Promoting Responsible Camping in Scotland

AGRICULTURE, ENVIRONMENT AND MARINE

social research

Promoting Responsible Camping in Scotland

Research report by BritainThinks on behalf of NatureScot and the Scottish Government

Britainthinks

Insight & Strategy

Contents

1. Introduction

1.1 Background and objectives

Scotland's landscape and outdoor spaces make it a sought-after destination for visitors from all over the UK and the wider world. VisitScotland's research reveals a range of emotional benefits tied to the landscape that visitors associate with Scotland, from awe to escapism.[1] Access rights under the Land Reform (Scotland) Act 2003 make Scotland even more unique, with freedoms to access the land and wild camp rarely matched elsewhere in the world.[2] These access rights bring considerable benefits to the public,[3] and enable visitors to Scotland to connect even more meaningfully to nature and the outdoors.

It is widely acknowledged that the Covid-19 pandemic and associated lockdowns fuelled an increase in people visiting the outdoors for recreation. Restrictions on international travel also led to an increasing number of 'staycations' in the UK. This impact of the pandemic alongside Scotland's unique countryside, and freedoms for accessing that countryside, meant that Scotland became a prime destination for people to visit from across the UK.

However, increasing numbers of visitors to the Scottish outdoors have also highlighted a number of challenges, and key bodies engaged in access, visitor and land management have developed a visitor management strategy to address some of these.[4] This work has highlighted a specific issue around illegal and irresponsible behaviour when camping with tents outwith managed camping facilities, which is detrimental to the environment, the local community and the enjoyment and health of other visitors to the outdoors.

NatureScot has undertaken considerable work over many years to promote responsible outdoor access, and this activity was significantly increased during the pandemic in conjunction with partner bodies. These campaigns included introductory messages about the Scottish Outdoor Access Code (SOAC) for new outdoor users and young people, along with more targeted guidance on specific issues such as camping, fires, litter, parking and toileting.[5]

These messages were also distributed through a wide range of routes including traditional press releases and social channels, and supported by a range of resources including leaflets, posters, websites, blogs, videos and graphics for use on social media, as well as face-to-face communication by visitor management staff.

This has been accompanied by a broad range of wider visitor management, including increased patrolling by the police and rangers to engage with the public, additional infrastructure such as litter bins, temporary car parks and toilets, and regulatory measures

---

[1] Visit Scotland (2019)
[2] Scottish Outdoor Access Code (2022)
[3] Land Reform Review Group (2014)
[4] Visit Scotland (2021)
[5] Scottish Outdoor Access Code (2005)

where needed, for example to address inappropriate parking. This activity has drawn on a considerable body of accumulated visitor management experience as summarised, for example, in guidance produced by the National Access Forum on managing camping with tents.[6] The mentioned measures have played an important role in managing these pressures, but some ongoing issues remain – which are largely associated with a minority of users that can be particularly difficult to influence.

The Scottish Government wants to promote and encourage responsible behaviour, rather than deterring visitors. Attracting visitors and making the outdoors accessible for all remains crucial for rebuilding the Scottish tourism sector after losses caused by Covid-19. Spending time in the outdoors is also greatly beneficial at an individual and community level, as evidenced by the use of outdoor visits as an indicator to measure Scotland's progress against the National Outcomes.[7] It is therefore important to avoid unreasonably limiting opportunities for responsible enjoyment in order to address the behaviour of a relatively small proportion of visitors.

1.1.1 Objectives of the research

This research sought to provide the Scottish Government with further insight into irresponsible behaviour when camping with tents outwith managed camping facilities. The ultimate aim was for the research to inform a behaviour change strategy to promote responsible behaviour so that future visitors act in a way that maintains the pristine and unique nature of the Scottish outdoors.

Specifically, the research sought to inform a communications approach to change behaviour, by identifying:

1. Who are the different audiences?
2. How can they be reached?
3. What messages are likely to resonate and change behaviour?

To achieve this, the research aimed to:

- Develop an overview of successful approaches taken in similar settings requiring behaviour change;

- Gain an in-depth understanding of the primary audiences (those who exhibit irresponsible behaviours when wild camping in Scotland), including:

- Applying the Individual-Social-Material (ISM) behaviour change framework to unpack motivations and behaviour and gain insight into ways of influencing these behaviours.

- How to reach and effectively communicate with them;

- Develop practical recommendations for engaging with these audiences to encourage more responsible / positive behaviour (or discourage irresponsible / negative behaviour) that continue to uphold the ethos of Scottish access rights.

---

[6] Scottish Outdoor Access Code (2021)
[7] Visits to the Outdoors | National Performance Framework (Accessed April 2022)

1.1.2 Terminology

The term "wild camping" is interpreted in many different ways. Some users reserve this term for lightweight tent-based camping in remote areas far from public roads, while at the other extreme it is sometimes defined broadly to include sleeping overnight in campervans. However, "wild camping" is the term used in the SOAC to describe camping outside of managed facilities as permitted by the access rights.[8] In this report, we have chosen to use this term as a shorthand to refer to camping with tents outwith managed camping facilities.

For this research, we focused on irresponsible behaviours linked to camping as noted in the SOAC and further defined by NatureScot and the Scottish Government: leaving litter, human waste and camping equipment behind, lighting fires as well as antisocial gatherings and noise.

The research also explored behaviours that were considered irresponsible by stakeholders in the first phase of the research, for example collecting dead wood for campfires. The 'irresponsible behaviours' that we included are listed in full in the methodology section below.

1.2 Methodology overview

The research involved three phases:

- Phase 1: Scoping (December 2021-January 2022).

- Phase 2: Primary research with target audience (January-February 2022).

- Phase 3: Behaviour change workshop (March 2022).

1.2.1 Phase 1: Scoping

The purpose of this phase was to:

- Collate existing relevant studies and draw out key findings applicable to this research;

- Understand in more detail the problem of irresponsible camping in Scotland; what actions have already been taken; an evaluation of these actions; and what else may be effective in promoting more responsible behaviour;

- Inform Phase 2 of the research, including sample building.

This phase comprised:

- Literature review:

- We conducted a literature review of 24 articles. The review included articles found from searching publicly available literature as well as recommendations from

---

[8] Scottish Outdoor Access Code (2005)

stakeholders. Given the scarcity of evidence specifically on irresponsible wild camping, some literature covered related behaviours, such as littering and dog-walking, to look for transferable lessons.

- Stakeholder online interviews:
  - o We spoke to 14 stakeholders from across Scotland with experience and expertise in engaging with wild campers behaving irresponsibly;
  - o Seven Rangers & Access Officers;
  - o Six National level representatives, including some recreation and land management organisations.
- A report summarising the findings:
  - o Published separately.

1.2.2 Phase 2: Primary research with target audience

The purpose of this phase was to:

- Understand the target audience's context in terms of lifestyle and attitudes;
- Understand the motivations and attitudes that lead to irresponsible behaviour;
- Explore barriers and opportunities using the ISM framework to diagnose the barriers and identify opportunities for encouraging more responsible behaviour.

This phase comprised:

- Online depth interviews with 20 wild campers, of which eight took part in a paired friendship depth;

- Depth interviews were used to give participants the space to answer without the effect of social desirability bias that could occur with focus groups or online communities. Paired depths were chosen because participants are more likely to discuss irresponsible behaviour in a setting where such behaviour is normalised by the presence of peers who have also engaged in these behaviours.

1.2.3 Note on sampling

For Phase 1, it should be noted that stakeholders were chosen by NatureScot to take part in the research because of the fact that they had particular experience of irresponsible camping behaviours. Feedback from these stakeholders therefore is more likely to reflect the relative extremes of inappropriate behaviour when viewed in a wider Scottish context.

For Phase 2, our study recruited participants who had wild camped in Scotland in the last two years. We used a purposive sampling approach, deliberately targeting irresponsible wild campers.

We worked with specialist recruiters, who use databases of the general public to find eligible participants alongside techniques such as snowballing through relevant contacts or advertising on social media.

A series of screening questions were designed to identify participants who had engaged in at least one 'irresponsible behaviour' from the following list (informed by Phase 1):

- Abandoning camping equipment / litter;

- Collecting live or dead wood for a campfire;

- Leaving a campfire still lit;

- Damage from campfire / BBQ, e.g. scorched vegetation;

- Leaving traces of campfire / BBQ, e.g. burn rings;

- Toileting next to streams / rivers / lochs;

- Not burying faeces;

- Leaving behind used toilet paper;

- Camping in a group of more than 3;

- Camping in an area where other parties are already camped;

- Camping for more than 3 nights in one place;

- Playing music on loudspeakers;

- Excessive drinking;

- Parking or driving off-road.

1.2.4 Phase 3: Behaviour change workshop

The purpose of this phase was to present the findings of the research so far and discuss and develop behaviour change recommendations.

This phase comprised:

- A virtual workshop with the NatureScot, the Scottish Government and BritainThinks teams, alongside a few other representatives from communications teams in this space, structured as follows:
- A debrief of the findings from Phase 2 of the research;
- A facilitated workshop, using the opportunities and barriers uncovered from the previous phases to map potential behaviour change communications and interventions framed around the ISM framework.

1.2.5 Note on this report and interpretation of data

The findings of this report rest heavily on Phase 2: interviews with 20 wild campers who behaved irresponsibly. The qualitative nature of this research and small sample size means that findings cannot be treated as fully representative of this group of users. They help to highlight different behaviours but cannot reflect the scale of one behaviour compared to another.

1.2.6 Note on the Individual, Social and Material model (ISM)

This report uses ISM as a means to analyse behaviours and make recommendations. ISM is a model that has been developed from the idea that three different concepts – the Individual, Social and Material – influence the way that people behave.

It is designed to be a practical tool to help make reccommendations to change behaviour, as a result of understanding the way in which people's behaviour is influenced across these multiple contexts.[9] One of the key principles of ISM is that interventions should take account of influences across multiple contexts - I, S and M - in order to achieve substantive and long lasting change.

Traditional behavioural interventions have tended to focus on either the individual, or on the material contexts, and sometimes on both of these. However, this is often insufficient to lead to the change in behaviour that practitioners are expecting. The approach described here has more chance of success because it encourages broader thinking and points towards collaborative working to develop a more integrated package of interventions.

Figure 1. How different influences on behaviour are mapped onto the ISM model.

---
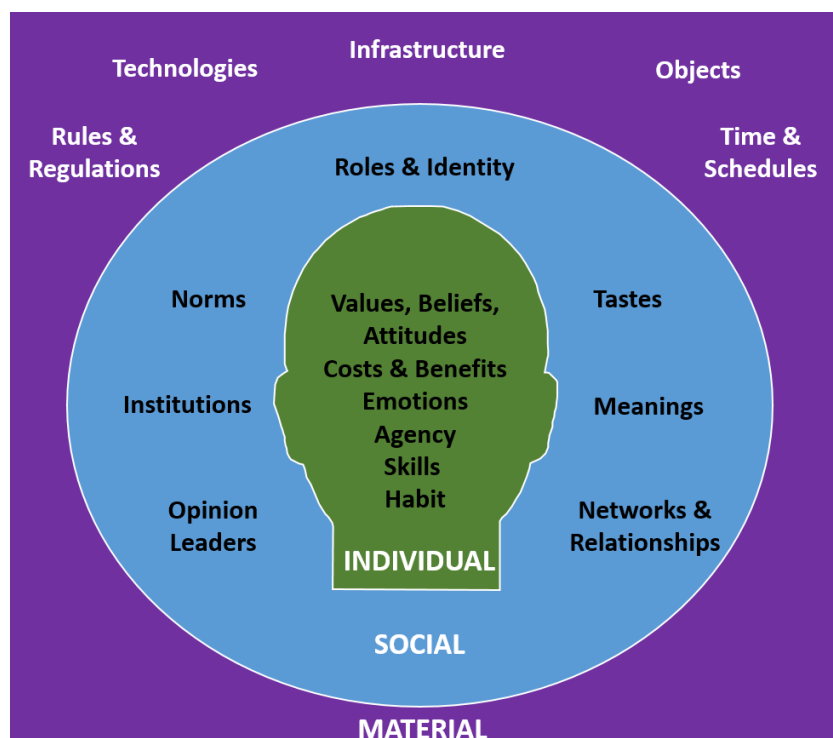
[9] Scottish Government (2013)

2 Irresponsible wild camping behaviour

2.1 Types of irresponsible wild camping behaviour

In Phase 1 of this project we conducted stakeholder interviews to help define irresponsible camping outside of managed facilities, and gauge perceptions of its scale and impact on the natural environment in Scotland. The behaviours stakeholders defined as irresponsible included:

- Littering, from small items such as cans through to abandoning tents or other equipment that could be classified as fly tipping;
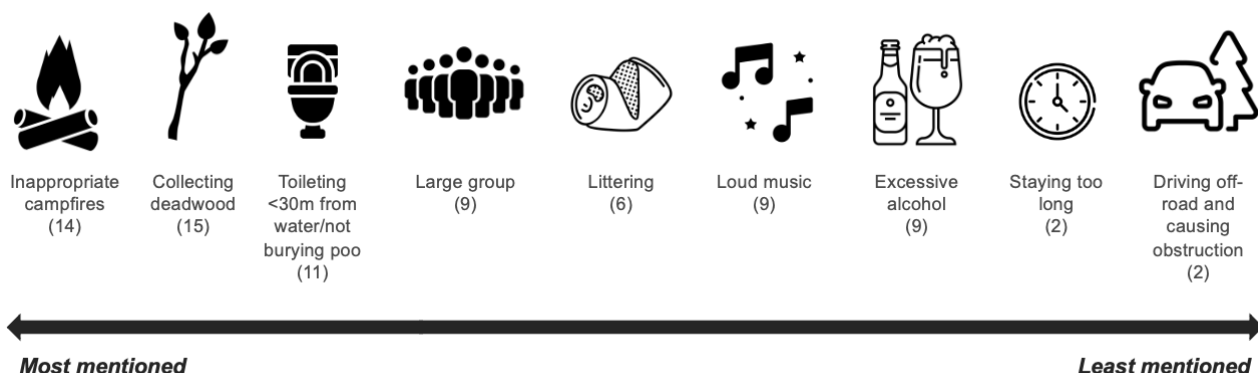
- Irresponsible toileting behaviour, such as not burying faeces;

- Inappropriate campfires, including cutting down live trees for wood;

- Antisocial behaviour, such as causing nuisance noise;

- Camping in inappropriate locations, such as near historic sites or in heavily used areas;

- Inconsiderate, dangerous, or damaging parking.

The stakeholders we spoke to felt that these types of behaviours were a problem in Scotland and that the impact had been exacerbated by the significant increase in visitors to Scottish landscapes during the Covid-19 pandemic. Whilst many people camp responsibly and few are reported to exhibit all of the irresponsible behaviours, stakeholders note that with such large numbers accessing the Scottish countryside, the combined effect of those who exhibit just one or two such behaviours has the potential for significant adverse impacts.

Phase 2 of our study deliberately recruited participants who had camped outside of managed facilities in Scotland in the last two years, and engaged in at least one 'irresponsible behaviour', as defined in the section 1.1.2. In the interviews we explored the full range of irresponsible behaviours that they had engaged in and examined which behaviours occurred most frequently across the sample. We summarise the frequency of those behaviours and how our participants talked about them in the diagram and table below.

Figure 2. Frequency of mentions of irresponsible camping behaviour by participants

| Inappropriate campfires (14) | Collecting deadwood (15) | Toileting <30m from water/not burying poo (11) | Large group (9) | Littering (6) | Loud music (9) | Excessive alcohol (9) | Staying too long (2) | Driving off-road and causing obstruction (2) |

Most mentioned   *Least mentioned*

Behaviour	How our participants talked about the behaviour
Inappropriate campfire starting and not clearing up	Most of our participants reported lighting campfires on their trip. Participants described leaving embers burning, ash remains and scorch marks from fires during dry periods on grass or a beach. Some used a stone ring if they came across one that had already been set up and felt that to be more responsible. Only a handful of participants spoke about only lighting their fire if the weather was damp or the site was safely away from woods. The fact that some used wood from the surrounding area for their campfire suggests that they were likely close to wooded areas.
Collecting deadwood	Those who had lit campfires reported that they had collected wood for their fire from the surrounding area.
Inappropriate toileting	Some participants reported burying their faeces. Others talked about strategies to avoid defecating in the outdoors, such as taking medication to treat diarrhoea, such as Imodium. Very few consciously toileted 30m away from open water. Two participants had purposefully urinated in lochs and streams, thinking it to be more hygienic than on land.
Camping in a large group	Nearly half of the participants in our study described their camping trip explicitly as a social gathering of three or more unrelated people.
Littering and abandoning equipment	Although participants were most likely to identify littering as an irresponsible behaviour, a few did report that they – or others in their camping party – had littered. One pair of participants reported that they had abandoned a tent at their camping location. Some participants distinguished between types of litter, saying that they had left behind litter that would decompose, such as food waste, whilst making a conscious effort to remove non-compostable litter, such as cans.
Loud music	Consistent with the social motivations some had for wild camping, a number of those who had gone camping as part of a group reported playing loud music. But others were clear that they were wild camping to escape rowdy groups at campsites and enjoy the peace.
Excessive alcohol	Similarly, many of those we spoke to had consumed alcohol on their trip. A couple reflected that they, or someone in their party, had drunk to excess.
Staying too long	Two of the participants we spoke to had stayed for four nights in one place.
Driving off road / inconsiderate or dangerous parking	A couple of participants had parked off road but generally campers in this study had used car parks or arrived by public transport.

2.2 Who is demonstrating irresponsible camping behaviour?

In order to understand who might be demonstrating irresponsible camping behaviour, we first explored the characteristics of all groups who go wild camping in Scotland.

2.2.1 Socio-demographic characteristics

In a UK-wide online poll we commissioned as part of the set-up of this study, 4% said that they had wild camped (not in a campsite) in Scotland in the past 2 years.[10] Whilst the survey was opt-in and not designed to be nationally representative, comparing the demographics between those who did camp against those who didn't reveals some patterns:

- Around 3 in 10 lived in Scotland, a much higher proportion than the total sample (29%, compared to 10% overall). It is worth noting, however, that in a 2019 report on visitor experiences of Loch Lomond & the Trossachs National Park, 68% of wild campers came from within Scotland.[11]

- However, a sizeable minority of those who had wild camped lived in London (11%) and the South East (14%). Although these proportions are comparable to the overall sample, it is notable given the geographical distance to Scotland.

- More likely to be male: 55%, compared to 43% of all respondents (with the overall sample slightly skewed towards female).

- More likely to be younger, with 35% aged 25-39, compared to 16% of all respondents. Likewise, 85% of wild campers in the study of Loch Lomond & the Trossachs National Park were aged under 55.[12]

- There was no strong pattern by socio-economic group.

Stakeholders reported that each area had a unique combination of visitors from different locations. For example, many campers in Perth & Kinross were reported to be from Fife, whilst the Highlands – in particular the North Coast 500 scenic route (NC500) – are seen to draw more English tourists, and the national parks also see visitors from outside the UK.

We asked stakeholders whether there might be any particular socio-demographic groups who are more likely to demonstrate irresponsible behaviour within this population of wild campers. Stakeholders were reluctant to generalise or to focus on one particular group at the expense of tackling behaviours that cut across different types of camper, from littering to lighting fires.

However, their observations revealed groups that they perceive to be more likely to go wild camping and behave irresponsibly, detailed in the table below:

---

[10] Poll of 2,121 UK residents aged 16 and older by Panelbase and BritainThinks (2021)
[11] Progressive (2019)
[12] *Ibid.*

Group	Irresponsible behaviour reported
Young people	All stakeholders identified cases of young people exhibiting irresponsible camping behaviour. Some wild camp in large social groups of friends, with alcohol or drugs. This was broken down further by some stakeholders into two groups: • Under 20s, often celebrating the end of exams, drinking, and lighting fires. • An older group, in their 20s, who would have attended music festivals or travelled to European party destinations if not for Covid-19. These campers were characterised by abandoning camping equipment and litter, as has become common at festivals. *"A lot of those who are least aware [of the need to camp responsibly] are in the 18-30 age group, and it's the festival culture. Music festivals haven't taken place, so they go to Aldi, buy beer, a tent, the cheapest sleeping bag… It's the leave it behind culture of festivals."* (Scottish Land and Estates)
All male groups	Several stakeholders also identified all-male groups (sometimes older), demonstrating quite different types of irresponsible behaviour. These included: • More 'extreme', quasi-survivalists – inspired by shows such as Who Dares Wins and Bear Grylls – who exhibit more intentional behaviours such as using chainsaws to cut down trees and petrol cans to start campfires. • Groups who travel after work, often in vans and with alcohol, to camp (as opposed to for other recreation) and leave litter behind. • Fishermen, or campers who are also fishing. • An older group characterised as having a 'traditional' view of what camping should look like – with a campfire and beers – and who are reluctant to change their behaviour.

2.2.2 Knowledge and attitudes

Stakeholders pointed to attitudinal commonalities of those who might be more likely to display irresponsible behaviours whilst wild camping. Within this, they included people with less experience or interest in the sustainability, environmental, and conservation aspects of enjoying the outdoors.

"It's a whole spectrum […] What you've got to understand is that a lot of people are just the general public, they just don't know the right thing to do."

(Police Scotland)

Overall, the picture from stakeholders was that for the most part, irresponsible camping behaviour tended to be demonstrated by relatively local people going on a short camping trip with little or no experience of wild camping, rather than by visitors travelling from elsewhere. These people tended to travel to their destinations by car and camp near their car, and were 'camping for camping's sake' rather than camping alongside another activity such as hiking or canoeing. Critically, these people tend to think they are 'doing the right thing', rather than deliberately behaving irresponsibly.
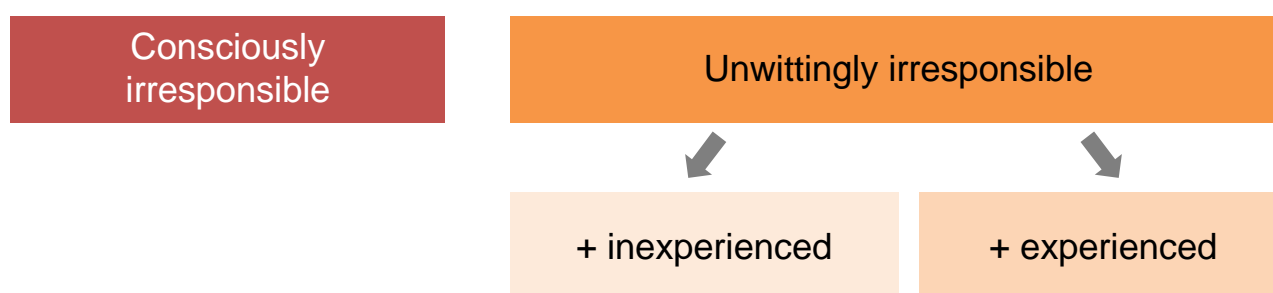
2.2.3 Participants in this study

Our participants broadly reflected the characteristics that were highlighted in the scoping stage of this study, in that they were often relatively young and going camping for social rather than recreational purposes. Discussions also supported the findings from stakeholders that campers behaving irresponsibly did so predominantly because of low knowledge and understanding of how to behave responsibly.

We can broadly classify the types of participant by their attitudes and experience of camping.[13] Very few of our participants were consciously irresponsible, showing no regard for the environment. However this finding should be treated with caution as the selected sample may not be representative of the whole and some participants may be hesitant to voice the real reasons for their actions.

Most were unwittingly irresponsible; some because they are simply inexperienced campers, while others are more experienced but are not aware that something they are doing could be harmful to the natural environment.

Figure 3. Diagram of three groups of camper based on knowledge and behaviour

Illustrations of these types of campers are outlined in the pen portraits of selected participants in our study, below.

---

[13] The interplay of attitude and knowledge is used in other behaviour change models, such as Geller's four 'performer' stages: unconscious incompetence; conscious incompetence; conscious competence; unconscious competence (Geller, E. S., 2002)

Consciously irresponsible

Nick*, 37, lives in Fife. He enjoys spending time cycling and hiking outdoors and frequently wild camps with friends in both the summer and winter months.

He is aware of the importance of leaving 'as little trace as possible' when camping and, when shown the SOAC, felt this was mostly common sense, although he does not always act in accordance with the guidance.

He admits that greater awareness about the SOAC would not change his behaviour. In some cases, this is because he does not understand or agree with the rules, for example he does not perceive it to be irresponsible to light a campfire in a remote area where previous campers have left a stone circle.

But he also sometimes knowingly acts irresponsibly, such as when he left a tent behind because there were lots of midges.

> "I'm really embarrassed that I've left a tent before – the midges were horrible, so we thought stuff it and left it. I think it's just laziness and drunkenness… If I do something wrong, I know I'm doing something wrong."

Unwittingly irresponsible (inexperienced)

Ellie* is 21 and lives in West Lothian. She has enjoyed hillwalking during the pandemic, though does not camp on these trips as she feels she lacks the skills. After seeing others camping on a nearby beach, she started travelling by car to camp there overnight with her boyfriend when the weather was good.

She was not aware of the SOAC but described the importance of not 'making a mess' or causing a nuisance. She feels that most of the guidance is common sense and matches the advice other people have given her.

She was unaware of some specific details of the SOAC, such as where to go to the toilet, but felt she still camped responsibly. She felt her campfire was responsible because other people nearby had them too, and she took steps to ensure her personal safety.

> "We started going a year ago – we'd been to the beach a few times and sat with campfires, and we noticed quite a few people camp there, so that inspired us to one day give it a go. If you want to have a drink, you can't drive home that evening, and we wanted to try something new."

Unwittingly irresponsible (experienced)

Mark* is 35 and lives in Lincoln with his family. He spends much of his free time in the outdoors and particularly enjoys weekend climbing and camping trips to the Scottish Highlands.

He is very aware of the SOAC but feels he would behave just as responsibly even without the guidelines in place, motivated by a passion for protecting the environment and maintaining the beauty of the areas he visits.

He does, however, query the rule about not collecting deadwood, arguing that it is in such abundance in certain places that collecting a small amount would not have an impact.

> *"I didn't really camp until around 6 or 7 years ago. I came across the code later. The point about dead wood – I understand that, but in some places there's an abundance… It's about using your judgement with that one."*

3 Understanding irresponsible wild camping behaviour

After exploring the types of people that behave irresponsibly when wild camping and the typical attitudes that characterise these groups, interviews moved on to a more in-depth analysis of their behaviour, and drivers behind this.

3.1 Motivations to go wild camping

Understanding why some people exhibit irresponsible wild camping behaviours begins with exploring their motivation, knowledge and understanding of wild camping before they embark on their trip. In our interviews with people who had demonstrated irresponsible wild camping behaviour, we explored whether there were any motivations that could distinguish them from wild campers as a whole.

We have framed our findings through the ISM model to identify the individual, social and material context within which people are choosing to wild camp.

Individual factors

Many of the reasons people gave for choosing to camp outside managed facilities centred on individual motivations. These individual motivations do not seem to distinguish our participants from those going wild camping responsibly.

Research of visitor experiences in Loch Lomond & the Trossachs National Park found that most of those who opted to wild camp in parks did so to be close to nature (65%) or for a sense of adventure (61%)[14]. Participants in our study were similarly drawn emotionally to wild camping to experience an adventure of going 'off the beaten track' and 'discovering something new'.

For most, this adventure involved connecting directly with nature and the environment, while for some it included managing without any luxuries or home comforts. This emotional draw both to adventure and nature had been heightened by the pandemic; people had a new found appreciation of the natural landscapes available within the UK and desire to do something with an exciting edge. Participants were drawn to wild camping specifically as a result of:

The sense of freedom

- Coupled with the desire for adventure, participants wanted a sense of choice and control over exactly where they camped. For some, this was to do with the convenience of being able to wild camp in remote locations which they were visiting for recreational purposes, such as walking (as opposed to being confined

---

[14] Progressive (2019)

to the specific areas where other forms of accommodation are located). For others it was about finding the most picturesque location, especially a beach or lochside.

- As part of this sense of freedom, getting away from other people and switching off from technology was another motivation to go wild camping.

"[The main attraction of wild camping is] the freedom of it, the ability to have some control about where you are and what you do. You're freer than when around other people."

(Male participant, 45)

Affordability

- Participants also referred to their desire to achieve an affordable holiday, in particular during the previous two years when other types of accommodation in Scotland were in high demand and prices were perceived to be inflated.

- This factor was evident in Loch Lomond & the Trossachs National Park, where 35% of visitors who chose to wild camp did so due, at least in part, to its affordability.[15]

- However, this was a secondary motivation to the sense of adventure and freedom wild camping provides. Participants were unlikely to have chosen to camp in a campsite had that option been available and affordable, despite toilet facilities at campsites being appealing for some.

"Money… that's why to wild camp, and freedom. We weren't limited to camping in a certain spot, we didn't have to book ahead or have to pay."

(Male participant, 23)

Social factors

Whilst many of our participants had been camping in managed facilities before, they tended to have had less experience of wild camping. They tended to have been introduced to the idea of wild camping through:

- Family and friends who have been before and who have recommended it.

- Social groups (e.g., camping/wild camping groups on social media).

---

[15] Progressive (2019)

When participants sought information about wild camping, it was less about *how* to do it, and more about *where to go*.

> *"My husband and son had been the previous week, and then I was off work and bored, and they had planned the trip and I said I might want to go… I'd been camping years ago but not for the last 20-30 years. It just seemed to be at that point that everyone was going camping."*

(Female participant, 52)

Material factors

Many of the material motivations for wild camping were borne from a desire to experience the freedom that wild camping is seen to provide. These include:

- Avoiding rules and regulations.

- The very absence of rules and regulations draws people to wild camping. Some of our participants believed there to be no rules at all.

- People camping in large groups spoke about wild camping providing an opportunity to avoid noise restrictions at managed facilities and ensure they were not causing nuisance to others.

> *"There's more freedom [in wild camping], no one tells you what to do, I'm not really aware of the rules in place. It was more fun [than a campsite], you can be a bit fun and mischievous – campsites don't like rowdiness."*

(Male participant, 21)

Covid restrictions

- Stakeholders interviewed suggest that the increase in numbers of campers in Scotland has been directly linked to the Covid-19 pandemic. Restrictions such as the cancellation of festivals and closures of bars and restrictions on foreign travel have encouraged more people to find ways of socialising outdoors in the UK.

- Participants talked of escaping day-to-day restrictions by going wild camping and being able to get as far away from the rules as possible, particularly when international travel was banned.

Infrastructure

- For much of our sample who were camping for social rather than recreational purposes, a lack of camping infrastructure was not a driver of their decision to

wild camp. Those who were wild camping for recreational purposes tended to have a bit more experience camping and therefore were not put off by the lack of toilet facilities, for example.

3.2 The drivers of irresponsible wild camping behaviour

We explored the perceived drivers of irresponsible wild camping behaviour with stakeholders before testing those perceptions with participants in our study. Again, we have framed our findings using the ISM model differentiating between individual, social and material factors. While most predate the Covid-19 pandemic, others can be seen as specific to the times.

Individual factors

Lack of knowledge

Stakeholders reported that many campers behave irresponsibly because they lack awareness that what they were doing was wrong, and do not know what responsible action they should be taking. Stakeholders were particularly concerned about low awareness around the risks of fires and use of wood given:

- The risk of the fire spreading underground when peat is present.
- The impact of using up dead wood.
- The effect of removing bark from trees.
- Existing fire rings suggesting that fires are acceptable.

> *"People will see a fire ring and assume it's fine to light fire as it's been done there before. People think they're doing the right thing. People have no idea about peat."*
>
> (Ramblers Scotland)

Stakeholders similarly perceived lack of knowledge to be the main reason for incorrect toileting practices, a finding that echoes several other studies, including in the USA and Canada, which identify lack of awareness, both of 'pro-environmental camping practices' and of the consequences of one's actions, as key factors in irresponsible behaviour among campers.[16] [17]

Low knowledge and understanding of how to behave responsibly also emerged as a key reason for irresponsible behaviour when speaking to campers themselves, as mentioned in the discussion above about campers being 'unwittingly' irresponsible.

---

[16] Moghimehfar, F. (2016)
[17] Marion, J. & Reid, S. (2007)

Some reported not being aware of any rules, nor being familiar with the SOAC (including even that they have the right to wild camp).

Others thought that they had heard of the SOAC or that it sounded familiar when prompted with an extract, particularly the concept and wording of 'leave no trace'.

> *"I don't know if I'm aware of any specific rules, just that you should not leave a trace – you should take everything with you."*

(Male participant, 37)

However, even those who were more familiar with the SOAC tended not to know the detail, falling back on 'common sense' to inform their behaviour. It was apparent that participants' interpretation of 'common sense' varied, and did not correspond to that of the rangers, access officers and land managers we spoke to as part of the stakeholder interviews for this study.

For example, participants spoke of leaving campfire ash or biodegradable litter as still being in the ethos of 'leave no trace', whereas stakeholders considered this to be irresponsible.

Despite all of our sample having engaged in at least one irresponsible camping behaviour, only a few participants identified with being an irresponsible camper. Whilst some participants acknowledged they had done something that fell short of best practice when wild camping, most felt that to the best of their knowledge, they had still behaved well enough overall.

Others had their own sense of a hierarchy of irresponsible behaviours, often considering littering or leaving a tent behind as the most irresponsible but seeing, for example, collecting a small amount of deadwood for a fire as acceptable. Few considered the cumulative impact of their actions combined with large numbers of people wild camping.

> *"We didn't do too much wrong […] I think we left the embers of the fire, but I wouldn't have said that's the worst, it's just going to fix itself with the wind – we brought all our cans home."*

(Male participant, 19)

Cost of campsites

Stakeholders suggested that some campers could be deterred by the high and rising prices at campsites near to hotspots, leading them to camp where there are no facilities, despite a lack of experience doing so and a preference for the comfort and ease such facilities offer. This was identified by stakeholders as a potential cause of irresponsible toileting and fire lighting.

We did not find strong evidence for this among our participants. Whilst our participants were drawn to wild camping because it is affordable, those within our sample had not tried to book a campsite and been put off by the increasing cost or being unable to book.

Lack of respect for the environment and/or other people's property

Some stakeholders felt that, particularly in the case of littering and abandoning equipment, a key cause of irresponsible camping behaviour was a lack of respect for the environment and/or for other people's property. Stakeholders spoke of the 'leave no trace' ethos exhibited by responsible campers, which is felt to be lacking amongst irresponsible campers.

Similarly, other studies have found that people's concern for the environment is significantly influenced by their life experiences involving nature, such as childhood experiences of natural areas and outdoor activities, and having family members who value the environment.[18]

Even if a lack of respect for the environment is indeed a factor in irresponsible behaviour, this did not resonate with participants in our study. They often cited the 'leave no trace' ethos and talked of others who paid no respect to this. However, some participants admitted to irresponsible behaviour as a result of being lazy – for example, leaving litter next to a bin if the bin was full.

Perceived impunity

A few stakeholders felt that campers behave carelessly because they believe they will face no consequences for damaging the environment and/or private land.

> "There were 2,700 people from July to the end of the season. Every single camper was educated there [by the rangers]. But we still found 250 messy campsites and 20 fires extinguished either by themselves or by a fire brigade. That's still a lot of people not being responsible. I don't think it is because they don't know what the rules are – [they] think they can get away with it."
>
> (City of Edinburgh Council)

Although low awareness of the guidance was the key driver of irresponsible behaviour among our participants, for some, the remoteness of their camping location, free from restrictions, was an incentive to behave irresponsibly without fear of the consequences.

---

[18] Kim, A. K. (2012)

Alcohol

Most stakeholders highlighted how alcohol and drugs could be a key driver of irresponsible behaviour. People are more likely to cause damage and disruption when they are intoxicated and, in turn, more likely to abandon tents and equipment the next morning rather than face clearing up.

This was confirmed by our participants, with many citing drinking and hangovers as a reason for their own or others' littering (including two left tents), loud noise, careless fire lighting, and potentially dangerous behaviours such as swimming in lochs at night. Two explicitly stated that their camping trips were for birthday celebrations, with a further 7 participants describing 'social' camping in large groups as part of a short holiday.

> *"If people are just going to get drunk, have a good time, take drugs,*
> *they might just get carried away, start fires, swing from trees."*

(Male participant, 35)

Social factors

Lack of outdoor education

Some stakeholders were concerned that a decline in outdoor education, either through schools or youth groups, such as Scouts Scotland, was driving a rise in irresponsible camping behaviour due to lack of knowledge. Whilst a minority of participants had completed Duke of Edinburgh expeditions or camped from a young age with their families, the majority had not learned wild camping practices early and so were arriving ill prepared for their trip, lacking essentials such as a trowel to bury human waste or bin bags to take their litter home.

> *"If you're a new camper, you might not even be aware there's a code –*
> *quite a few of the guys had never been camping… [There should be]*
> *talks in schools – here are some nice spots, and here are some rules.*
> *Tips are needed."*

(Male participant, 22)

The 'curse of knowledge' cognitive bias

Our conversations with stakeholders and campers, coupled with our own exploration of the available guidance, have identified that those who are experienced in spending time outdoors are affected by the 'curse of knowledge cognitive bias'. This means that the behaviours or etiquette they have learned from, for example, an 'outdoorsy' upbringing,

feel like common sense. When they communicate with others on the topic, they assume that they will have a similar level of background knowledge. Whilst the SOAC and associated guidance go a long way to defining *how* to behave responsibly, derived messages and advice from those who are more experienced can sometimes fall back on the assumption that it is obvious, easy, or common sense, to know what to do.[19]

> *"People don't take common sense with them when they go away."*

> (Highland Council)

What we heard from campers suggests that this phenomenon can backfire, with inexperienced campers interpreting such advice according to their own common sense, which can be at odds with what is actual responsible behaviour. For example, a participant explained that he thought toileting in a loch was a responsible behaviour, because any pollution is immediately washed away by the water (as opposed to understanding that this behaviour polluted the water source).

Romanticised ideas of camping

A number of stakeholders felt that imagery in the media of idealised camping trips is influencing people's behaviour. For example, showing people lighting campfires to gather round and toast marshmallows, without communicating when and where it is safe to light fires when camping. Several participants noted that fires are widely seen as an indispensable part of a wild camping trip, due to depictions of camping on television and in films. Within social norms more widely, campfires are valued for the warmth they provide and the ability to cook or heat food. This resonates with findings that recreational behaviours which are perceived positively, such as letting a dog off the lead in a forest setting (seen as positive for both the individual and the dog), are harder to change.[20]

> *"People want fires, it's a romanticised aspect of camping that people want."*

> (Male participant, 23)

Survivalist television

More extreme damage to surroundings, such as chopping down trees and lighting larger fires, was perceived by several stakeholders to be inspired by 'survivalist' television shows such as Bear Grylls and Who Dares Wins, particularly as the latter is

---

[19] For example, the VisitScotland website states that "**It's not complicated** - basically, campers should follow a policy of 'leave-no-trace'": Wild Camping in Scotland | VisitScotland (Accessed April 2022)

[20] Marzano, M. & Dandy, N. (2012)

set in Scotland. These programmes were thought to confuse the boundaries between acceptable and irresponsible behaviour.

> *"Where we [the police] get more involved is with the groups in their late 20s-early 30s, all male, watching Who Dares Wins or Bear Grylls, and going away for weekends with slabs of beers, taking chainsaws to cut down trees and cans of petrol to set them alight."*

(Police Scotland)

None of our participants identified these television shows as a direct source of inspiration, nor did anyone admit to causing this kind of serious harm to their surroundings.

Peer pressure

Both previous studies and some stakeholders pointed to the effect of peer pressure and norms on outdoor behaviour, particularly for younger age groups.[21] As a result, people may be more likely to litter and abandon equipment after seeing friends do so.

> *"There's probably a bit of peer pressure as well if they're in a group that if, you know, one of them says 'let's just leave it' well the rest of them don't feel like tidying up. It's just laziness and they think they can get away with it."*

(City of Edinburgh Council)

Several of our participants cited peer pressure as a reason for their own poor behaviour, that of their wider group or other campers, in particular when it comes to littering. Even one experienced and environmentally conscious participant – who camps regularly with his young sons – reported being less conscientious when camping with friends due to not wanting to be seen as too 'militant'.

Different social norms in different locations

Existing research suggests that different 'sites of practice' (i.e. in this circumstance, places where people go wild camping in tents) can encourage behaviours not regularly displayed in other settings – which therefore may be true for individuals who otherwise have limited experience of holidaying in this way.[22]

---

[21] Kolodko, J. & Read, D. (2018)
[22] Barr, Stewart et al (2011).

Covid-19 impact

Whilst escaping Covid-19 restrictions was a motivation to go wild camping for many, the pandemic has also led to a removal of the opportunities to socialise, whether in bars or at festivals, or to travel further for foreign holidays.

Almost all stakeholders we spoke to attributed the more serious irresponsible camping behaviour in recent years to the cancellation of festivals and closure of bars and nightclubs. Groups of young people were using the outdoors for social gatherings and adopting a 'festival culture' of littering and abandoning their tents. This was only explicitly mentioned by one participant who attended a camping 'party' for one night, although the lack of other socialising opportunities can be assumed to have influenced a number of other participants given their descriptions of their trips.

> *"I've camped more regularly since Covid. It can't be cancelled, that's probably why […] We only went for one night – a Saturday – it was really just a boozy Saturday night."*

(Female participant, 32)

Similarly, without the opportunity for foreign holidays, stakeholders reported a sharp increase in the proportion of people taking a holiday in Scotland to go wild camping, who had little or no previous camping experience. Several of our participants did have limited camping experience prior to the pandemic and were inspired to go due to a lack of other holiday options, although these were not necessarily more irresponsible than those who had camped beforehand.

Lack of facilities and infrastructure

Many stakeholders cited a lack of infrastructure as contributing to irresponsible behaviour.

Several highlighted the lack of bins in hotspot areas as a cause of litter, and the lack of toilets as a key factor in irresponsible toileting.

> *"A lot of the time, if it's a spot that's less isolated, then usually you find the bins are full, it just really depends. Where there's a car park and toilet facilities, you find those bins are overflowing."*

(Male participant, 35)

Some felt that more basic campsites in beauty spots would be attractive to inexperienced campers. Instead, demand for tent pitches escalated during the pandemic and the camping provider market turned to providing more profitable

'glamping' – a type of camping that is more comfortable and luxurious than traditional camping – sites for campers who would have previously taken more luxurious holidays. This could be following a trend found in Australia and New Zealand, where a rise in glamping has been thought to be displacing other campers into the more affordable practice of 'freedom camping'.[23] Freedom camping is similar to wild camping in that it takes place outside of managed facilities and the costs associated with those facilities, particularly the more expensive glamping sites. It was felt that additional infrastructure would benefit inexperienced campers who prefer simpler options.

> *"Some people are going out into the countryside and are not expecting to be self-reliant. A lot of people enjoy semi-wild camping. That very inexpensive, simple infrastructure is lacking in a lot of the countryside – standpipe, portaloo, somewhere to put the car. Low cost, simple sites. That's lacking."*

(Mountaineering Scotland)

Research of Loch Lomond & the Trossachs National Park found that 35% of those who chose to camp in semi-formal, low-cost campsites wanted a sense of adventure but the comfort of essential facilities.[24] This indicates that a lack of such facilities may be a factor for some campers.

However, none of our participants reported seeking out inexpensive light touch camping facilities and failing to either find or book a campsite. The fact that freedom was felt to be a major attraction of wild camping suggests that the appetite for even light touch facilities would not necessarily be higher even if the facilities were present.

A few participants spontaneously mentioned a lack of bins, overflowing bins, and the long distance to the car park with their belongings as reasons for themselves or others to litter.

Although the lack of toilet facilities troubled a minority of participants, it did not mean that that managed campsites were considered as a preferable alternative. Instead, irresponsible toileting behaviour was more commonly reported to be caused by a lack of preparation and awareness on the part of the campers. It is likely that the provision of more toilet facilties at roadside locations or car parks would be welcomed as an alternative.

Availability of cheap equipment

Stakeholders consistently attributed the rise in equipment being left behind to the increased availability of very cheap camping equipment, from budget supermarkets and some high street outdoor equipment retailers.

---

[23] Auckland Council (2017)
[24] Progressive (2019)

Abandoning camping equipment is consistent with a general rise in 'disposable culture'.

"The availability of extremely cheap camping equipment is definitely a factor I get frustrated with, and the notion of a 'festival tent'… It's like a disposable tent, available for 14 quid from [a supermarket], and the temptation for people just to use that, get rained on, realise it leaks or it's ripped, and then just leave it is obviously high."

(Ramblers Scotland)

Only one participant, and another participants', friend abandoned tents at the end of their trips, citing midges, bad weather, and hangovers, rather than the cheap cost, although this likely played a role.

Another pair of participants reported purchasing tents from a budget supermarket but did not abandon them in Scotland as they planned to reuse them for a festival. Other participants owned tents and other kit that they reused or borrowed from friends or family.

Insufficient investment

More generally, stakeholders did consider that the rise in numbers enjoying outdoor recreation, even before the pandemic, has not been matched by investment in protecting the natural environment. Both landowners and authorities lack the staff, resources, and infrastructure to accommodate visitors.

One participant noted that a lack of investment could be a driver for irresponsible behaviour, linking this to a lack of infrastructure (bins, toilets) and enforcement (patrols).

"If they realised the value of the first-class nature in the Highlands, they would put in infrastructure to help people do it responsibly, otherwise they're leaving it up to people's own sense of responsibility."

(Male participant, 37)

Accessibility

Stakeholders highlighted how camping hotspots occurred primarily in roadside locations. Campers travelling to camp for social rather than recreational purposes can bring more belongings, such as crates of alcohol, music equipment, chairs and tables if they can camp close to their cars and not have to carry their equipment far.

In turn, the risk of littering or engaging in anti-social behaviour is higher if people are not travelling light.

> *"[The festival brigade] are taking everything from close proximity to car, in a shopping trolley, then leaving everything."*
>
> (Police Scotland)

Most of our participants drove close to their camping location, but only one pair reported camping right next to the car park. For another pair, having a car did enable them to bring more equipment, but it also made it easier to take away all their belongings and rubbish.

The great outdoors

Stakeholders felt that sometimes, the unpredictable weather and experience of midges can contribute to irresponsible camping behaviour. Inexperienced campers can pitch their tent in an area that floods when it rains or be overwhelmed by midges, both circumstances causing them to abandon their equipment. Several of our participants had experienced bad weather and midges, and whilst the majority accepted this as part of camping in Scotland, both factors caused a participants' friend and another participant to leave tents behind.

4 Preventing irresponsible camping behaviour

4.1 Addressing individual and social factors

In order to reduce irresponsible camping behaviour, we need to address the individual and social context affecting motivations to wild camp, and attitudes to protecting the natural environment that are driving the behaviour.

We have plotted each of the irresponsible behaviours against the axes of awareness and acceptance below. The behaviours that participants are most likely to accept are irresponsible broadly correlate with those they have more awareness of. For example, whilst the environmental impact of littering is clear, and 'leave no trace' is widely accepted among our sample, participants are less aware of the environmental impact of collecting deadwood, and less likely to accept guidance not to as they do not see it as problematic.

Figure 4. Diagram showing relationship between prior awareness of guidelines about certain behaviour and how accepting participants were of the guidance
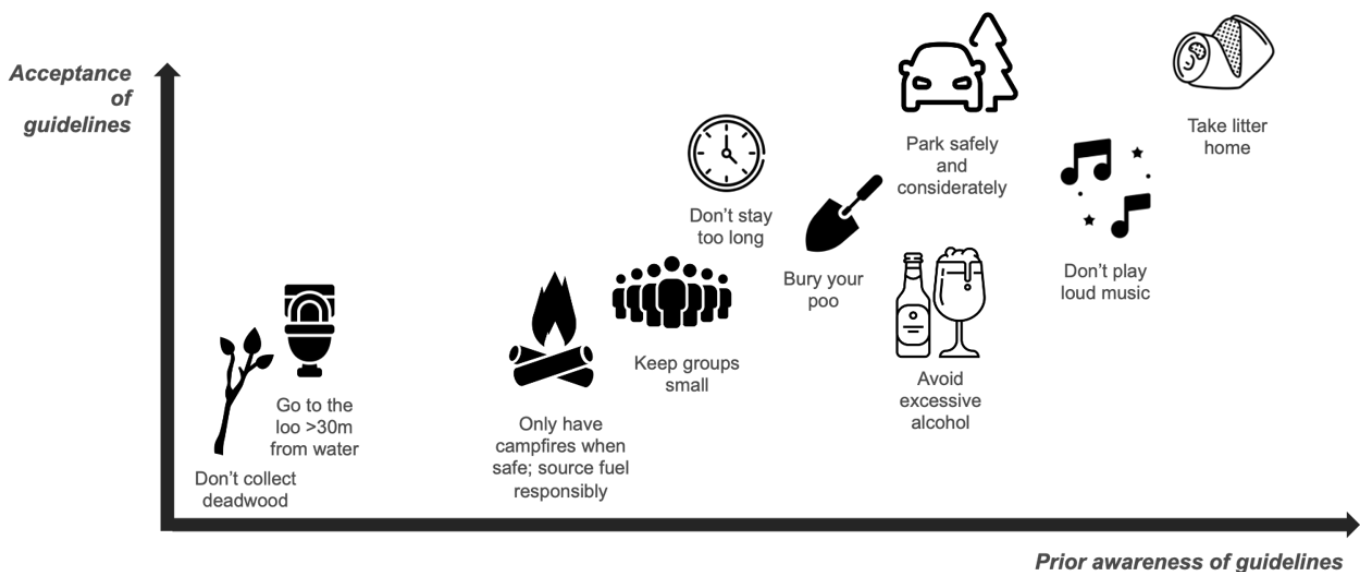
We explored with participants what they think would help reduce the different types of irresponsible behaviours based on their own awareness and attitudes – although as we have highlighted, none of our participants consciously identified themselves as an 'irresponsible wild camper'. The most inexperienced wild campers tend to be unaware of the guidance and the consequences of their actions, whilst more experienced campers may have high levels of awareness but hold values about the acceptability of an action that differ from those trying to maintain the landscapes.

4.1.1 High awareness/high acceptance behaviours

Out of all the irresponsible behaviours discussed as part of this research, our participants singled out littering. Properly disposing of rubbish is felt to be common sense guidance and widely accepted, even by participants who admitted to littering on occasion. On the rare occasions when a couple of participants have littered, these instances were characterised by being as a result of other irresponsible behaviours (e.g., being hungover), fitting in with others (e.g., littering if friends did) or as a result of thinking they were doing a responsible thing (e.g., leaving litter next to a full bin, or leaving biodegradable litter). As a result of the acceptance that littering is unacceptable, further education will likely do little to change behaviours.

> *"No litter is going to be the obvious [rule] [...] I'm pretty sure we left stuff,
> we lit a massive burnhole, and I'm pretty sure one of the guy's tents."*

(Male participant, 21)

Nearly all spontaneously mentioned the importance of caring for the environment and could see how actions such as littering or abandoning equipment caused immediate damage both to the natural environment and its enjoyment by others.

4.1.2 Medium awareness/medium acceptance

The behaviours in the middle of the diagram can feel open to interpretation, or have the reasoning behind them questioned. This group of behaviours can present particular difficulties for inexperienced campers who are seeking very simple instructions rather than guidance that requires them to exercise their judgement over how much is 'too much' or in the wrong place and could cause damage. For example, participants understood that driving off road could damage wildlife, but questioned if it really made much of a difference when simply parking on the verge next to the road. There are, however, challenges with creating a blanket set of black and white instructions, which are discussed in more detail in the 'Tailoring communications' section below.

Of all the irresponsible behaviours we discussed there was most uncertainty about campfires. Participants were keen to light fires as part of a perceived ideal camping experience but knew little about whether or where fires were acceptable. Seeing evidence on the ground of fires built by previous campers further reinforces perceptions that campfires are permitted in that particular place. In areas where fires are not appropriate, it will be particularly challenging to break this romanticised connection between campfires and wild camping.

> *"The whole point of camping is that you get a wee fire going – I thought
> that was a legitimate part of camping. When it's saying don't do it,
> definitely people will."*

(Male participant, 19)

Some behaviours, such as large groups, drinking alcohol, length of stay or volume of music, don't make sense to participants. Going to remote locations is seen to be a real

driver for going wild camping, and most believe that the impact of these behaviours is low because they are not disturbing other people in such a rural location.

> *"Being quiet… If you're far away from anything, you should be okay, I don't see much of a problem."*

(Male participant, 22)

> *"It's the laughter, the freedom, just have a carry on without repercussions."*

(Female participant, 32)

Tackling irresponsible behaviours in this middle ground needs to be particularly sensitive to people's concern about being reprimanded for behaviours where they are not confident about the right thing to do, and do not necessarily see the harm of their 'one off' evening of, for example, drinking in a large group.

Instead, they are seeking positive information about how to enjoy their camping experience within the parameters of what is permitted – such as how to deal with the remains of a campfire in a responsible way, or where to park considerately to lessen the environmental impact. They want to know how to sustain the natural environment rather than being told not to do things. Much of this can be built on the 'leave no trace' ethos that is well known and received.

4.1.3 Low awareness/low acceptance

Across these low awareness/low acceptance behaviours, not seeing the irresponsible behaviours as an issue is a barrier to changing behaviour. Participants need to be shown why it is problematic and persuaded to consider the wider consequences.

This is consistent with findings from other research on a range of behaviours in different contexts, including littering;[25] allowing dogs to roam off-lead in unsuitable areas;[26] irresponsible disposal of human waste in an alpine context;[27] and lighting campfires.[28]

In our research, the guidance around not collecting deadwood did not make sense to participants, who saw that it was on the ground, and therefore not problematic should they collect it and use it for a fire. Communication could therefore emphasise the fragile inter-dependencies of eco-systems, showing the connection from deadwood on the ground to the insects that rely on it to feed, up to the birds that feed on those insects. This is supported by findings from Natural England research, which found that identifying the victim of irresponsible behaviour, such as an image of a hedgehog caught in plastic, was easy to understand and increased engagement with positive behaviours around litter.[29]

Similarly, whilst some participants were aware of the need to bury waste, the guideline for toileting more than 30 metres from a water source was not intuitive. Showing how human

---

[25] Kolodko & Read (2018)
[26] Scottish Natural Heritage (2015)
[27] New South Wales Government (2005)
[28] Marion & Reid (2007)
[29] Natural England (2022)

waste can pollute drinking water and habitats for fish can help to explain why they should bury waste more than 30 metres from a water source.

- Some participants were reluctant to talk about toileting behaviours while camping and felt that communications could relay a serious message with good humour. Simple language about poo and wee was preferred, and simple messaging such as 'bag it and bin it' for dog waste was felt to be appropriate.

> *"If we're doing things as responsible as we could, we might ignore rules like the 30m from open water if we didn't understand the reason why."*

(Male participant, 23)

When presented with the SOAC guidelines, participants tended not to hone in on guidance that contravened their established habits. It is unlikely to be the case that people who behave irresponsibly when wild camping will change their behaviour by reading a long list of rules. Instead, approaches that engage with this audience on a regular basis and highlight the impacts of irresponsible behaviour, are likely to be more effective.

However, even those less experienced campers who are particularly open to guidance are not likely to be researching this before their trip. As a result, campaigns and messages need to meet campers where they are – such as by showing practical information (where to go, walking routes etc.) whilst showing responsible camping behaviours. This need for positive messaging is consistent with the 2022/23 priorities for visitor management in the Cairngorms National Park.[30]

4.2 Addressing material factors

Beyond the individual and social context, the research suggested a number of changes to the material context that could reduce levels of irresponsible behaviours when wild camping.

4.2.1 Interventions

When asked directly about what kind of interventions could tackle irresponsible behaviour, the wild campers we spoke to instinctively referenced methods to enforce rules and punish offenders. Our participants did not feel that enforcement was either common or strict enough to deter people. This is consistent with findings elsewhere about littering; fines do not cause people to modify their behaviour unless they think they may actually be penalised.[31] One stakeholder interviewed also described how campers would purposefully go off the beaten track to avoid the risk of being caught by rangers.

> *"We see people going to more obscure places. We're not sure why they're doing it, but judging by the state they've left behind it's to avoid rangers."*

(Perth and Kinross Council)

---

[30] Cairngorms NPA (2021)
[31] Kolodko & Read (2018)

For example, participants suggested using closed-circuit television (CCTV) in hotspots, giving rangers the power to administer on-the-spot fines and having a hotline or equivalent for members of the public to report others who are behaving irresponsibly. It is likely that these suggestions were derived from participants' experiences of strong deterrents on other issues that are well suited to such methods, such as speeding fines or CCTV in urban areas to deter antisocial behaviour.

Discussions revealed that this appetite for more enforcement was embedded in the belief that it is 'other people' that behave irresponsibly and that this kind of enfrocement should only be used for extreme instances, such as serious littering. Participants implied that they did not expect to get into trouble themselves, having not done anything 'seriously' wrong. A study of freedom camping in Aotearoa, New Zealand similarly found that campers wanted more enforcement to combat the poor behaviour of 'others'.[32]

> *"[There should be] a fine in place to make sure everybody behaves - a large fine to scare people. There probably is a fine in place already, but I don't think people are aware."*

(Female participant, 52)

Legal action is considered suitable only as a last resort by the police and site managing bodies. Enforcement sits on a hierarchy of action comprising Engage-Explain-Encourage, and only then Enforce. Instead, stakeholders emphasised that it is crucial to have a visible presence of rangers or authority figures on the ground, who can then engage with campers and encourage them to behave responsibly.

This method also aligns with the idea that behaviour change interventions should lead with a positive message, rather than negative, a view that is strongly supported by both participants and stakeholders.

4.2.2 Infrastructure

Infrastructural improvements to aid behavioural change are consistently found to be effective in existing literature. The most effective of which is reported to be the installation of bins or bin bags to tackle littering, both as a means for disposal and acting as a visual prompt.[33, 34] Kolodko and Read (2018) also note the importance of bin design: making bins convenient, appealing and easy to use.[35]

The wild campers we spoke to likewise felt that it could be convenient to have more bins and (to a lesser extent) more toilets. However, it was important for some that these did not detract from the 'wilderness' and sense of escapism which make wild camping so appealing. On balance, better signposting to existing facilities, whether virtual or physical,

---

[32] Collin, D. (2018)
[33] Settina, N., Marion, J., & Schwartz, F. (2020)
[34] Auckland Council (2017)
[35] Kolodko & Read (2018)

was felt to be a more effective way of guiding those who are looking for more infrastructure.

Nevertheless, the scarcity of facilities in more remote areas means that a signposting approach would have to be accompanied by building more facilities, even if these are located in car parks or on the roadside, so as not to interfere with the landscape.

> *"If the big concern is going to the toilet in bodies of water, there could have been better toilets along the route […] Bins were pretty good, but toilets could have been better. That said, if you start putting bins everywhere it does ruin the scenery a bit."*

(Male participant, 21)

Although abandoning equipment was agreed to be a serious problem, there was no support amongst our camping participants for attempting to regulate a minimum pricing for camping equipment.

A number of our participants had older or borrowed equipment and would not have been affected by this, but they were also concerned that this could create barriers to others enjoying the outdoors – especially as the low cost of wild camping is part of its appeal.

4.3 Tailoring communication strategies

4.3.1 Communicating the desired behaviours

Stakeholders, wild camping participants and the literature all point to the importance of communicating with clarity and consistency when promoting responsible behaviour.[36]

> *"[It would help] if the Scottish Outdoor Access Code was clearer, more black and white at national level."*

(Perth and Kinross Council)

Clear and consistent messaging across Scotland has been a key aim of communications by NatureScot and other national bodies during the pandemic. However, it still remains a challenge to strike a balance between making guidance as detailed and specific as possible (so that it is clear what campers should and shouldn't do), with the need for short, simple messages that also make it easier for communications to be consistent.

Consolidating the current guidance, choosing unambiguous terminology, communicating the rationale and utilising local, site-specific messages could help to address this challenge. None of these approaches provide a straightforward solution and it is likely that combining elements from all four strategies will be most effective.

We have summarised this challenge in the table below:

---

[36] Marion & Reid (2007)

Communication approach	Reasons for pursuing this approach	Limitations of this approach
Consolidating wild camping guidance into one central "landing page	• The SOAC and associated guidance provide advice on various aspects of wild camping, but currently the content, level of detail and explicitness vary across different channels and organisations. • For example, the SOAC doesn't give much detail on how antisocial behaviour in remote areas, or playing loud music, are considered to be irresponsible. • A well sign-posted, definitive set of guidance would be useful for land managers and rangers (as well as wild campers) as a reference tool.	• Responsible camping encompasses a wide range of behaviours (which are difficult to distil into succinct guidance). • The uncertainty about the rules shown by our camping participants also suggests that adding any extra detail to the rules would be challenging to communicate in a meaningful way. • It is perhaps unrealistic to expect wild campers to refer to detailed guidance prior to their trip (given how little preparation many of them currently do).
Using terminology that is as unambiguous as possible	• Some of the communications derived from the SOAC ask campers to refer to 'common sense' or use terminology that risks being interpreted in different (and incorrect) ways. • For example, 'not causing any pollution' can mean different things to different people and participants	• Removing ambiguity can result in longer and more detailed phrasing, which poses similar challenges to those outlined above (i.e. adding extra detail can become confusing and make it less likely that people will read it in full). • Attempts to remove ambiguity could leave little room for behaviours that are dependent on the local context, resulting in inappropriate and potentially counterproductive restrictive

	didn't always make the link with inappropriate toileting practices.	messaging at certain times or places.
	• Subjective words, for example referring to 'dry' periods as inappropriate for campfires may be less effective than stating specific months of the year when it is likely to be dry.	
	• Behaviours with lower baseline awareness and intent need the most specific, clear, terminology, for example: 'If the bin is full, don't dump' rather than 'Please remember to take your rubbish home to help look after the natural environment'.	
Tailoring messages to the local context and making them specific to each site	• Blanket national messages may be difficult to justify in all locations and are less likely to be accepted and acted upon.	• There is a risk that local or site-specific messaging will undermine the consistency of a national campaign, causing confusion amongst campers and uncertainty amongst stakeholders.
	• Location-specific messages can be more concise and explicit because they only need to accommodate a limited range of circumstances.	• Stakeholders stressed that local organisations have limited media reach and look to national guidance to inform their advice to campers.
	• Given the target audience is hard to reach, local communication may be more effective than a national campaign.	

	• Especially as local communication can make use of more traditional, offline channels, such as noticeboards, radio adverts and in-person communication.	
Explaining the rationale behind behavioural asks or using outcome-focused messaging	• Explaining why campers should behave in a certain way will help to increase acceptance of messaging by tapping into behavioural levers at the individual and social level. • Focusing on the outcome could reduce the need for detailed behavioural instructions, making it easier to create succinct messages.	• Focusing on outcomes could still leave room for ambiguity if campers don't have the knowledge or skills to behave in a way that achieves the outcome. • For example, messages that focus on the outcome of not causing pollution through incorrect toileting might still require accompanying instructions asking campers to defecate away from water and bury waste, due to low knowledge of these actions.

4.3.2 Reaching the target audience

Stakeholders interviewed for this study recognised that designing communications to reach and influence those demonstrating irresponsible camping behaviours is challenging, given they are unlikely to engage with messaging targeting those who regularly engage in outdoor activities in Scotland.

And, although those demonstrating irresponsible behaviours may be more likely to be young, male and camping for social rather than recreational purposes, it would be unwise to only target communications at these audiences. We also know that communication must reflect the level of research campers are likely to conduct before a trip, varying from:

- Those who do no research beforehand, because they are already familiar with the area, or rely solely on advice from more experienced friends or family.

- Those who use 'unofficial' information sources, such as Facebook groups, online forums, or simply Googling 'wild camping spots'.

- Those who, in addition to 'unofficial' sources, actively seek out more 'official' information before their trip, typically those planning recreational activities.

4.3.3 Communications touchpoints along the journey

Initial planning:

- Research around 'Leave No Trace' in the US has found that messaging about behaviours is most effective when received at the time of decision-making, such as in the planning stage.[37]

- However, as highlighted, participants in our study tended not to conduct significant research before their trip, and some were unconvinced that a targeted campaign encouraging certain behaviour would stick in their minds. That said, most did do some research, usually looking for general information about where to go or to plan their routes.

  "When you're preparing to go and planning, you could find [information] on the internet. You're actively looking for it. I guess also TV, advert, radio, then you're not looking for that info – it's just there."

  (Female participant, 37)

- Many stakeholders suggested point-of-purchase messaging in shops selling cheap camping equipment, including supermarkets and high street outdoor activity retailers. NatureScot has explored this approach but has not found it to be effective in the past. Participants were also unlikely to consider this a viable option given that many of them already owned, or were borrowing, existing equipment.

- However, there could be value in partnering with outdoor activity retailers to promote responsible behaviours indirectly, or at the very least to ensure that they are not inadvertently perpetuating social norms that lead to irresponsible behaviour. For example, this could include working with retailers to eliminate any imagery of open campfires that could perpetuate romanticised ideas of wild camping.[38]

On the journey:

- Given that many drive to their camping destinations, another potential medium for communications was thought to be navigation apps such as Waze, Google or MapsMe, with the latter used more for hiking trails and identifying possible camping spots.

At bed and breakfasts, hostels, or managed camping facilities:

- It is common for campers to combine wild camping with stays in bed and breakfasts, hostels, or managed camping facilities, to use showers and cleaning facilities. This suggests that these would be useful sites for reminding campers of best practice for responsible camping.

---

[37] Marion & Reid (2007)

[38] For example, a blog by Tiso, an outdoor retailer, shows an image of an open campfire at the top of an article about wild camping spots: Top Wild Camping Spots | #ClaimYourCorbett (tiso.com)

Close to or at destinations:

- Similarly, as identified by stakeholders, businesses located close to hotspots are thought by campers to be an appropriate site for communicating messages about responsible camping. Additionally, given that many described driving from major towns or cities, service stations along routes to key hotspots could be another suitable site, an approach which has also been previously used by NatureScot.

- Most stakeholders and campers alike would like to see more and better signage in hotspots, along walking routes, and in car parks reminding visitors of what they can and cannot do, or offering location-specific guidance, for example about fires. Some existing research from New Zealand has found high levels of compliance to signage.[39]

- Another study in Scotland finds that repeat visitors are unlikely to read permanent signage, emphasising the need for a dynamic approach in which signs are, if possible, used only when genuinely required.[40]

- There was also appetite for signage that directs campers to facilities that they can use whilst still enjoying the wild camping experience, including bins, toilets, and designated fire pits, giving an indication of distance or walking time. This highlights the potential importance of positively managed provision for camping in key places.

> *"There should be facilities to [light fires safely] where possible, and some signs to show where those are. They [campers] might not know about dry periods. There should be a sign stating there's a place this far away, rather than saying you can't do it. Also, more signage to let people know that in this many miles there are toilets/services."*
>
> (Male participant, 22)

- For example, one camper commented on the signage in Loch Lomond and the Trossachs National Park, which made it clear that there are specific restrictions in that area. He proposed using colour-coded signage to make it clear where there is specific guidance for that local area.

- A few stakeholders and more experienced campers did express concerns about the aesthetics of signage, fearing they would look out of place in remote locations. There is likely to be a tension between making signs visible but not visually intrusive and designs would need to learn from best practice elsewhere.

Targeted reinforcement:

- Almost all stakeholders identified rangers as the key people to deliver messages on responsible camping. Although our participants, many of whom were inexperienced campers, did not spontaneously mention rangers to the same degree, they held

---

[39] Auckland Council (2017)
[40] Scottish Natural Heritage (2015)

them in great respect and felt they would listen to any advice they gave. Part of this response was driven by an underlying desire not to get in 'trouble'.

> *"The camp ranger came and spoke to us. They woke me up […] I've always been a bit more careful since… So somebody being there. I don't like getting in trouble, and [it was] educational because we thought it was fine because people had already had a fire there."*

(Male participant, 37)

- This is consistent with several studies which show that personally delivered messages by credible or respected messengers are more effective than other communication media.[41]

- A small number of stakeholders and participants suggested pushing location specific text messages with key points of the guidance to people arriving in hotspots. This approach would likely prove challenging to implement, and may only be possible via an opt-in method, for example by getting campers to download an application and opt in to notifications.

- This method would therefore be unlikely to reach those campers who are not already engaged with current guidance and communications.

4.3.4 Online communications

Advertising campaigns:

- Existing literature on behavioural change in a range of contexts demonstrates that positive messaging tends to be more effective than alternatives. This includes being welcoming rather than hostile to visitors, explaining land management concerns, promoting the personal benefits of more responsible behaviours, and accommodating the experiences desired where possible (even if this means identifying less sensitive places or times).[42, 43, 44]

> *"I think the approach they should take is don't make it sound like you're telling people off – the majority of people do this well, and it's important to keep doing it. Keep it upbeat and positive."*

(Female participant, 21)

- Participants were enthusiastic about advertising that promoted and encouraged wild camping in Scotland while showing a range of responsible behaviours. This would have broad appeal across all types of campers, including those who conduct no research prior to going camping.

- Although some referred to television and radio, most thought this could be effective on social media feeds targeted at people showing an interest in Scotland, the

---

[41] Settina et al. (2020)
[42] Marion & Reid (2007)
[43] Scottish Natural Heritage (2015)
[44] Jenkinson, S. (2011)

national parks or outdoor recreation, or in advertisements preceding content on platforms such as YouTube.

- Local people were pinpointed as potentially trusted sources to communicate the messages in an advertising campaign. Participants felt that locals are knowledgeable and have relevant experience, and are therefore thought to be far more influential than a political or official figure.

- That said, endorsement from nationwide bodies including NatureScot, the National Trust for Scotland, Historic Environment Scotland and Forestry and Land Scotland is felt by some to be a necessary badge for a campaign to be authoritative.

> *"Probably when you go camping you meet a lot of people, the local people. You'd trust them more than someone from the Scottish Government who's never walked a path."*

(Female participant, 32)

- Some participants were enthusiastic about celebrities appearing in campaigns, with several suggesting that knowledgeable figures in the outdoor space, such as David Attenborough, Ray Mears, or Bear Grylls, could help draw attention and give weight to a campaign.

- Consistent with stakeholder views, a positive, light-hearted tone was felt to be crucial to engage the target audience, particularly those who are not already passionate about the environment. A minority propose using humour, such as comedy sketches, although there is a risk of making these clichéd.

- It was notable that most are strongly opposed to negative messaging, feeling that this is patronising and will be disregarded by campers, particularly given the wealth of rules people were asked to follow during the pandemic.

Social media influencers:

- Social media influencers were also highlighted as having great potential as channels for communicating messages about responsible camping with young people, as their content is felt to be more relatable and credible than an advertisement. There are, however, several important considerations to increase the likelihood of success:
  - Content must be 'quick turnaround' to be up-to-date with the trends in any given week;
  - The influencers must be relatable, 'normal' people with a substantial following;
  - They should not already be associated with the outdoors, as their target audience does not necessarily identify as 'outdoorsy'.

- A few young male campers felt that influencers would have little or no impact on their behaviour, which suggests this method should not be relied on exclusively to target young people.

Social media groups, online forums and blogs:

- For those who engage with online groups and forums, e.g., 'WalkHighlands', and other blogs about camping and related outdoor pursuits such as Munro bagging, there is felt to be some benefit to promoting positive messages about wild camping.[45]

- People are interested in tips about finding wild camping spots and about how to get the most from their trips. Again, guidance must be framed as educational and not judgemental.

> *"The tone of the message is important. It needs to be educational rather than judgy. I talked about that Facebook page, you get a lot of people who act as if they have authority, but it just irritates me. But if you just educate people informally. When people go on preaching it's just irritating."*

> (Male participant, 37)

Accessible online official information and Search Engine Optimisation (SEO):

- Some participants felt that SEO – a set of practices that improve the appearance and positioning of web pages in search results – designed to put guidance at the top of the search list would be an effective way to raise awareness of how to behave responsibly.

- Participants struggled to recall seeing any reference to the SOAC or other guidance when conducting pre-trip online searches, which is likely as a result of searching using terms such as 'wild camping spots Scotland', rather than searching specifically for SOAC-related guidance.

- From internet searches conducted as part of this research, it was clear that there are many websites advertising information on wild camping in Scotland. Such sites emphasise the freedom and beauty of wild camping and direct campers to hotspots, thereby increasing the likelihood of environmental damage from cumulative use. Although these same websites sometimes reference the SOAC or similar guidance, it tended to be light-touch and not be positioned prominently.

- For example, the Redbull website lists 10 locations for wild camping, encouraging readers to 'forget about campsites with their rules and regulations'. The only reference to responsible behaviour is to do with littering, without mentioning the SOAC or other behaviours, such as fire lighting and toileting.[46]

Figure 5 below gives an indication of search results using a popular internet search engine, with the Redbull example featuring on the first page of the results.

---

[45] Walkhighlands: Scotland walks and accommodation
[46] Wild camping spots in Scotland: These are the 8 best (redbull.com)

Figure 5. Screenshot of Google search for "wild camping spots Scotland"
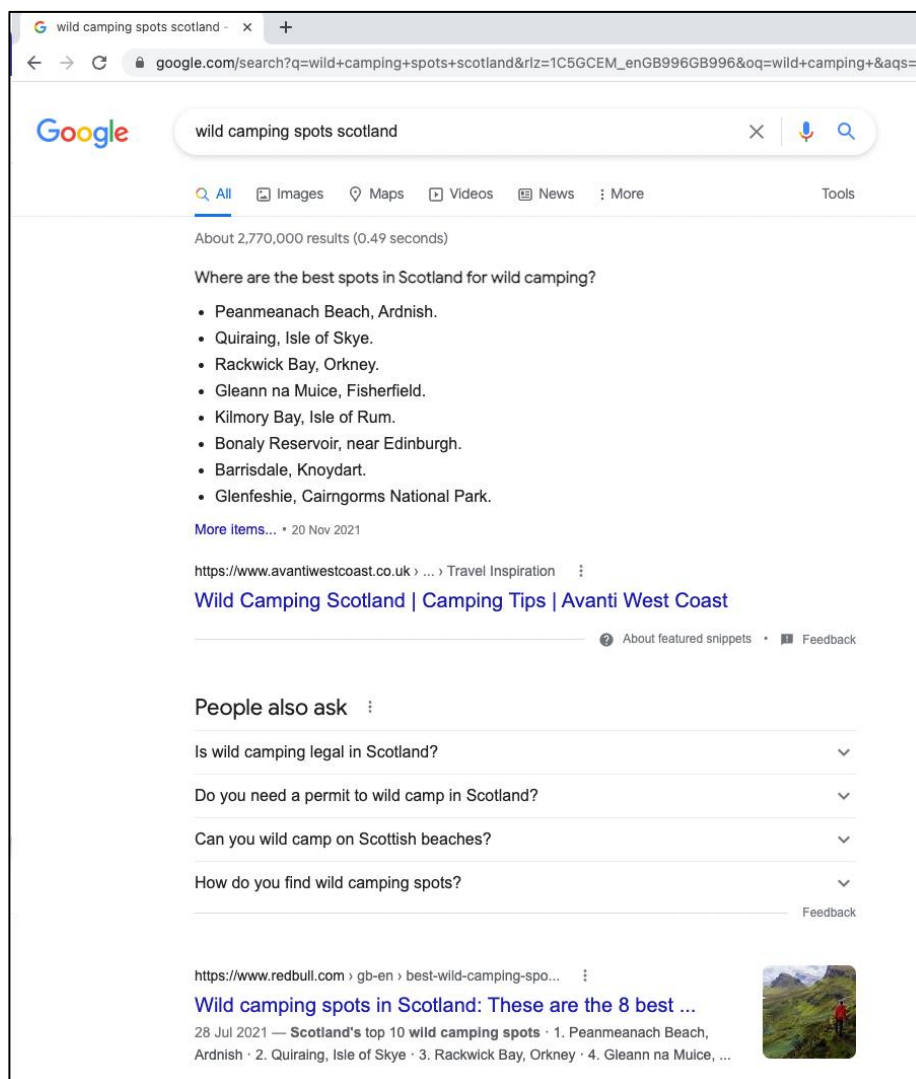
- This finding suggests there could be value in investing in SEO to ensure that user friendly guidance and tips appear at the top of a wide range of searches relating to the outdoors and camping in Scotland, rather than relying on campers seeking out guidance specifically.

> *"Maybe if [a webpage with the SOAC] was better publicised or if you could make it common knowledge through an ad campaign. We didn't even know to look for this particular code. Beyond that, if they wanted to guide where people went, websites with recommendations of where they have good facilities for wild camping."*

(Male participant, 23)

4.3.5 Other communications opportunities

NatureScot has recently collaborated with Young Scot to develop videos for young people and is developing updated SOAC educational resources for schools. These activities underline the continuing importance of this type of engagement.

In schools and youth groups:

- Aligning with stakeholders' suggestions, several participants suggested that there would be value in engaging with young people at school and college, both to encourage young wild campers and to share tips for camping responsibly before their first experience of wild camping.

- Older students may be planning social camping trips as they leave school or college, and younger students may take home messages to their families about the guidance.

> *"A talk in school, saying here are some nice spots, and here are some rules. When you're younger you might be more likely to camp irresponsibly, and tips are needed."*

(Male participant, 22)

5 Conclusions

5.1 Behaviour change strategy

This research has focused primarily on how communications can be designed to encourage responsible behaviour. Communications, however, are just one of many tools available to encourage behaviour change. It was clear from the literature review and speaking to stakeholders that other interventions also have an important impact on behaviour, pointing to a multi-pronged behaviour change strategy.

Figure 6. Diagram showing a multi-pronged behaviour change strategy

- **Infrastructure**: Additional infrastructure, particularly toilets and bins, will make it easier for campers to do the right thing. Additional infrastructure will also lessen the amount of effort needed to educate campers about responsible and correct rubbish disposal and toileting practices; such practices require preparation, knowledge and effort. Additional infrastructure will lessen the environmental impact of inappropriate toileting and littering.

- **Outreach in schools:** It is easier to prevent irresponsible behaviours than change them once established. If ways can be found to incorporate the pro-environmental rationale for responsible wild camping behaviour into lessons and activities among schools and youth groups, there is a better chance of a behavioural shift, similar to the decline in adolescent smoking, among future cohorts of campers. This approach could be taken forward through NatureScot's current engagement with schools to

promote the SOAC and aligned with the outreach work that some other stakeholders are already carrying out.

- **Visible staff presence:** At present, perceived impunity is an enabler of consciously irresponsible behaviours, such as littering. Messages based on legal penalties are unlikely to be effective unless there is a perceived risk of being caught, which emphasises that communications campaigns need to be accompanied by a staff presence on the ground in areas where problems occur.

5.2 Recommendations for public facing communications

A recurrent theme in this research was the lack of knowledge and awareness of the SOAC and other guidelines. Carefully developed communications will be an important tool for filling this knowledge gap, whilst also changing the social context by making it socially unacceptable to engage in irresponsible camping behaviours.

5.2.1 Be precise about what action you want campers to take

Whilst the range and nuance of camping behaviours make it difficult to develop simple messages, as far as possible guidance should be unambiguous and give campers precise instructions for what they should or should not be doing, without assuming any prioir knowledge. There could be value in consolidating existing guidance to provide this in full in a single, well-signposted place, for stakeholders to use as a reference tool. This would help keep communications consistent and credible whilst still giving stakeholders the flexibility of tailoring their messages to the local context.

Working with NatureScot, the National Access Forum is planning to review national messaging about the cumulative impacts of camping. The review provides an opportunity to develop suitable guidance that supports clear and consistent messaging across Scotland.

Behavioural messages should be tested with members of the general public to check that terminology is easily understood and interpreted correctly, including those without any outdoor experience or prior knowledge of the SOAC.

5.2.2 Provide the rationale behind these actions

Even when shown guidance on how to behave, participants were not necessarily convinced of the rationale as to why certain behaviours could be considered irresponsible (for example toileting away from water sources). Messaging should therefore convey why a particular action should be followed (or avoided) in a compelling and credible way. This approach could involve identifying a victim that is on the receiving end of an irresponsible behaviour, such as fellow outdoor visitors getting sick from drinking polluted stream water, or the importance of deadwood as a habitat for insects.

5.2.3 Emphasise the cumulative impact of irresponsible behaviour

Messaging should show the cumulative effect of otherwise minor irresponsible behaviours, such as camping for too many nights in one place or in crowded locations, that convince campers of the need for everyone to take individual responsibility. The aim is to make all

irresponsible behaviours as unacceptable as littering; communicating that the impact of the sum of everyone's actions, together, *do* leave a trace.

5.2.4 Keep messages positive, rather than admonitory

People are keen to know what is the right thing to do and not be classed in any way as 'irresponsible wild campers', so advice should be framed in positive terms. Even those who had engaged in the most extreme irresponsible behaviours (such as abandoning tents) still expressed appreciation for the natural environment and should be encouraged to play their part to look after it.

It is possible to communicate what campers should not be doing whilst keeping the tone positive, by showing practical ways to do the right thing which enhance users' experience and do not involve too much effort.

5.2.5 Be strategic about which behaviours to target with communications

Although 'party campers' may have caused some of the most notorious damage in recent years, they do not represent all those behaving irresponsibly. Moreover, guidance around littering has higher awareness and higher acceptance, making it a more difficult behaviour to change (as those who are engaging in this type of irresponsible behaviour are doing so consciously). It will likely be easier to educate campers about low awareness and low acceptance behaviours, such as inappropriate campfires and collecting deadwood. Greater gain could also arise from this approach given that these irresponsible behaviours were more common in our sample, exhibited by several different types of camper.

5.2.6 Take a cascading approach to changing behaviour

The literature review highlighted that behaviour change interventions should target the 'low hanging fruit'. Those behaviours more receptive to change can lead to what Kolodko and Read see as "a tipping point..., at which a social change spreads on its own".[47]

Inexperienced campers in our sample tend to turn to more experienced friends and family for tips about where to go camping and how to behave while there. Targeting more experienced and keen campers who are receptive to behavioural messages will help to strengthen positive social norms so that good practice spreads by a ripple effect. It will be important for interventions aimed at more experienced campers to combat any curse of knowledge bias and emphasise that these are learned behaviours that need to be spelled out and taught, rather than worked out through common sense.

5.2.7 Use multiple sources, channels and messages

No single campaign will reach the disparate audiences of campers who do not have a collective identity and do not conduct a significant amount of research before their trip.

The greatest impact will therefore be achieved through traditional offline media in areas that are popular wild camping destinations, such as flyers at local retailers and service stations, or noticeboards in car parks or laybys. Given the lack of detailed pre-departure

---

[47] Kolodko & Read (2018)

research, search engine optimisation should be used to direct people towards guidance when they conduct broader online searches, such as about where to camp or how to get there. Traditional social media campaigns may prove less fruitful at reaching this audience.

Nevertheless, social media and partnerships with influencers could play a role in trying to change the broader context that promotes a survivalist image of wild camping. This could, in turn, help to tackle common misconceptions, for example around campfires and collecting live or dead wood.

6 Appendices

6.1 Methodology

6.1.1 Phase 1

We conducted the literature review using the following criteria:

Objectives	Gathering learnings from behaviour change interventions, that have worked in similar settings, to promote responsible behaviour.	Helping inform the sampling and recruitment approach for primary research with the target audience.
Essential search terms	• "behaviour change"	• "outdoors" • "camping" • "behaviour"
Additional search terms	• "outdoors" • "camping" • "wild camping" • "dog walking" • "littering" • "vandalism" • "antisocial" • "trespassing" • "intervention" • "communications" • "Individual, social, material" (ISM) • "Loch Lomond and the Trossachs National Park byelaws" • "hard to reach"	• "wild camping" • "outside camping facilities" • "irresponsible" / "poor" / "bad" • "Loch Lomond and the Trossachs National Park byelaws" • "litter" • "human waste" • "abandon camping equipment" • "lighting fires" • "chopping down trees" / "damaging trees" • "obstructive parking" • "antisocial" • "noise" • "party" • "alcohol" • "demographics" • "location" • "communication channel" • "social media" • "hard to reach"

Inclusion criteria:

- Studies or reports published since 2000;

- Any relevant literature that was published earlier, to be considered on an individual basis;

- Studies or reports published in Scotland, the UK or comparable countries (such as Norway, Sweden);
- Available on sites including the following, and in the public domain (i.e. not behind a paywall);
- Google Scholar;
- Government White Papers;
- Universities in England (online publications);
- Major primary research agencies;
- Sector organisations;
- National Portfolio Organisations;
- Think Tanks;
- Studies signposted through: Directory of Open Access Journals, Open Access Button, Unpaywall;
- Formal, robust research (i.e. subject to a clear research process based on scientific principles containing primary data gathered using sound methodologies or robust analyses of secondary data);
- Soft evidence (i.e. primary commentary, anecdotal evidence or interview data).
- Reports identified by NatureScot:
  - People & dogs in the outdoors.
  - Rapid evidence review of littering behaviour and anti-litter policies.

Exclusion criteria:

- Studies or reports published before 2000;
- Studies or reports not published in English language;
- Whilst not to be excluded if learnings could apply to the objectives, the project. as a whole is not focused on:
  - Camping in managed facilities;
  - Camping in vehicles;
  - Camping covered by Loch Lomond and the Trossachs National Park byelaws;
  - Visitor parking more widely (where it is not in association with wild camping);
  - Associated recreational activities (e.g. angling).

We would also like to thank the following organisations for taking part in the research and agreeing to be identified:

- Police Scotland;
- Highland Council;
- East Lothian Council;

- Loch Lomond & the Trossachs NPA;

- Cairngorms NPA;

- Ramblers Scotland;

- Forestry & Land Scotland;

- Zero Waste Scotland;

- Scottish Land & Estates;

- Mountaineering Scotland;

- Perth & Kinross Council;

- City of Edinburgh Council;

- Historic Environment Scotland.

We used the following questions to guide discussions with stakeholders:

Section	Key discussion points and probes	Time
Section 1: Introduction	*Interviewer to introduce themselves, BritainThinks and the research.* Thank you very much for taking the time to take part in this research. My name is [XXX] and I'm a researcher from BritainThinks, an independent research agency. The Scottish Government and NatureScot have commissioned BritainThinks to conduct research to understand the behaviours and motivations of the minority of people who behave irresponsibly when camping in tents outside of managed facilities in Scotland. The aim of the research is to promote more responsible behaviour. • We'll be talking for 45 minutes today. • At the end of the interview, I will ask whether you are happy to have your comments attributed to you personally. There is no obligation to consent to this and we're very happy to treat the interview as confidential, ensuring that anything you say is reported back to our clients anonymously. • Collect consent to record the conversation for note-taking purposes and answer any questions about the research To begin with, please could you tell me a bit about your role and/or organisation, and what your day-to-day work involves? • [If appropriate] What geographic area does your role cover? *Interviewer to tailor questions to individual stakeholder – focusing on the most relevant sections.*	5 (5)

Section 2: General experiences with wild camping	It would be helpful to understand your professional experiences with people camping in tents outside of managed facilities. *From here onward, moderator to reflect the term(s) used by the interviewee to describe people camping in tents outside of managed facilities (e.g. 'wild camping', 'dirty camping' (where appropriate).* • What experience, if any, have you had with people camping in tents outside of managed facilities in Scotland? • Do you encounter them directly or indirectly? How often? • How, if at all, have your experiences of wild campers changed over time? • What kinds of people camping in tents outside of managed facilities do you typically encounter? • Probe on demographics, typical behaviour, popular locations • Are there any other groups of people you often see camping in tents outside of managed facilities? • What, if anything, do you think appeals to them about camping in tents outside of managed facilities? Why?	5 (10)
Section 3: Irresponsible behaviour	For this research, we're keen to understand people who behave <u>irresponsibly</u> when camping in tents outside of managed facilities. • To what extent do you feel that irresponsible behaviour amongst people camping in tents outside of managed facilities is a problem? Why? *Interviewer to read out:* Irresponsible behaviour can include leaving litter, human waste and camping equipment behind, lighting fires, chopping down / damaging trees, as well as antisocial gatherings and noise. • **What experience have you had with people camping in tents outside of managed facilities in Scotland who have behaved irresponsibly or illegally? Can you describe this in detail?** o Who was involved? What happened? What was the result/response? • **What types of people behave irresponsibly or illegally when camping in tents outside of managed facilities?** o What are the similarities or differences among these people? o Is it just one type of person or are there different groups?	10 (20)

	- How does this compare to the type of person that behaves responsibly? *Probe on: age, gender, where they come from, SEG* **Why do you think these people behave irresponsibly or illegally when camping in tents outside of managed facilities?** - Why do you think they go camping in the first place? - What do you think causes them to break the rules? - How, if at all, has this changed over time? Why?	
Section 4: Promoting responsible behaviour	**What barriers, if any, prevent these people from camping in tents outside of managed facilities responsibly?** *Probe on:* - Awareness of their own behaviour - Knowledge of the rules - Peer influence - Infrastructure, e.g. lack of facilities **How do you think these people can be encouraged to behave more responsibly when camping in tents outside of managed facilities in Scotland? Why?** - What motivates other people camping in tents outside of managed facilities to behave responsibly? - What, if anything, have you done, or seen others do, to encourage responsible behaviour amongst people camping in tents outside of managed facilities? - To what extent did this help? - How would this work in practice? - Are there any wider implications or unintended consequences that this could have? How do you think people camping responsibly would react? **What, if anything, have you done, or seen others do, to encourage responsible camping behaviour among these visitors?** - To what extent did this help? *If no examples:* What, if anything, have you done, or seen others do, to encourage responsible behaviour more generally (amongst outdoors visitors)?	10 (30)
Section 5: Reaching and communicating with target audience	A key aim of the research is to understand how to better communicate with those who behave irresponsibly when camping in tents outside of managed facilities. **What channels or spokespeople do you think would best reach this audience?** To what extent do you think that these kinds of campers are 'hard to reach'? *Interviewer to refer back to previous answers about what kind of campers they think behave irresponsibly*	10 (40)

	o Why? How can that be overcome? • **What kind of communication or messages do you think would resonate best with this audience?** o E.g. should it be educational, motivational, admonitory? o How might this vary for different groups of people? • Do you have any examples of campaigns or communications that have worked well for: o Reaching this audience? o Changing behaviour?	
Section 6: Wrap up	Thank you so much for your time today, it's been very helpful speaking to you. Before we end the interview today, I wanted to run a couple of things past you: • This interview is part of a broader research project. Do you have any recommendations for: o Other people working in this area or with direct experience of irresponsible camping behaviour that we should speak to? o Written reports or literature on similar topics, such as wild or 'dirty' camping, responsible behaviour in the countryside, or behaviour change in outdoor settings that we should consult? • Reflecting on our discussion, would you be happy to have your comments attributed to you personally or would you prefer for them to be reported back anonymously? • Would you be happy to be re-contacted to take part in further phases of this research and to share with you a summary of the research findings? • *[Collect details for charitable donation ONLY if applicable]* • *Thank and close*	5 (45)

6.1.2 Phase 2

The sample for the Phase 2 interviews sought to include a spread of demographics, though we also partly let these fall out naturally because the priority was to recruit wild campers who had behaved irresponsibly.

Demographic spread of sample:

Demographic	Number of participants
Aged 18-24	11
Aged 25-40	7
Aged 41+	2
Male	13
Female	7
Scotland	12
England	6
Wales	2

We used the following questions to guide discussions with campers:

Section	Key discussion points and probes	Time
Section 1: Introduction	Interviewer to introduce themselves, BritainThinks and the research. Thank you very much for taking the time to take part in this research. My name is [XXX] and I'm a researcher from BritainThinks, an independent research agency. We conduct research on a range of topics, from understanding people's experiences of different products or services, how they feel about certain companies or organisations, or what they think about specific issues. This involves speaking to lots of different groups of people all round the UK and listening to what they have to say. The purpose of the interview today is to understand people's experiences of camping in Scotland outside of managed facilities like campsites. *For the rest of the interview, moderator to reflect back language used by participants, e.g. 'wild camping'.* **Explain the terms of the session:**	5 (5)

	• We're an independent research agency so I'm here to listen to your honest views and opinions; there are no right or wrong answers. • We abide by the Market Research Society Code of Conduct. This means that everything you say today will be completely confidential and the research findings will be anonymised: you won't be personally identifiable in our report. • BritainThinks will hold your contact information for up to 12 months for quality monitoring purposes only and will not pass on any personal data to any third party. • The only exception to this is if you say something that gives me reason to think that you or someone else is at risk of harm. In the unlikely event that this happens, we may be legally obliged to pass this information on to the relevant authority. • You can opt out of the research at any time, although you may forfeit your right to any incentive. • We'll be talking for 60 minutes today, finishing up at [XXX]. I have a lot of questions to get through, so in order to finish on time, I may need to interrupt you or move the conversation on. *Collect consent to record the conversation for note-taking purposes and answer any questions about the research* **To begin with, please could you introduce yourself:** • Your first name(s) • Where you live, and who you live with • Something you like to do in your spare time	
Section 2: Your feelings about the outdoors	When you talked about what you do in your spare time, you [DID/DIDN'T] mention spending time in the outdoors. • **How, if at all, does visiting the outdoors feature in your life?** o How often do you visit the outdoors? o Where do you go when you visit the outdoors? o What do you like to do when you go to the outdoors? • **How, if at all, has this changed since the start of the Covid-19 pandemic?** • **What benefits, if any, does spending time outdoors bring?** • **What, if anything, do you dislike about spending time outdoors?** You [HAVE/HAVEN'T] mentioned camping. **Can you tell me about your experiences of camping?** • **How often have you been?** • **Where did you go?** • **Why did you go?**	5 (10)

	• **How has this changed since Covid-19?**	
Section 3: Perspectives on camping in tents outside of managed facilities	We understand that you've been camping in Scotland in the last two years. We're really interested in hearing about your experience camping in a tent outside of a managed facility such as a campsite. • **Can you tell me a bit about what your experience of camping outside of a managed facility was like?** o If participant says they have been camping for a while/a long time: When did you first start going camping outside of a managed facility? • **What did you do?** • **Where did you go?** • **Who did you go with?** • **What was good about your experience?** • **What was bad about your experience? Did anything surprise you about your experience?** *Listen out for and probe on any learnings, e.g. from interactions with rangers or other campers* • What inspired you to go camping outside of a managed facility? Probe on any specific influencers/creators, channels or TV programmes. • **Can you talk me through how and when you planned your trip?** *Encourage regular campers to focus on trips in the last 2 years.* o **How did you decide where to go?** *Interviewer to listen out for mentions of camping equipment and associated costs* o **How did you decide what to bring?** o **Did you do any research beforehand?** o **What information sources did you use?** o **Is there any information you would have liked to know but were not able to find?**	15 (25)
Section 5: Understanding of responsible vs. irresponsible behaviour	• Some people talk about responsible and irresponsible camping. **Have you heard of this term before?** o **What do you think it means to camp "responsibly"?** o What behaviour do you think makes someone a "responsible" camper? o **What do you think it means to camp "irresponsibly"?**	15 (40)

	o What behaviour do you think makes someone an "irresponsible" camper? • **Did you see anyone camping irresponsibly when you went camping?** • **What did you see? What were the signs that they were camping irresponsibly?** • **Why do you think people camp irresponsibly?** • **What rules, if any, are you aware of when it comes to camping outside managed facilities in Scotland?** *Moderator to probe on understanding of any rules described.* I'm now going to read out part of the Scottish Outdoor Access Code, which provides guidelines on how to act responsibly when camping outside managed facilities. *Moderator to show on screen if interview is being conducted online.* There is a general right of access to all land and inland water in Scotland (with a few exceptions). Where access is allowed, people must behave in a responsible manner. The three key principles of the Scottish Outdoor Access Code are: • Respect the interests of other people • Care for the environment • Take responsibility for your own actions Access rights extend to wild camping. This type of camping is lightweight, done in small numbers and only for two or three nights in any one place. Guidance includes: • Be considerate o Keep groups small, quiet and well away from buildings and roads. o If it's busy, go elsewhere. o Do not camp in enclosed fields of crops or farm animals. • Leave no trace o Take away all your belongings and litter. o Vegetation is damaged by repeated camping on the same spot over a number of nights or by different campers over time; aim to move frequently and seek out your own remote spots. o Use a camping stove where possible o Never light open fires, BBQs or fire bowls during dry periods, or near forests, farmland, buildings or historic sites at any time. o Never cut down or damage trees	

	- Even dead wood is an important habitat, so it is best to avoid fires completely. - Use public toilets where available - If not, go at least 30 metres from open water – carry a trowel and bury your poo. • Parking - If public or private landowners restrict or regulate parking on their land, you must comply with this. - Don't cause any damage or create an obstruction, for example by blocking entrances or making it difficult for other people to use a road or track. - Have regard for the safety of others. - Try not to damage the verge. - Use a car park if one is nearby. • **How do you feel about this guidance?** • **Were you aware of it before today?** • **What impact, if any, do these rules have on the way you go camping?** • **Why do you think some people do not comply with this guidance?** **To what extent do you think these reasons differ according to the type of action?** *Probe on:* • Camping in appropriate locations • Damage from campfires • Pollution through toileting • Leaving behind equipment, litter and waste	
Section 6: Barriers and opportunities	This research has been commissioned by NatureScot and the Scottish Government. NatureScot and the Scottish Government want everyone to enjoy the Scottish outdoors and make the most of their access rights, but they also want people to act responsibly following the Scottish Outdoor Access Code. We're really interested in your views as campers on how they can best do this. • **What, if anything, could encourage people to camp responsibly?** *Add if necessary: By responsible we mean abiding by the guidance in the Scottish outdoor access code (show on screen again if helpful)* • What, if anything could encourage people to…? If appropriate, interviewer to tailor questions to the irresponsible behaviours that participants exhibited o **Camp in appropriate / considerate locations** o **Avoid damage from campfires** o **Limit pollution through toileting**	15 (55)

	o **Leave no trace by taking away all equipment, litter and waste**
	• **What impact, if any, do you think that each of the following would have on encouraging people to camp responsibly?**
	o Raising awareness of the Scottish Outdoor Access Code and how to camp responsibly
	o Raising awareness of the negative impact that irresponsible behaviour can have
	o Criticism from fellow campers or peers when people behave irresponsibly
	o More infrastructure, such as bins or toilets, for campers to use
	o Rules or restrictions on when and where you can camp
	o Higher costs for camping equipment
	• **How can NatureScot and the Scottish Government best communicate with someone like you about camping responsibly?**
	o What advice or information, if any, would you like to hear from them?
	• **When do you think would be useful to have this information?** Probe on:
	o When planning the trip (e.g. buying equipment)
	o Travelling to or in the vicinity of the destination (e.g. petrol stations, cafes, pubs)
	o On arrival (e.g. signs on roadside, car parks)
	• **How should this information be communicated?**
	o *Online – social media? Websites? (Probes on specific sites / groups)*
	o *In person, e.g. via rangers, in school/college/universities*
	o *Signage / posters*
	• **Who would you trust to tell you information about responsible camping?**
	o *Peers (friends, family, social media contacts)*
	o *Professionals, e.g. rangers*
	o *Celebrities / social media influencers (Probe on specific individuals)*
Section 7: Wrap up	Thank you so much for your time today, it's been very helpful speaking to you. Before we end the interview today. **What one piece of advice would you give to NatureScot and the Scottish Government for promoting responsible camping in Scotland?**	5 (60)

61

6.2 Bibliography

The following sources were consulted as part of the literature review and fed into the final report, although not all have been cited:

- Auckland Council (2017) Managing freedom camping in Auckland.

- Barr, S. et al (2011) Sustainable lifestyles: Sites, Practices, and Policy, Environment and Planning A, 43, 3011-329.

- Bator, R. J., Bryan, A. D. and Schultz, P. W. (2011) Who gives a hoot? Intercept surveys of litterers and disposers. Environment and Behaviour, 43:3, 295-315.

- Cairngorms National Park Authority (2021) Managing for visitors in 2021.

- Collins, D., Kearns, R., Bates, L. and Serjeant, E. (2018) Police power and fettered freedom: regulating coastal freedom camping in New Zealand. Social & Cultural Geography, 19:7, 894-913.

- Geller, E. S. (2002) The Challenge of Increasing Proenvironmental Behavior, in Betchel, R.B., Churchman, A. (eds.) Handbook of Environmental Psychology, New York, 525–540.

- Jenkinson, S. (2011) People & dogs in the outdoors. Cairngorms National Park Authority.

- Keep Britain Tidy (2011) The effectiveness of enforcement on behaviour change: Fixed penalty notices from both sides of the line.

- Kim, A. K. (2012) Determinants of tourist behaviour in coastal protection. Tourism Geographies, 14:1, 26-49.

- Kolodko, J. and Read, D. (2018) Using behavioural science to reduce littering: understanding, addressing and solving the problem of litter. Journal of Litter and Environmental Quality, 2:1, 20-35.

- Land Reform Review Group (2014) The land of Scotland and the common good: report.

- [Loch Lomond & the Trossachs National Park] (2020) Loch Lomond & the Trossachs National Park camping management byelaws 2017 three year report to ministers.

- Natural England (2022) Applying behavioural insights to improve the messaging around the new Countryside Code.

- Progressive (2019) Evaluation of visitor experiences of camping in the [Loch Lomond & the Trossachs] national park.

- Marion, J. L. and Reid S. E. (2009) Minimising visitor impacts to protected areas: The efficacy of low impact education programmes. Journal of Sustainable Tourism 15:1, 5-27.

- Marion, J., Wimpey, J., Arrendondo, J. and Meaddema, F. (2020) Sustainable Camping "best management practices". US Geological Survey, Virginia Tech Field Unit.

- Marzano, M. and Dandy, N. (2012) Recreationist behaviour in forests and the disturbance of wildlife. Biodiversity and Conservation 21, 2967-2986.

- Moghimehfar, F. (2016) Predicting pro-environmental behavioural intentions of front-country campers. PhD. University of Alberta.

- New South Wales Government (2005) Human waste management strategy: Main range management unit – Kosciuszko National Park. Department of Environment and Conservation, Sydney (New South Wales, Australia).

- Scottish Government (2013) Influencing behaviours - moving beyond the individual: ISM user guide.

- Scottish Government (Accessed April 2022) Visits to the Outdoors.

- Scottish Natural Heritage (2004) Towards responsible use: influencing recreational behaviour in the countryside.

- Scottish Natural Heritage, Sport Scotland (2004) Communication not conflict: using communication to encourage considerate shared recreational use of the outdoors.

- Scottish Natural Heritage (2015) Taking the lead: Managing access with dogs to reduce impacts on land management.

- Scottish Natural Heritage (2006) Signs guidance for farmers and other land managers: Using advisory signs to inform the public about your day-to-day land management operations.

- Scottish Outdoor Access Code (2005) Public access to Scotland's outdoors: Your rights and responsibilities.

- Scottish Outdoor Access Code (2021) Guidance – Managing camping with tents in Scotland.

- Scottish Outdoor Access Code (2022) Camping.

- Settina, N., Marion, J. L. and Schwartz, F. (2020) Leave No Trace Communication: Effectiveness based on assessments of resource conditions. Journal of Interpretation Research, 25:1, 5-25.

- Sibley, C. G. and Liu, J. H. (2003) Differentiating active and passive littering: a two-stage process model of littering behaviour in public spaces. Environment and Behaviour 35:3, 415-433.

- Southerton, D., McMeekin, A. and Evans, D. (2011) International review of behaviour change initiatives: Climate change behaviours research programme. The Scottish Government.

- Visit Scotland (2019) Insight Department: Unique Scotland: Promoting the benefits of a holiday in Scotland.

- Visit Scotland (2021) A visitor management strategy for Scotland.

- Visit Scotland (Accessed April 2022) Wild Camping in Scotland.

- Zero Waste Scotland (2013) Rapid evidence review of littering behaviour and anti-litter policies.