distinction between considerations  
361 of how animals have been spaced by humans, and animals’ own lived geographies and  
362 experiences’.
- 363 2. I use the term ‘walking methods’ throughout to denote that there is not just one approach that  
364 uses walking methods but a multitude of approaches. In text later I refer to some of the array of  
365 approaches which uses walking as a methodological tool.

366

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