



# How does previous experience affect preference in an environment for outdoor recreation?

– Using the PSD model to identify environments for different needs in outdoor recreation

---

*Hur påverkar tidigare erfarenhet val av miljöer för friluftsliv? Identifiera friluftsmiljöer för olika behov med hjälp av PSD modellen*

Sanna Almqvist

Independent project • 30 hp  
Swedish University of Agricultural Sciences, SLU  
Department of People and Society  
Outdoor Environments for Health and Wellbeing  
Alnarp 2022





## How does previous experience affect preference in an environment for outdoor recreation?

–Using the PSD model to identify environments for different outdoor recreation needs

*Hur påverkar tidigare erfarenhet val av miljöer för friluftsliv? Identifiera friluftsmiljöer för olika behov med hjälp av PSD modellen*

**Supervisor:** Jonathan Stoltz, Swedish University of Agricultural Science, Department of People and Society  
**Assistant supervisor:** Mats Gyllin, Swedish University of Agricultural Science, Department of People and Society  
**Examiner:** Caroline Hägerhäll, Swedish University of Agricultural Science, Department of People and Society  
**Co-examiner:** Mark Wales, Swedish University of Agricultural Science, Department of People and Society

**Credits:** 30 hp  
**Level:** A2E  
**Course title:** Independent project in Environmental psychology  
**Course code:** EX1000  
**Programme/education:** Outdoor Environments for health and Wellbeing  
**Course coordinating dept:** Department of People and Society

**Place of publication:** Alnarp  
**Year of publication:** 2022

**Keywords:** outdoor recreation, experience, preference, perceived sensory dimensions, affordances, restoration

**Swedish University of Agricultural Sciences**  
Department of People and Society

## Publishing and archiving

Approved students' theses at SLU are published electronically. As a student, you have the copyright to your own work and need to approve the electronic publishing. If you check the box for **YES**, the full text (pdf file) and metadata will be visible and searchable online. If you check the box for **NO**, only the metadata and the abstract will be visible and searchable online. Nevertheless, when the document is uploaded it will still be archived as a digital file.

If you are more than one author you all need to agree on a decision. You can find more information about publishing and archiving here: <https://www.slu.se/en/subweb/library/publish-and-analyse/register-and-publish/agreement-for-publishing/>

YES, I/we hereby give permission to publish the present thesis in accordance with the SLU agreement regarding the transfer of the right to publish a work.

NO, I/we do not give permission to publish the present work. The work will still be archived and its metadata and abstract will be visible and searchable.

## Abstract

This study investigates how previous experience affect preference of environments for outdoor recreation. The *Perceived Sensory Dimensions* model was used to categorise perceived qualities at preferred places. A survey with 10 questions was sent out in social media and in a newsletter to all members of the *Swedish Outdoor Association*. A total of 716 responses were analysed by mixing methods, combining quantitative with qualitative analyses. Statistics were analysed with descriptive tools, and descriptions of nature were analysed with a thematic method, then integrated interpretations were made. The respondents were divided in three groups depending on previous experience. The result showed support for the importance of nature areas near dwellings (within 5-10 minutes) regardless of previous experience. All practitioners in the study preferred serene nature areas with trees, water, views, and nature sounds. The group with least experience showed more interest in areas with social support, and they were in general younger and less stressed than the more experienced. Practitioners with high experience preferred biodiverse nature without trails, away from other people and disturbance. The group with average experience suffered more frequent from stress than the other groups and might not seek restoration as often as they need. Overall, results suggest that the average and high experience groups might consist of individuals that are more sensitive in relation to environmental stimuli than novice practitioners and thus have a stronger need for outdoor recreation in serene natural settings. Most respondents seek solitude in such environments, and it is therefore vital to offer enough areas with those qualities to cover people's needs. Further studies could dig deeper in reasons for possible differences in sensitivity between experience groups, why novice nature visitors are younger, and how place attachment affect choices of environments for outdoor recreation.

*Keywords: outdoor recreation, experience, preference, perceived sensory dimensions, affordances, restoration*

## Preface

This summer, I was working at a popular nature reserve in Sweden. The number of visitors each day was high, about 2000 visiting cars each day during high season. I met people with different backgrounds, most from Sweden. All of them fascinated by the beautiful landscape in the Swedish archipelago, but with different interest of the reserve. Some asked questions about the typical landmarks while others asked for tenting sites, animals, or environmental issues. It got me thinking that they have different needs and maybe that is affected by their previous experience.

# Table of contents

<b>List of tables</b> .....	<b>9</b>
<b>List of figures</b> .....	<b>10</b>
<b>Abbreviations</b> .....	<b>11</b>
<b>1. Introduction</b> .....	<b>13</b>
1.1. Aim and limitations .....	13
1.2. Target group .....	14
<b>2. Theoretical background</b> .....	<b>15</b>
2.1. Environmental psychology.....	15
2.1.1. Preference .....	15
2.1.2. Restoration .....	17
2.1.3. Instorative possibilities .....	18
2.1.4. Sensitivity .....	18
2.1.5. Perceived sensory dimensions.....	18
2.2. Outdoor recreation in Sweden .....	21
<b>3. Method</b> .....	<b>23</b>
3.1. Philosophical foundation and research traditions .....	23
3.2. Mixed method .....	23
3.3. Non-experimental design.....	24
3.4. Processing and analysis.....	24
3.4.1. Quantitative analysis.....	25
3.4.2. Qualitative analysis .....	25
3.5. Reliability and validity .....	25
3.6. Ethical considerations .....	26
3.7. The survey .....	26
3.7.1. Survey respondents.....	26
3.7.2. Survey questions .....	26
3.7.3. Survey distribution .....	28
<b>4. Result</b> .....	<b>29</b>
4.1. All respondents .....	29

4.1.1.	Background data.....	29
4.1.2.	Stress .....	30
4.1.3.	Distance to preferred nature area.....	30
4.1.4.	Type of area .....	31
4.1.5.	Previous experience .....	32
4.1.6.	Motives for spending time in nature.....	32
4.1.7.	Perceived sensory dimensions.....	32
4.2.	Comparisons between experience groups .....	33
4.2.1.	Experience and age .....	33
4.2.2.	Experience and gender .....	34
4.2.3.	Experience and education.....	34
4.2.4.	Experience and stress.....	35
4.2.5.	Experience and distance .....	35
4.2.6.	Experience and type of area .....	36
4.2.7.	Experience and PSD.....	36
4.3.	Description analysis .....	38
4.3.1.	Themes .....	38
4.3.2.	Concluding comments on description analysis .....	42
<b>5.</b>	<b>Discussion .....</b>	<b>43</b>
5.1.	Principle findings .....	43
5.2.	Result discussion .....	43
5.3.	Strength and weaknesses .....	46
5.4.	Results in relation to previous research .....	47
<b>6.</b>	<b>Conclusions and future implications.....</b>	<b>51</b>
	<b>References .....</b>	<b>52</b>
	<b>Acknowledgements .....</b>	<b>57</b>
	<b>Appendix 1 .....</b>	<b>58</b>
6.1.	Enkät om friluftsliv .....	58



## List of tables

Table 1. Respondent's age	29
Table 2. Respondent's gender	29
Table 3. Respondent's highest education level	29
Table 4. Gender in relation to experience (%)	34
Table 5. Education level in relation to experience (%)	34
Table 6. Stress in relation to experience (%)	35
Table 7. Relationship between PSD and Experience (%)	37
Table 8. Spearman Correlation Coefficient	38
Table 9. Theme from the three experience groups descriptions	39

## List of figures

Figure 1. The PSD model (Stoltz and Grahn, 2021a)	19
Fig Figure 2. Experienced stress frequency (1-5)	30
Figure 3. Distance to preferred nature area	31
Figure 4. Type of area	31
Figure 5. Experience of visiting nature (%)	32
Figure 6. Perceived qualities in preferred nature area (number of perceived)	33
Figure 7. Age in relation to experience (%)	34
Figure 8. Distance in relation to experience (%)	35
Figure 9. Type of area in relation to experience (%)	36
Figure 10. Relationship between experienced and perceived qualities (%)	37

## Abbreviations

ART	Attention Restoration Theory
IGT	Information Gathering Theory
PSD	Perceived sensory dimensions
SLU	Swedish University of Agricultural Sciences
SPSS	Software platform for statistical analysis
SRT	Stress Reduction Theory



# 1. Introduction

The covid-19 pandemic has changed the habits of outdoor recreation in Sweden according to research by *Mistra sports and outdoors* (Skriver Hansen et al. 2021). A lot of people have begun to use nature areas for recreation and some nature environments gets crowded. This makes the more experienced practitioners seek escape further out. Because of the value of outdoor recreation, it is vital to meet these changes and prohibit crowding and overuse of nature areas. To do so, we need to understand practitioners needs and match those with opportunities in specific nature areas. It seems like beginners have other preferences than experienced practitioners, and it is important to satisfy all groups. Further investigations on what the two groups prefer is needed, so that equal interventions can take place. Knowledge can be used in planning recreational areas and for communicating the possibility with each area and contribute to Swedish political goals for outdoor recreation (Skr 2012:1351).

The idea for this project is to investigate how a model for landscape analysis could be used when identifying locations for outdoor recreation suitable for different experienced people. That is influenced by the types described by Besson (2020) in *Aesthetics and Affordances in a Favourite Place: On the Interactional Use of Environments for Restoration*. She argues that people's preference differs. I believe that peoples individual needs and the activities that they want to engage in should be taken in consideration when analysing a landscape. This could be useful for planning recreational environments for different needs and for communicating possibilities with different locations. Focus will be on nature environments because of the requirement to spread the visitors on several areas. It would be appropriate to elaborate on an existing tool like the *Perceived sensory dimension* (PSD) model because there is a lot of research done on that model that investigates landscape qualities for recreation. This study will investigate if previous experience of outdoor recreation affect preference when it comes to environments for outdoor recreation.

## 1.1. Aim and limitations

The study aims at exploring needs and preference that people with different experiences have when seeking recreation in a natural environment. The study is

limited to the type of outdoor recreation activity that is being in nature or walking/hiking in it. This because outdoor recreation entails an endless number of activities with very specific demands linked to them. Furthermore, the study aims at investigating what aspects according to the PSD-model that contributes to preference.

The main issue that this study aims at investigating is:

*How does previous experience affect preference in an environment for outdoor recreation? – Using the PSD model to identify environments for different outdoor recreation needs*

The main research questions are:

- What needs do people with different previous experience of outdoor recreation have when seeking recreation in a natural environment?
- Is there a difference in perceived qualities in preferred nature area depending on previous experience?

## 1.2. Target group

The target group in this study is Swedish people that engage in outdoor recreation (*friluftsliv*) with different experience (*Low, Average* and *High*). It is important to identify their preference because part of the purpose is to spread them according with their diverse needs. It is limited to people that can read and answer a written survey. Therefore, young children are not included in this study.

In the study of changes due to the covid-19 pandemic, experience of outdoor recreation seems to be connected to age (Skriver Hansen et al, 2021). 41 years and older people are found to be more experienced. Younger people (16-25 years old) don't visit nature as much as older people. In that study, most respondents were experienced in outdoor recreation. It is therefore of interest to find respondents from the less experienced as well as experienced practitioners in this study.

## 2. Theoretical background

### 2.1. Environmental psychology

Environmental psychology is traditionally viewed as cognitive functions, but more and more research considers emotions and preference as part of the field (Bonaiuto et al. 2016). Perception consists of several modalities and environments is a space in which perception takes place. That is of interest in environmental psychology along with focus on included elements effect on how space is perceived. Perception is a combination of inbuilt reflexes and learnt behaviour and that affects how environmental psychology research is made. Bottom-up processes are built in strategies to make sense of what is experienced, while top-down processes make use of prior knowledge to understand the world (Mather 2011). Bonnes et al. (2016) describe environmental psychology as studies of the socio-physical environment and how it is affecting human actions and wellbeing. The processes that take place in the relationship between person and environment are in focus.

#### 2.1.1. Preference

Appleton (1975) argues that humans evaluate places they live in because it is an innate reflex that supports survival. That humans prefer places with a view and shelter which provides sights of danger or targets and shelter. Falk and Balling (2010) considers both innate and cultural influences as grounds for preference. They argue that commonly parks in western societies could explain preference of open areas and that it is likely that biologically constructed processes are socially altered. Hartig et al. (2011) claims that evolutionary research has not been reviewed enough since its entry. They stress the importance of developing new theories that considers a combination of innate, cultural, and individual aspects as influences of human-nature experiences. It is of interest that people exist in a cultural context and therefore carries embedded values which affects the environment and human genetics (Hartig et al. 2011).

Adevi and Grahn (2012) have found that people prefer landscapes that resembles places from the childhood but qualities that supposedly are innate are described as more important. They believe that part of human preference can be explained by evolutionary factors and are influenced by the context we live in. Place attachment is discussed by Giuliani (2016) as affect in relation to places and as something that is formed by experience in places we encounter during our lives. We tend to perceive an environment as pleasant or not, and that influences on how we perceive similar places in the future and our wellbeing. Adevi and Grahn (2012) consider place attachment as affected by our innate reflexes. Scannel and Gifford (2010) argue that place attachment is a combination of multiple processes that can be divided into: *affect, cognition* and *behaviour*. Therefore, one can assume that it has a great influence on preference and choice of environments. In later studies, the same authors found evidence of psychological benefits from place attachment, which they described in thirteen categories. *Relaxation, positive emotions, activity support, connection to nature* and *aesthetics* are some of them (Scannel & Gifford 2017).

*Affordances* is a discovered phenomenon that researchers like James J Gibson (1979) explained as what environments offer to animals and humans. He doesn't distinguish between natural and cultural environments, but he acknowledges that mankind has changed parts of the environment to better serve human needs. *Affordances* consists of things (surfaces, substances, special forms, or detached objects) that supports different activities (such as moving, shelter and nutrition among other things) and can therefore be understood as the relationship between environments and living creatures. Other animals and humans are also part of the environment and offer a mutual relationship (Gibson 1979). Orians (2008) also believe that humans prefer environments that serve them, and that evaluation is both genetically constructed and based on previous experiences. He further claims that biologically adaptation to changes don't follow the same pace as changes in the environment, and therefore are some of human's innate reflexes not accustomed yet. He discusses that human's preference for nature might be expired reflexes but can be useful to know about even if they aren't adapted for modern society. That is, nature can be used for human wellbeing (Orians 2008). That is the grounds for theories of *Biophilia*.

Besson (2020) argues that people have several favourite places and choose the one that is available and have the affordances needed for a particular activity. The choices are based on people's moods and their pursuit for a certain state of mind. The activities they engage in are often used as a transportation to the requested state. Besson discuss different types of experience profiles, depending on what they value in an environment. She explains the differences based on what the people want to do or feel. For some of them the most important thing is to be near the sky or feel



pure air, while other need the environment to be tidy and organized. She also found evidence that inner reflections are connected to tranquillity and aesthetic appeal, accordingly with Ulrichs (1986) theories about restoration (see below). Other people seek places that energize, are social or vitalising. She believes that people can have many different favourite places to choose from depending on their mood. In her research she found evidence that preference of a place is based on both aesthetic and the somatic experience where beauty and sensation are important factors.

### 2.1.2. Restoration

Nature is found to have restorative effects in different aspects. The physical restoration is something that Ulrich (1986) have found connected to aesthetics. He means that nature is more preferred than urban environments and that the visual encounters with nature have positive effects on people suffering from stress or anxiety. These findings that suggest physical benefits have been grounds for *Stress Reduction Theory* (SRT). Kaplan and Kaplan (1989) have explored the other side of restoration, namely the psychological benefits. They have studied nature's ability to restore human attention and found that landscapes can provide soft fascination, which is easy to focus attention on. Because of that it's not such an effort to focus and therefore the mind can rest and restore. According to them, it is also important that the environment is easy to understand and that it brings opportunity to being away from demands, offer some extent and that it is compatible with people's expectations. These findings that suggests psychological benefits have been grounds for *Attention Restoration Theory* (ART). Kaplan and Kaplan (1989) have also laid foundations for *Information Gathering Theory* (IGT) which is about environments ability to provide information and is based on factors like mystery, coherence, legibility, and complexity. Sonntag-Öström et al. (2014) have found support for both ART and SRT when studying restorative effects of visits to both urban and forest environments. They saw that visiting a forest had positive influences on psychological aspects like mood and attention, as well as physical aspects like heart rate and blood pressure. In a study on elderly (>62) in comparison with young adults and adolescents, they found that elderly viewed familiar environments more restorative and also that they preferred restorative environments. All groups rated natural environments as more restorative than built environments. Adolescence preferred build environment and the concept of restorativeness was not limited to nature (Berto 2007).

Korpela and Hartig (1996) argues that there is a connection between restoration and place attachment and that people's favourite places are used for emotional- and self-regulation. They found evidence that coherence and compatibility are important in

peoples favourite places. Being away and Fascination was also high in favourable places. Green places with water and scenic views were preferred. Their findings suggest that there is a correlation between previous experience, that leads to place attachment, and perceived restorativeness in a place.

### 2.1.3. Instorative possibilities

There is research on nature's instorative potential, that is the environments' ability to support growth, learn new capabilities and stimulate resilience (Hartig et al. 2011). This is something else than restore and heal an already stressed body and mind. Those studies focus on the positive effects of changed behaviours that occurs when encountering natural environments. They see challenges and possibilities for reflection in natural environments as an incubator for growth.

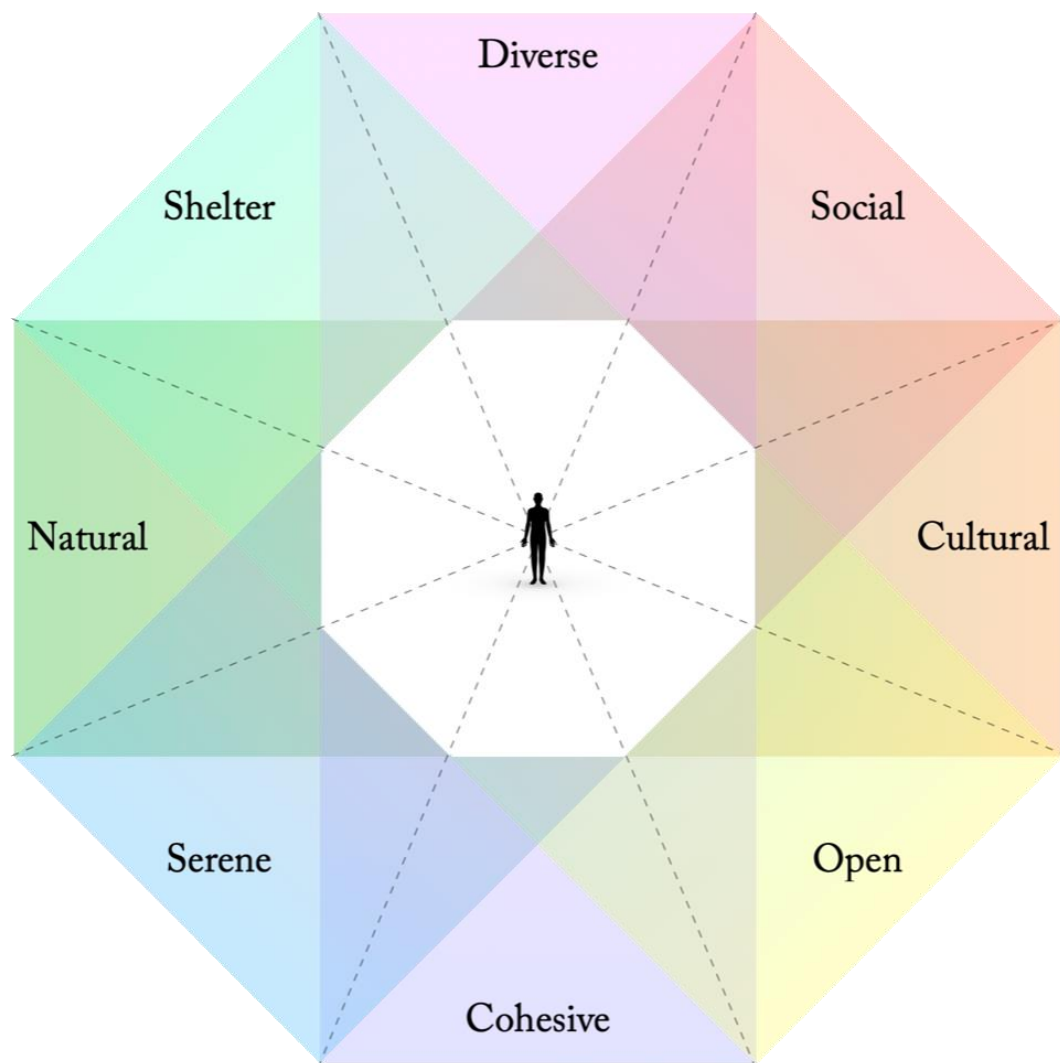
### 2.1.4. Sensitivity

Openness to experience is one personality trait that have been found connected to resilience to stress (Williams et al. 2009) and research shows that people with an openness trait perform adaptive cardiovascular responses to stressful experiences (O'Súilleabháin et al. 2018). Bangasser and Wiersielis (2018) argue that sex differences affect stress sensitivity and therefore makes women more likely to suffer from stress disorders. Other studies found that male mortality decreased with increasing green space, but equal associations wasn't found for women (Richardsson & Mitchell 2010).

### 2.1.5. Perceived sensory dimensions

Studies have found a link between the use of green spaces and health; distance is found to be an important factor. Grahn and Stigsdotter (2003) suggests that people need access to open green spaces near their dwellings to restore. How people perceive green environments can be related to certain dimensions identified by Grahn and Stigsdotter (2010). They identified eight perceived sensory dimensions (PSDs) as particularly important to people: *Serene, Space, Nature, Rich in species, Refuge, Culture, Prospect* and *Social*, arranged after general preference found in their study. Restorative environments were in their study (Grahn & Stigsdotter 2003) connected to qualities Refuge, Nature and Rich in species and low on Social qualities. The authors argues that these findings are important for planning recreational areas. De Jong et al. (2012) have found similar arguments when discovering relationships between perceived green qualities and neighbourhood satisfaction, physical activity, and general health. Recent studies on the perceived sensory dimensions have explored the relationship between them (Stoltz & Grahn

2021a). The result is a model with four axes with opposing qualities (see Fig. 1): 1. *Natural – Cultural*, 2. *Cohesive – Diverse*, 3. *Sheltered – Open*, 4. *Serene – Social* (notice that the terms has changed a little since 2010). It is suggested that neighbouring qualities in the model are more closely related and that an environment with the presence of two or more closely related qualities has a probable aesthetic appeal (Stoltz & Grahn 2021a). It is also argued that some qualities are preferred when restoring from higher levels of stress (sheltered, natural, serene and cohesive) while diverse, social, cultural and open environments usually are preferred only when stress levels are lower.



*Figure 1. The PSD model (Stoltz and Grahn, 2021a,b). Neighbouring qualities are more closely related*

Stoltz and Grahn (2021b) suggests that a combination of distance, size and perceived qualities matters regarding health promotion from green spaces. It should match the individual need of the visitor in question. They argue that if green areas

containing several of the eight dimensions in the PSD-model occur less than 300-meter distance to people's dwellings, it promotes health. If the distance is longer, the effects decrease. But when it comes to certain health problems the distance could be longer, it is connected to physical activity as health promotion and suitable areas are often further away from people's dwellings. Smaller green areas are often connected to social values while bigger areas are connected to natural qualities (Stoltz & Grahn 2021b). Here follows a short description of each PSD, following Stoltz and Grahn (2021a, b).

### **Natural**

Natural quality is experienced when the vegetation appears freely growing without human influence. It often occurs in bigger green areas that is spontaneously developed and expresses a sense of wilderness. Previous studies (Stoltz et al. 2016) have found that tall and old trees are enhancing the natural experience.

### **Cultural**

As opposing from natural, cultural is a cultivated place with strong presence of human impact. It shows signs of human beliefs and values which can be manifested through art, spiritual artefacts, signs of history or managed features.

### **Cohesive**

Is a place that fits together, that can be experienced as a whole. The structure is coherent, and it feels like a unified space. When entering a cohesive space, a feeling of entering another world can occur, it is of larger size and inspiring further exploration.

### **Diverse**

Contrary to coherent, diverse means varied. It stands for variations of species, structure, shapes and colours, complexity, smells, and textures. It is connected to biodiversity.

### **Sheltered**

An environment that provides a safe haven, that shelter, protect or hide people from danger or demands. It is an enclosed space that gives opportunity for refuge that supports the ability to see what is happening without being spotted. Vegetation act as a shelter in natural environments.

### **Open**

A place that is open, spacious with room for different activities. That is flat without physical objects and supports an overview of the surroundings. It gives the feeling of freedom and possibility to see far away.

**Serene**

A place that is quiet (that is the absence of noise) without the presence of other people can be perceived as serene. It is a calm, undisturbed and peaceful place that gives a sense of tranquillity. Sounds from nature support this feeling, but weed, litter and presence of other people doesn't. A serene environment gives opportunity to reflect inwards and can be experienced as secluded from society.

**Social**

Opposing serene is environments with social qualities. Presence of other people, social interactions and being surrounded by others describes a social place. It is often an urban environment that supports shared activities and is also found to be the least restorative dimension.

## 2.2. Outdoor recreation in Sweden

The Swedish government define outdoor recreation as spending time in the natural or cultural outdoor landscape for wellbeing and nature experiences without the need for competition (SFS 2010:2008). The aim with Swedish outdoor recreation politics is to support people's opportunities to spend time in nature. Provide nature for public access is part of the legislation to reach that. Outdoor recreation is also supposed to increase people's knowledge about nature and environment. Among the political goals for Swedish outdoor recreation is that nature should be accessible to all, that a sustainable use of nature should be planned with consideration to the needs of outdoor recreation (Skr 2012:1351).

Swedish people value outdoor recreation a great deal, they even plan their living and everyday life around it with the believe that it brings meaning and improve health (Fredman et al. 2019). Almost every person in Sweden engage to some extent in outdoor recreation, but half of them do not practice it during weekdays. Research shows that the biggest obstacles for outdoor recreation are lack of time, lacking someone to share the experience with, the family situation and lacking a suitable place. Equipment and information on opportunities are also cited as reasons for not exercising outdoor activities to the desired extent. Women are more out in nature than men, but families with children visit nature mostly on weekends or vacations (Fredman et al. 2019).

In a report from Mistra sports and outdoor (Skriver Hansen et al. 2021) they write about changes in outdoor recreation habits due to covid-19. They found that the more experienced practitioners mainly consist of people over 41 years. The study

found changed behaviours in all age-groups, all of them spend more time in nature than before. Even younger people aged 16-25 spend more time in nature than before, and that group has been especially hard to engage in outdoor recreation. The older (and possibly more experienced) practitioners, seem to explore new areas, while younger practitioners mainly use nature for socialising. Overall, nature is mainly used for recovery and as a haven free from worry where people can meet. Hiking is the activity that have increased the most after the pandemic. They found that areas near dwellings and nature reserves are popular. The changed behaviours have led to challenges like overuse and conflicts about nature's resources, but also benefits like improved public health and engagement in nature preservation and other environmental issues (Skriver Hansen et al. 2021).

## 3. Method

### 3.1. Philosophical foundation and research traditions

Knowledge can be based on the belief that human behaviour can be separated from the individual and that there is a single truth. This is referred to as monism. That type of research collects information through the senses and find what's reality by this empiricist approach. Monistic researchers perform experimental studies and primarily uses a deductive method, which assumes general principal to understand the specific. It entails deriving large amount of data into meaning (Depoy & Gitlin 2020).

Another perspective on human behaviour believe that it is complex and holistic and must be understood as a whole (Depoy & Gitlin 2020). That consider individuals background and context and research consider multiple realities, which is called pluralism. That is found on the belief that those who have the actual experience are the ones with most knowledge of it. Researchers perform naturalistic studies in this field and primarily use an inductive approach that begins with a specific case to generalize. It entails analytical approaches to understand different types of variables.

It is possible to combine the two philosophical foundations to gain the most suitable method and thereby seek knowledge of a phenomena. That is called *pragmatism*, it is simply to avoid choosing a perspective and thereby exclude possibilities (Depoy & Gitlin 2020). *Perspectivism* is another foundation that considers knowledge as complex but not as one truth. This study is based on the philosophy perspectivism and thereby that the world can be known from different viewpoints.

### 3.2. Mixed method

Mixed method aims at combining the advantages from *naturalistic traditions* and *experimental* research and thereby overcome the limitations of them. By combining the traditions, it is possible to begin the research based on previous theories and

then expand knowledge about it. It can also transcend the discrepancies in qualitative and quantitative data by combining them in one study. While the study considers different perspective on knowledge it brings a certain systematic and repetitive structure (Depoy & Gitlin 2020). The PSD model have been developed with mixed methods, by triangulating previous research to connect results and build new theory (Stoltz & Grahn 2021a). Because this study is based on theirs, a mixed method approach is chosen.

### 3.3. Non-experimental design

Nonexperimental design is used when the aim is to test a concept or understand relationship between variables without manipulation of subjects and conditions (Spector 1981). This study is cross-sectional designed which means that variables are collected at one point and makes it possible to see if variables correlate (variables being ‘previous experience’ correlating with other measured variables). Chosen tool for measurement is a *survey* because it makes it possible to collect a large amount of data from different subjects. The aim is to draw knowledge of the population’s thoughts regarding previous experience and outdoor recreation. A survey makes it possible to gather broad information quickly with minimal effort and to reveal expected and unexpected correlations between variables.

To reach external validity (that the result is applicable for the entire population) there must be a high response rate and that poses as a challenge when it comes to online surveys, which this study applies (Depoy & Gitlin 2020). Online surveys have the advantage that it is easy to spread to a big geographic area, but it is known for its inability to reach people without computers. In this context (i.e Swedish society) that is not such a big issue since almost every person have a smart phone that can be reached by an online survey. However, even if it’s possible to reach a lot of people, that doesn’t mean that everybody responds.

### 3.4. Processing and analysis

A *Concurrent Nested Strategy* (Terrell 2012) were used because two categories of questions are embedded in the survey (pre-defined and open). The different types of data (quantitative and qualitative) was first organized and analysed separately and then integrated during further interpretations. The strategy aimed to generate general understanding about the correlation between previous experience and preference.



### 3.4.1. Quantitative analysis

The statistical data is transported to Excel and organized according with the aim of the study. Background data are used to describe the respondents as a whole. The entire data set is presented in diagrams and tables and clear differences are highlighted in text. The correlation between variables is studied with tools like SPSS and descriptive tools in Excel (diagrams and tables). Significant correlations are tested in SPSS with *Spearman's Rank Order Correlation* which is a non-parametrical test used to find indications for correlations between two variables and show how strong the correlation is.

### 3.4.2. Qualitative analysis

Descriptions are analysed with thematic-analysis method, which is useful when organizing and describe qualitative data within psychology (Braun & Clarke 2006). It is not theoretically bounded as other analytic methods, but it needs to be clear what the theoretical background is (Braun & Clarke 2006). This is a study that approaches knowledge as depending on perspectives, and therefore uses thematic analysis to describe different perspectives on the same topic. The perspectives taken when analysing the qualitative data are the perspective from different experienced outdoor recreation practitioners. The descriptions are therefore divided according with the three experience groups (*Low, Average* and *High*). In each group, discovered patterns within the descriptions are identified as meaning units of importance, those are coded (highlighted in different colours) and interpreted to themes. A theme is what the researcher finds essential in the responses and what's useful when answering the research question (Braun & Clarke 2006). Within the themes, certain details are found and placed in subthemes. Writing the report have been made like an iterative process by going back and forth from details to whole. When writing the report, quotes are translated into English.

## 3.5. Reliability and validity

When doing research, the result is affected by the reliability of the measurement which means how consistent it is (Spector 1981) while validity concerns how appropriate the measures are. The survey have been tested and adapted to create minimal misunderstandings and lead to the knowledge that the study aims at collecting. Several channels for reaching respondents are chosen to get reliable data, and information about the study is attached in the survey.

## 3.6. Ethical considerations

The survey entailed information about the study, which helps the participants to understand what they engage in, and they were able to stay anonymous. The survey was distributed digitally and therefore the researchers' behaviour didn't influence the participants. The study is important for the society because it has become vital to find ways to spread outdoor recreation practitioners on several areas. Municipalities, the government, and outdoor associations needs support in this development. The costs of spreading the practitioners could raise some conflicts, but this study doesn't make suggestions on how to do it, it merely gives support in the way to identify possibilities. This study doesn't include the risks to biological preservation, though the reason to spread practitioners is linked to avoiding that. The result is going to be spread to participants and other interested parties.

## 3.7. The survey

This study uses an online survey that has both quantitative and qualitative features. The survey was made in Google forms and tested with the help from a group of leaders in outdoor recreation activities. The whole survey can be found in Appendix 1.

### 3.7.1. Survey respondents

Because the study is examining preference in general within practitioners of outdoor recreation, there needed to be a big group of respondents. To reach a lot of practitioners of outdoor recreation, a collaboration was made with the organisation *Friluftsrämjandet* (Swedish Outdoor Association) who are focusing on outdoor recreation. They have members all over Sweden and are interested in the result of this study. It is likely that members of that association are experienced, therefore was the survey also spread in social media.

### 3.7.2. Survey questions

The questions in the survey are about spending time in nature. Outdoor recreation is only mentioned in the title and description of the survey, but not in the questions. This because the meaning of outdoor recreation probably vary between people. Questions about nature areas are meant to collect evaluation of one specific area that the respondents prefer to visit, except for the last question that is supposed to capture general preference of nature. All questions but the last have predetermined answers to choose from.

#### *Background questions*

Apart from the issues that this study focuses on, it is interesting to know a little about the respondent's background. That is why questions about age, gender and education level are asked. That gives the opportunity to use the result in other developmental issues like gender and age equality.

#### *Previous experience of outdoor recreation*

To divide the respondents according with experience of outdoor recreation three levels of experience have been defined. Those are influenced by studies on outdoor recreational habits (Skriver Hansen et al. 2021). The three experienter groups (Low, average and High) are defined by using different levels of use: *Rarely or never*, *Regularly* and *Often and for long time*.

#### *Motive*

Reasons for practice outdoor recreation differs and can also affect the choice of the environment. That is why questions about reasons are asked.

#### *Distance*

Research has found that distance to recreational area is important for people's wellbeing (Stoltz & Grahn 2021b), and that is also something that influences the choice of environment. This is interesting to explore further, because it can be a factor that differs between beginners and experienced practitioners. The answers are divided into distances that demands different kind of travel methods and begins with a distance of less than 5-10 minutes, because it is proven to be important for people's health (Stoltz & Grahn 2021b).

#### *Type of environment*

There is a big difference in environments for outdoor recreation in Sweden. Some uses a park in an urban area while others want more natural landscapes. National parks and Nature reserves are marked with information and sometimes have adjustments for visitors. It is of interest to see how important the adjustments for humans are for the practitioners.

#### *Aesthetic qualities*

The analysis model as a base to divide demands of an environment is chosen with consideration that it must be general and explore both restorative and instorative aspects. That is why the *Perceived sensory dimension* (PSD) model is chosen. The model has inspired some of the questions in the survey. The survey is in Swedish, and the dimensions have been translated by the author and controlled by the supervisor Jonathan Stoltz which has a profound knowledge of the model.

#### *Description*

The last question is free text and meant to capture the general idea of what's required from nature for the respondent to prefer it and want to be there. The respondents are asked to describe what's most important and what nature should contain.

### 3.7.3. Survey distribution

The survey was spread in two ways. By The Swedish Outdoor Association as an email including a link to the survey along with other information in their monthly newsletter. The newsletter was sent to all members with an email-address (the associations total number of members are about 110 000 people). The link was also spread by the researcher in social media with encouragement for others to spread it even further. The social media channels that were used are *Facebook*, *LinkedIn*, and *Twitter*. Because of the distribution methods, it was not possible to send reminders to encourage answering the survey and it is not possible to know how many respondents that was reached by the survey.

## 4. Result

### 4.1. All respondents

#### 4.1.1. Background data

The survey gave 716 individual answers. Most of the respondents were reached in social media and only 23 % were members of *Friluftsrämjandet*. All respondents were over 16 years of age and most of them were women (78 %).

*Table 1. Respondent's age*

Age	Number	Percentage
16-25 years	27	4%
26-40 years	132	18%
41-65 years	460	64%
65 + years	98	14%

*Table 2. Respondent's gender*

Gender	Number	Percentage
Male	157	22%
Women	556	78%
Do not want to state	3	0%

*Table 3. Respondent's highest education level*

Highest education level	Number	Percentage
Elementary school	35	5%
Gymnasium	180	25%
Folkhögskola	40	6%
<3 years college/ university	173	24%
>3 years college/university	287	40%

### 4.1.2. Stress

When asked how often they felt stressed they answered on a scale of frequency from 1-5 accordingly with the diagram below. Most of them experience stress on level 3-4 (32 %, 28 %) only 3 % answered that they seldomly experience stress (1) and 13 % that they experience stress often (5).

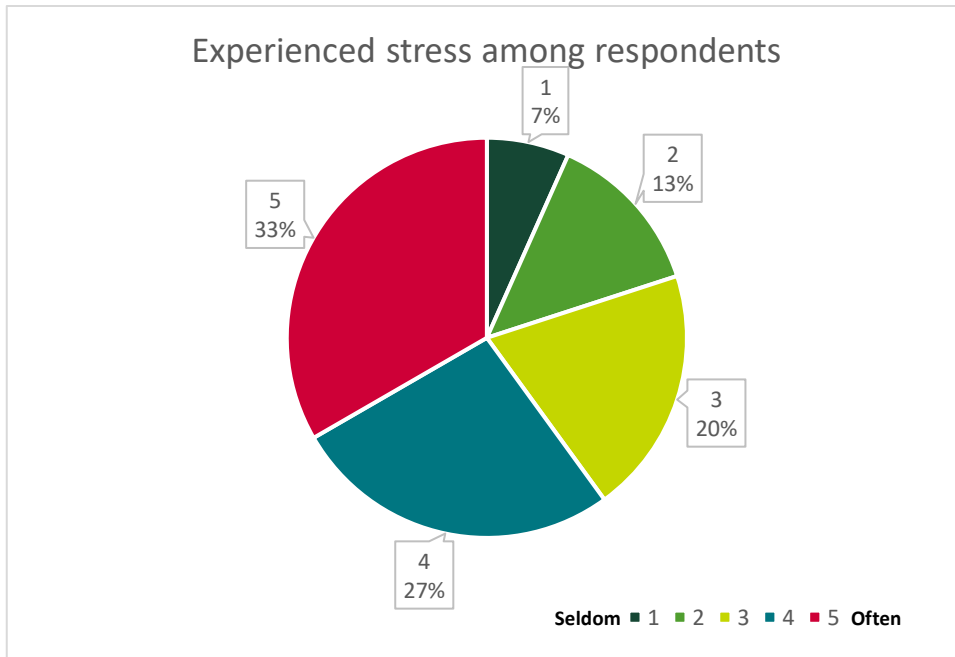


Fig Figure 2. Experienced stress, frequency (1-5)

### 4.1.3. Distance to preferred nature area

Most of them (398 respondents) answered that they have less than 10 minutes ( $\approx 300$  m) to their preferred nature area and 30 % answered that the distance is less than 30 minutes.

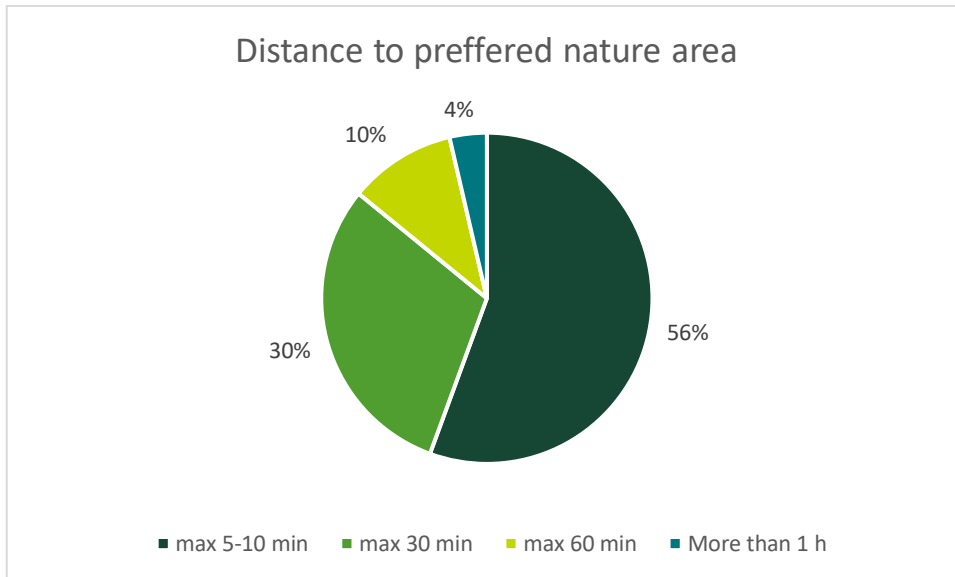


Figure 3. Distance to preferred nature area

#### 4.1.4. Type of area

When answering the question of which type of nature area, the respondent's preferred place is, there were some that answered, "other types" (2 %). Some chose more than one type (12 %) – those are treated as a new category ("Double answers or more") because it is not possible to draw any conclusions on what they value most. The most popular areas were *Nature without trails* (254 respondents) followed by *Nature with trails* (218 respondents).

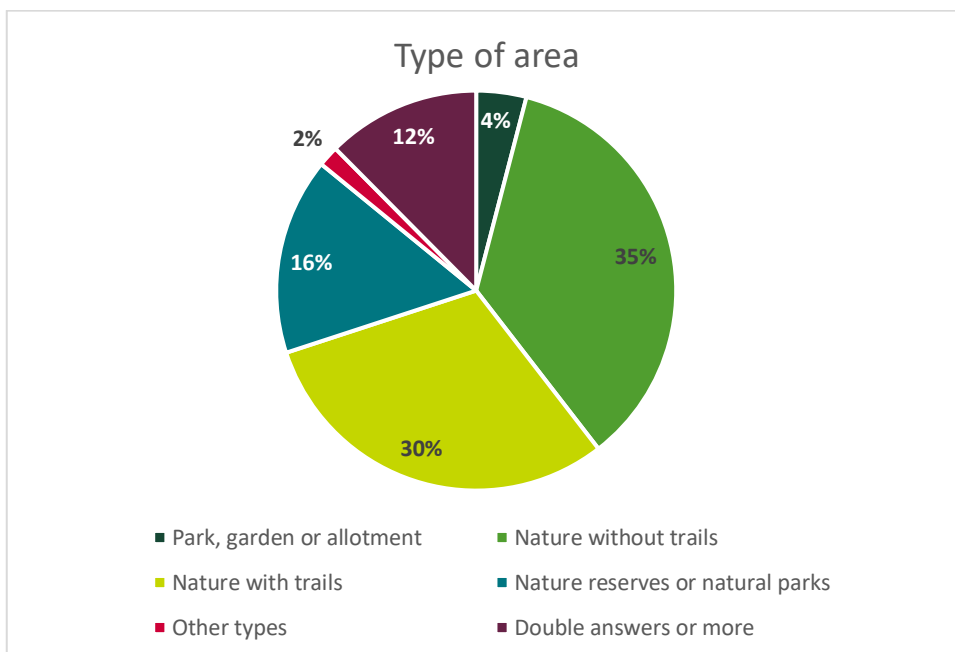


Figure 4. Type of area

#### 4.1.5. Previous experience

Previous experience is measured by the question of how often the respondents spend time in nature and is divided into the groups: 1. *Rarely or never* – Low experience, 2. *Regularly* – Average experience, and 3. *Often and for long time* – High experience. The answers showed that the respondents mostly are of average experience (477 respondents), followed by high experience (176 respondents) and only 63 respondents are considered to have low experience. The diagram below shows the difference in percentage between the three groups.

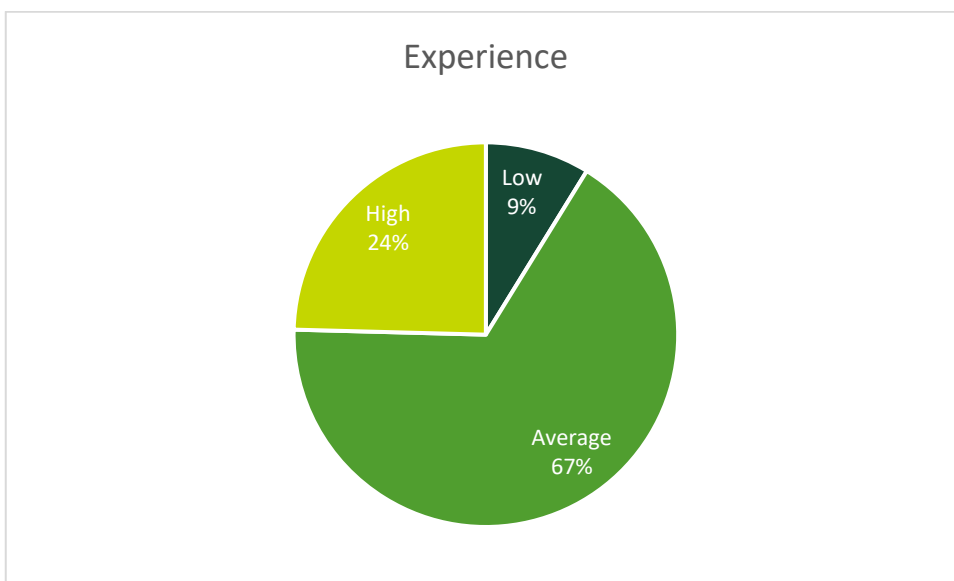


Figure 5. Experience of visiting nature (%)

#### 4.1.6. Motives for spending time in nature

It was not possible to withdraw any data from the question of motives for being in nature. The aim was to get the respondents to choose between some motives but most of the respondents chose more than one. Therefore, it is not possible to know the difference in value between the answers.

#### 4.1.7. Perceived sensory dimensions

The question about which of perceived qualities that was present in the preferred nature area was binary (Yes or No). The answers show that most of all the presence of Serene (94 %) and Diverse (94 %) followed by Natural (87 %), Cohesive (70 %), Sheltered (66 %), and Open (59 %). While Social (31 %) and Cultural (32 %) were least perceived in preferred nature areas.



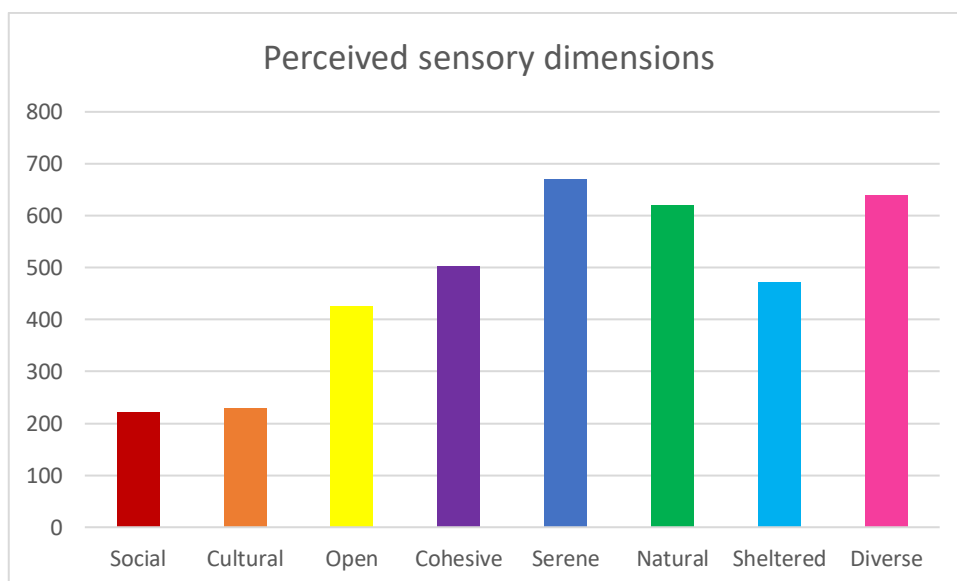


Figure 6. Perceived qualities in preferred nature area (number of perceived quality)

## 4.2. Comparisons between experience groups

From here on, the groups with three different levels of previous experience, are now referred to as experience (low, average or high).

### 4.2.1. Experience and age

The data shows that age-group 16-25 years have the highest number of respondents with low experience of nature, the same goes for age-group 26-40 years old respondents. In ages 41-65 years there are foremost respondents with high experience, followed by average experience and least low experience. The difference within age-group >65 years are not that evident, but it consists mostly of average or high experienced respondents.



Figure 7. Age in relation to experience (%)

#### 4.2.2. Experience and gender

The group with low experienced practitioners has the highest percentage of men, and the group with high experience have the lowest.

Table 4. Gender in relation to experience (%)

Gender	All	Low	Average	High
Men	22%	30%	23%	17%
Women	78%	70%	77%	82%
No answer	0%	0%	0%	1%

#### 4.2.3. Experience and education

A bigger number of respondents with more experience have a higher education level (>3 years in college or university) than the less experienced. When looking at respondents without a higher education (college or university) the more experienced with nature, the higher number of percentages with gymnasium compared to elementary school.

Table 5. Education level in relation to experience (%)

Education level	All	Low	Average	High
Elementary school	5%	8%	5%	5%
Gymnasium	25%	22%	25%	27%
Folkhögskola	6%	3%	6%	6%
<3 years college/university	24%	35%	25%	20%
> 3 years college/university	40%	32%	40%	43%

#### 4.2.4. Experience and stress

When looking at experienced stress and experience of outdoor recreation, there are some differences between the three groups. The least experienced group had most of their answers in level 1-3 (79%). The average experienced group had most answers at level 3-4 (65%) and the high experienced group 2-3 (62%). Suggesting that the least experienced group are the least stressed, and the average experienced feels stressed most frequently.

Table 6. Stress in relation to experience (%)

Experienced stress (frequency 1-5)	All	Low	Average	High
1	3%	27%	3%	4%
2	23%	25%	20%	35%
3	32%	27%	35%	27%
4	28%	16%	30%	23%
5	13%	5%	12%	11%

#### 4.2.5. Experience and distance

When comparing data from distance with experience, data shows that the group with high experience mostly prefer an area within 5-10 minutes from their dwelling. The group with low experience preferred areas are almost equally within 5-10 minutes from dwelling or 30 minutes from it. The average experienced group also prefer an area that is close to the dwelling, followed by maximum 30 minutes away and 60 minutes away. All groups have Over 1 hour as the least prominent answer.



Figure 8. Distance in relation to experience (%)

#### 4.2.6. Experience and type of area

The respondents with low experience preferred nature with trails or a nature area that are a park, garden, or allotment. Respondents with high experience mostly preferred a natural area without trails, only one respondent from that group preferred an urban area. The average experienced respondents preferred nature areas with (31 %) or without (33 %) trails, and they also preferred Nature reserves or national parks more than the other groups.

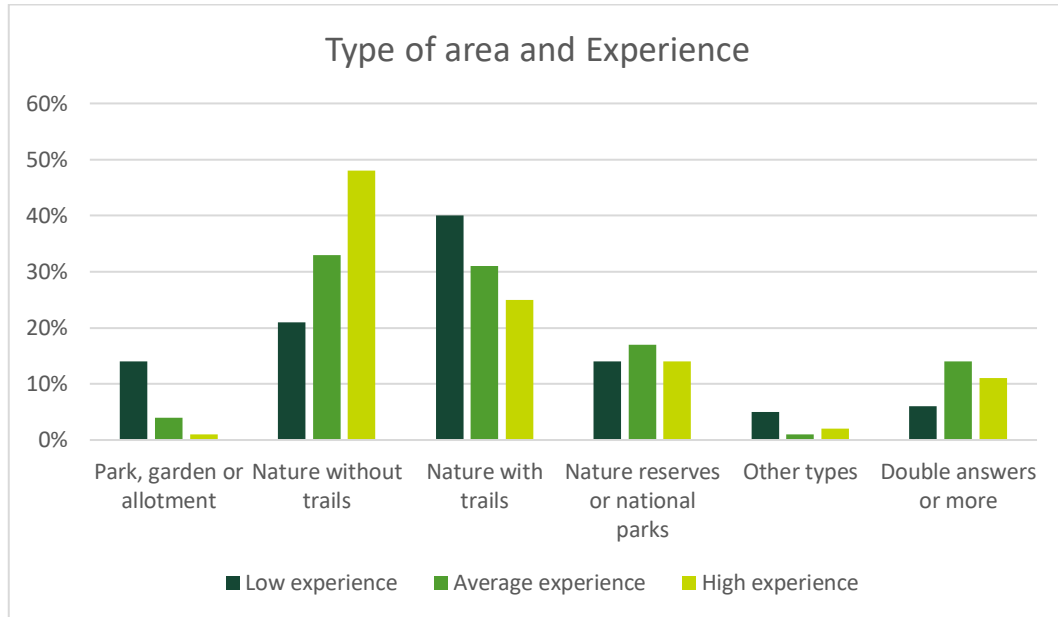


Figure 9. Type of area in relation to experience (%)

#### 4.2.7. Experience and PSD

When looking at the different perceived qualities in preferred nature area, it shows that all groups have perceived Serene most of all qualities. In both groups with average and high experience the next in line are Diverse followed by Natural, Cohesive, Sheltered, Open, Cultural and Social. There are some differences in the percentages of answers within the categories though. The group with low experience have to a greater extent perceived Social than Cultural in their preferred nature area. They also perceive natural qualities over diverse, compared to the other two groups.

Table 7. Relationship between PSD and Experience (%)

PSD	All	Low	Average	High
Social	31%	46%	32%	24%
Cultural	32%	33%	32%	31%
Open	59%	59%	60%	59%
Cohesive	70%	52%	69%	80%
Serene	94%	90%	93%	97%
Natural	87%	68%	87%	92%
Sheltered	66%	60%	65%	71%
Diverse	89%	71%	90%	94%

When comparing the results, Social and Cultural are mostly presence in the group with low experienced respondents. Almost half of the practitioners with low experience perceive Social qualities in their preferred nature area. While Cohesive, Serene, Natural and Diverse is mostly presence in nature areas preferred by more experienced respondents. Cohesive emerges with higher percentages in the highly experience group, the other three are also slightly higher.

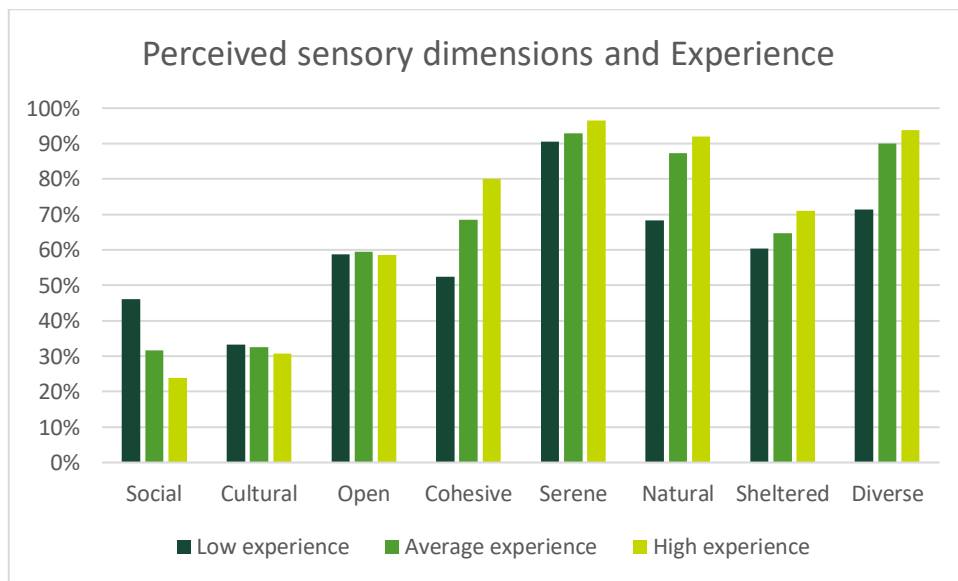


Figure 10. Relationship between experienced and perceived qualities (%)

When analysing the result in SPSS (Table 8), the result show a significant positive correlation between previous experience (measured by the question about how often the respondent visit nature) and the perceived qualities: Cohesive, Natural, Diverse and Serene. There is also a negative correlation between previous experience and Social qualities. That suggests the more previous experience, the

higher perceived qualities Cohesive, Natural, Diverse and Serene but the less perceived social qualities in a preferred natural area.

*Table 8. Spearman Correlation Coefficient*

	Social	Cultural	Open	Cohesive	Serene	Natural	Sheltered	Diverse
I visit nature...	-.117**	-.018	-.011	.151**	.075*	.149**	.067	.148**

\*. Correlation is significant at the 0.05 level (2-tailed).

\*\* . Correlation is significant at the 0.01 level (2-tailed).

### 4.3. Description analysis

This section entails analysis of the descriptions left in the survey. In the end of the survey, the respondents were asked to describe what is most important for them with a place in nature and what it should include for them to want to be there. This was not a compulsory question; therefore, did not all respondents leave a description. The descriptions were divided into the three experience groups and structured in different themes. Below are the themes and almost every theme includes quotes from the descriptions. The group with low experience respondents are the smallest group and therefore has the lowest number of descriptions, followed by the group with high experience. The group with most descriptions are the average experienced group.

#### 4.3.1. Themes

Similar themes from all three groups were interpreted, presented below.

Table 9. Theme from the three experience groups descriptions

General theme	Low exp.	Average exp.	High exp.
Restorative	Calm and silent	Calm and recovering	Silent sanctuary
Forest	Green forests	Well-preserved forests	Wild and diverse forest
View	Beauty and scenery	Spectacular views	Vistas
Water	Water	Wishful waterscape	Water
Affordances	Near and accessible	Varied for different needs	Natural paths
Social	Human company /not	Solitary or chosen company	Away from others
Energy	-	Energized	-

### *Restorative*

The restorative aspect of nature is described somewhat differently in the three groups. The most important qualities for the least experienced are nature's ability to provide a calm and silent environment. They seek a peaceful place without noise.

Quiet so that it is possible to hear, feel and smell nature.

The average experienced group also writes about nature that is calm and without noise. But they are also describing a place that is far away from stress and that helps them recover and restore.

Nature accept me exactly as I am, it is relaxing and healing.

The most experienced group emphasis a lot of the absence of noise and a place that is far away from disturbance. They describe nature's ability to provide a sanctuary.

The possibility of feeling undisturbed and silence.

### *Forest*

Forest is mentioned in all three groups as important when seeking nature. The group with average experience describe a forest that is old, well-preserved, natural, and genuine. They seek for a green and lush feeling and comments about trees height, age and density of the forest. The older forest the better.

Untouched forest, natural forest. Unfortunately, our closest forest were demolished and is just a miserable clear-felled area now.

Many of the respondents in the more experienced group are using a lot of words that describes an unmaintained and free growing forest with high biodiversity. They want an old forest that is not too managed by humans.

That there is a developed ecosystem, where nature has been allowed to grow. It feels untouched.

### *View*

Some of the descriptions are about beauty and views. The least experienced group are describing the importance of the scenic experience when seeking recreational places. The average group describes views can be enhanced by open environments, preferably from a high. Beauty is pleasant and spectacular and makes the experience powerful.

The feeling that nature never ends. That you can see beyond the horizon, and it just continues with forest, mountains, and nature.

The group with high experience also thinks that natural beauty is something to enjoy, and they stresses the importance of opportunities to do so by describing vistas as essential.

Wide views with amazing vistas.

### *Water*

Both respondents in the group with low and high experience highlights waterscapes. Mostly it is mentioned in a row of things they want from the environment.

Trees, water, birds chirping

A lot of the descriptions from the group with average experience about water are imbued with a wishful notion. Like it is a big difference if there is water in the environment, but that it is not expected.

Preferably watercourses but that is not a requirement.

### *Affordances*

What the respondents want from the environment differs depending on what they want to do there. The group with low experience are mentioning distance to the place and accessibility in general. Some mentions seating areas as important, and some mentions litter as repulsive. Trails and wayfinding are also mentioned as essential.

"Forested" but still available. Get the feeling without getting lost.



In the average group, they prefer a place that is accessible and easy to get to, but also varied and accommodating different needs. A lot of respondents in that group wants marked trails that are well-maintained (for safety and wayfinding) but also clean without litter, while others want more natural features and less human impact. Some descriptions are about adaptation for children, but also wheelchairs and other disabilities. Seating and barbecue areas, shelter from wind are preferred by a lot of people.

Not too much human intervention, but preferably a maintained path.

The group with high experience are expressing that nature should be natural and not maintained. They want natural paths which they can find themselves.

Nature should be as natural as possible. Not near buildings.

### *Social*

The group with low experience contains of descriptions that the presence of other people in nature as vital for feeling secure. But there are also respondents that wants to be alone.

It should feel safe and with the presence of other people, I don't like being completely alone in nature.

Most respondents in the average group emphasises being alone in nature as a big part of the experience. They write about being secluded from other people, from the city and civilisation. But there are also respondents that differentiate human company that is chosen and that is unwanted. Many appreciate the company of friends and family (or a dog) and describes that they want different things at different times – sometimes company and sometimes solitude.

Sometimes you want areas where you can meet other people and sometimes you want to look for places where it is calmer.

The group with high experience is unanimous about natures ability to provide a place away from other people. They write about being far from people that can disturb them, and some do not even want to see traces of other humans.

Be sure of being alone, I don't want to face others.

### *Energy*

This is the least prominent theme, but some descriptions in the average experienced group are about the more active and energized aspects of recreation. Respondents

describe feelings of life, freedom, happiness, energy, and general positive state from being outside in the fresh air.

A place to breathe and feel freedom. Provides positive energy.

#### 4.3.2. Concluding comments on description analysis

There are a lot of similarities between the three groups. They all mention calm and silence, forests, water, social aspects, and views. Most common descriptions are short and often entail trees, water, and calm. The differences lie in the nuances, details in the descriptions. All together it is possible to see some differences in the patterns from each group. The least experienced group is not that detailed in general, and they are not as united as the high experienced group. The middle group contains a lot of comments, so it is many descriptions of the same aspects which makes it more difficult to draw conclusions, there is always some comments that are opposing. The average experience group is the only one that has a theme with nature's active and energizing features. There were some similar comments in the other groups but not that salient.

## 5. Discussion

### 5.1. Principle findings

The result shows some differences in preference depending on previous experience from outdoor recreation. The least experienced are in general younger and less stressed than the more experienced practitioners. They seek instorative and sometime social qualities in nature, while the more experienced seek natural and cohesive environments that offers solitude and restoration. Their fondness for diversity can be interpreted as connected to biological preservation rather than visual features. It is possible that the more experienced have a higher sensitivity when it comes to stressful environments. The average experienced group suffers most frequently from stress, and their need for restoration in nature might not be reached often enough. They are likely to seek different environments depending on mood or activities. Most of the respondents couldn't choose one motive for being in nature, the reasons seem to be multifaceted. All respondents in the study preferred serene nature areas with trees, water, views, and nature sounds.

### 5.2. Result discussion

It is interesting to reflect on why the least experienced are younger than other groups. Has previous experience to do with changes in cultural behaviour, that nature has been a bigger part of older generations leisure time? Or are they immigrants who are not accustomed to public accessed nature? Have younger people not time to be outside, because of a demanding family-life? Or is nature something that gets more important as we grow older? Age has not been the focus of this study, so these questions are left to answer in the future.

Could stress be a factor that makes respondents in this study seek nature? Most of the written descriptions in all groups support that notion. The average experienced practitioners were a group that was found to feel most stress. But how come that

the most experienced felt less stress than the average group? If frequent nature visit act as a buffer that hinders stress, then the average experienced would be less stressed than the novice. Or maybe the middle group doesn't go out as often as they need, that is not clarified by this study. A lot of them were mentioning stress-recovery in the written descriptions, so it seems like they would heal from stress by visiting nature. The more experienced are also more frequently in nature, so it might be the explanation for the difference in experience of stress. Respondents with low experience is mostly appreciating the calming atmosphere, while the more experienced is searching for stress-relief and sanctuary. A calming atmosphere can be interpreted as something nice but maybe not as crucial as a stress-relief and sanctuary. The difference in perceived coherence can also be related to stress, because the more experienced seem to seek it more than less experienced.

The least experienced are more likely to prefer a nature area with social qualities or an urban area than the more experienced. In general, all respondents tend to appreciate more restorative qualities in nature, but the highly experienced showed an evident reluctance of social aspects in nature. They wouldn't want to meet anybody, and tend to like being away from disturbance, while the middle group wanted to have the choice of company when wanting to. The middle group were also more interested in variations in general. That speaks of an important factor to consider, that average experienced people like a wide range of environments to choose from. Those are also the biggest group found in this study, which could imply that those are the biggest part of Swedish society. The social aspects, like the presence of other people, has to be considered when planning areas for novice outdoor recreation practitioners. The choice to bring a friend or a dog could be left up to the practitioner but can be supported by litterboxes (for dog-poop) and such. The fact that only the middle group mentioned natures energizing effects could be explained by the number of respondents in that group. If the other two groups had been as big, maybe the theme also had been found. Either way, that is not that tangible and therefore hard to interpret what it entails.

Highly experienced practitioners do often prefer a nature area within 5-10 minutes from their dwelling, and most common is an area that is pure nature without trails. They tend to find diversity important and appreciate nature's ability to provide a haven with no disturbance from other people. The experienced quest for wild nature is salient in this study. They tend to prefer a diverse, cohesive and wild environment without trails more than the other groups. A diverse environment in the highly experienced practitioner's perspective, is likely connected to different species. Even if the needs differ within the group, it is probable that many experienced practitioners are likely to seek this type of environment. Paradoxically, experienced practitioners are also likely to prefer a nature area within 5-10 minutes from their dwelling. Those things might not be connected at all, near access could have to do

with the opportunity to frequently visit nature – while the utopic nature area is something else that they would like to visit from time to time. The novice practitioners and the average experienced are more likely to seek shelter from wind, places to sit, fireplaces, support for wayfinding and different types of activities than the highly experienced group.

There are a lot of similarities between the three groups, also worth mentioning. In general, was the presence of forest (preferably old) and water salient factors when describing what's most important in nature. The absence of noise but with opportunities for views and to be calmed by nature sounds, was appreciated regardless of experience. Accessibility, including nature areas near dwelling, were mentioned but not with so many descriptions. Nature with or without trails are the most popular types of nature areas for all groups, and that doesn't include an urban park. Because most of them don't want to meet other people, there has to be a lot of nature areas for people to visit without getting crowded. That is part of the reason for this study which provides information on what those areas should offer. The result doesn't say anything about how often people feel disturbed in nature, but the fact that all groups mention it might indicate that it happens frequently. More areas might be needed but we cannot know where they should be located without further research, because this study didn't ask for geographical parameters. The fact that so many respondents couldn't decide on one motive for their nature visits show us that there might be a dynamic perspective to explore further. The motives seems multifaceted and probably changes depending on the practitioner's mood and the activities they want to engage in. That was especially salient in the middle group.

There was a great conformity with regards to the perceived sensory dimensions, apart from small differences. All groups have detected Serene qualities most prominently in their preferred nature area. The less experienced were more likely to perceive Natural next in line, while the experienced group perceived Diverse. Could experience affect the ability to appreciate biodiversity and therefore the ability to discover it? The novice group perceived Social aspects over Cultural aspects while experienced groups did the opposite. Social and Cultural aspects were least perceived by all groups, and it supports the idea that the more restorative qualities in nature are preferred when practicing outdoor recreation. That could mean that practicing outdoor recreation is mostly about restoration, regardless of experience. But what the environment needs to consist of, might differ depending on previous experience and the needs connected to that.

So, does experience affect preference in environments for outdoor recreation? To some extent, yes. Most practitioners perceive the same qualities but there is a difference in frequency and order which might be affected by previous experience. The needs differ somewhat, it is more important to find secluded and diverse nature

areas for the more experienced practitioners, while the less experienced appreciates trails and some support for social activities. The bigger mass wants a variety of areas to choose from. But if we plan for nature areas that are serene, with old forests, with a watercourse, with a view and that is near people's dwellings – then it is likely that people find opportunities for escaping and recovering from demands and stress, regardless of their previous experience. This study gave more knowledge on the subject experience and outdoor recreation. Weaknesses can be explained by the differences in size of the three experience groups, and also by flaws in the method. The study has shed a light on some new topics for further exploration; dig deeper in outdoor activities and what they demand from an environment, what explains differences in experience between younger and older people and what does a calming respectively healing environment entail?

### 5.3. Strength and weaknesses

Mixing methods is not as well structured as if choosing one specific method, that opens up for possibilities but also demands much of the researcher. The researcher has to find its own way in combining different tools. That affects the stringency of this study. A structured report could make up for weaknesses of that kind. This study chose a survey as a gathering of data tool, and that is a clear approach even if the analysis were made with mixed methods. Using a thematic approach to analyse the descriptions were more of an experiment, because the data consisted of written text from a large number of respondents.

The design of the survey has probably affected the result in many ways. The form did not work properly, because it was possible to choose several alternatives (in question 7 and 9) when the aim was to make the respondents choose one. That made it impossible to make valid analysis about the types of areas and the motives for being in nature.

The formulation of the questions also affects how respondents answer them. Overall, people are different and are likely to interpret questions differently either way. But some questions were formulated with the aim to describe one preferred area in nature, but it is possible that the respondents were not thinking about one specific area. Especially since some of them choose several alternatives when describing the type of area in question. It is also possible that they didn't think of the same area for all the questions. The last question was encouraging the respondents to describe what's important with a nature place, and therefore those answers are more general and can be somewhat utopic. For these reasons, correlations between the answers from different questions cannot really be drawn.

The choosing of respondents is also an important factor in this study. Most of them were experienced visitors and might not be representative for the entire Swedish population. But previous studies (Skriver Hansen 2021) show that most Swedish people are used to be in nature and that suggests that the respondent spread can be equivalent for swedes. It is likely that people that are interested in nature are more likely to participate in a survey about it than less interested people, and therefore it is less likely to reach less experienced people when asking for volunteers.

The question about perceived qualities (number 10) was binary and it only measured presence or not. That makes the respondents choose to mark the presence of a quality even if it is just small. It also makes it impossible to know whether there was a difference between the present perceived qualities. Detailed reflections on the present qualities couldn't be done.

The inability to send out reminders was probably affecting the number of respondents. Even if the number of respondents were considerable high, it would have been better if there were more respondents with low experience and high experience of nature visits. That would have made the comparisons more valid. Response rate could not be measured because it was not possible to count how many that received the survey. Considering that almost 100 000 members got the link (and a lot of people got it in social media) and about 800 responded, the study has a low response rate. In spite, of that, the dataset can be considered large.

The survey did not entail questions of the geographic affiliation of the respondents; therefore, it is not possible to reflect on how that affects preference. Factors like previous experience of nature area types, available nature types and place attachment would be interesting to analyse, but that type of data is lacking in this study.

## 5.4. Results in relation to previous research

This study supports previous theories about human preference for views (Appleton 1975). As several researchers suggests (Falk & Balling 2010, Adevi & Grahn 2012) it's possible to explain that by understand preference as a combination of innate and learnt behaviour, which could be why some findings are both about beauty and open views. Maybe people cannot separate those factors because innate reflexes have become interwoven with learnt behaviour as Falk and Balling (2010) argues. The spectacular experiences that was salient in the average group are not likely explained exclusively by biologically constructed processes, because they are mostly connected to survival. Though, it is possible that environments that supports survival have become areas that humans find spectacular, because of socially

alterations. That would strengthen the hypothesis that Hartig et al. (2011) elaborates on, that the cultural context affects human genetics.

Place attachment is not targeted in this study, but it would have been interesting to investigate the result in relation to people's previous place relations. The processes in work might explain some of the differences in preference and that may lead to other explanations for them than experience from outdoor recreation. Or have one group something in common when it comes to place attachment as well? Like are they seeking nature more often because the previous psychological benefits that Scannel and Gifford (2010) suggests? It would not be surprising if this is the fact, considering the novice group that mostly were interested in the calming effects from nature, while the more experienced sought out stress-relief and sanctuary. Are their previous experiences also differing in level of impact on stress? Or is there a connection in sensitivity among the groups?

Affordances is a prominent theme in this study. As explained by Gibson (1979) is that connected to environments ability to offer what humans need. It is clear that people's needs vary a good deal, and it can be explained by both previous experiences and actual mood. Other humans are also part of the environment (Gibson 1979) and greatly affect people's feelings towards a place. In this study, the presence of others is mostly found to be negative, but positive when chosen. The availability of choice seems directly connected to affordances, because people tend to choose what they need. Other features that were mentioned in this study were trees, water, silence (or absence of noise) and nature sounds, and they were strongly correlated to the willingness of wanting to stay in a nature area. That is in line with Oriens (2008) theory that people prefer environments that serves them. Nature is clearly supporting people's wellbeing by providing certain qualities, when looking at the result of this study. Maybe that is because of the expired reflexes that still drives us but lies in our unconsciousness as Oriens (2008) argue.

Bessons (2020) hypothesis of the dynamic essence of preference are applicable on the results of this study. She argues that people have more than one favourite place and that choices is based on what is needed for a certain activity. Most of the respondents in this study answering questions about their preferred nature area in general, but the descriptions tell of a variety of activities and needs connected to them. The fact that the respondents couldn't choose one motive for being in nature, is also in line with Bessons theories. She also divide motives between what people want to do or feel, and this study show a lot of evidence that people seek nature to feel good. As findings in her study, this research also show that some seek social places while others seek energizing environments and that people's choices depend on their mood. Preference of place is according to her based on somatic experiences, and beauty, views and scenery was prominent in this studies result.



Ulrichs (1986) theories about aesthetics effect on restoration is supported by findings in this study. A lot of the respondents have described how views of nature makes them calm. But it is not only connected to the visual. The result show that nature sounds, absence of noise and the feeling of being far away from disturbance is also found to be restorative. It is not clear what type of restoration that comes from what features, but in line with Kaplan and Kaplans (1989) attention restoration theory, Being away seem to affect people's restoration to a great extent. Both Ulrichs (1986) and the Kaplans (1989) theories about restoration is mostly connected to visual stimuli. Even if that is vital, according to the result in this study, it is not all. Sounds and psychological factors (like knowing that one is far away from civilisation or will not encounter others) are affecting the restorative experience according to this research.

Bertos (2007) research on elderly in comparison with adolescence was similar to the result in this study, even if age wasn't in focus. The youngest group (Low experienced) was more likely to prefer urban areas than the other groups that consist of an older crowd. According to Bertos, older people prefer restorative environments, and that is also supported by this study. The older and more experienced were more likely to prefer an environment with restorative qualities. Whether preference was affected by familiarity, as Berto suggests, is not explored in this research. Therefore, Korplea and Hartigs (1996) findings similar to Bertos, about corelation between place attachment and restoration, is not investigated either. But the descriptions of what makes a nature area more attractive, seem to build on previous experience and that doesn't speak against their theory.

The differences between the three groups when it comes to restoration, can maybe be explained by Hartigs (2011) theories on instoration. The difference between instorative environments and restorative environments can be understood as levels of support for wellbeing. Some people are not that stressed and need an environment that helps them grow or strengthen their buffer, I connect that to the low experience group (because they were least stressed). They described calming environments, which I interpret as a mild level of support. Other people suffer from higher levels of stress and needs the environment to be both far away from their stressful life, as well as include features that supports healing. In this study, I saw some signs of that when it comes to the more experienced groups. They seek more restorative qualities of nature, and they are clearer when it comes to the importance of distance to disturbance (noise, civilisation, other people). Their descriptions are also more about healing and sanctuary, almost divine characters of nature. I draw parallels to studies on sensitivity, where openness is a factor that seem to help people cope with stressful environments (Williams et al. 2009). If the groups with more experience have less of the personal trait openness, then it could be why they search for an undisturbed, cohesive environment to recover in. The respondents in

both those groups mostly consist of women, the sex that are most likely to suffer from stress (Bangasser & Wiersielis 2018).

This study shows support for theories about the PSD model when it comes to restorative environments (Stoltz & Grahn 2021a) and is connected to higher levels of stress as described in the previous section. Though, the presence of Sheltered qualities are not as salient as Natural, Serene and Cohesive. This build on a new hypothesis that the most experienced actually needs stress-recovery more than the other two groups (even if the middle group actually experience higher levels of stress). Because the group whose results were most in line with Stoltz and Grahn's findings about restorative environments, is the group with high experience. That could of course be explained by something else, but the descriptions and the result all together can be interpreted in this direction. It would have been interesting to test the hypothesis further. If the hypothesis is valid, then it could also explain why the highly experienced group are more likely to seek nature areas near their dwelling, as it promotes health to have a green area within 5-10 minutes according to Stoltz and Grahn (2021b). Near nature areas were more preferred in all groups, so maybe people have sensed how important it is for their health to have easy access to nature. That is strengthened by the descriptions, near access was prominent as important factors when seeking nature areas.

All groups were perceiving Serene, Natural, Diverse, Cohesive and Sheltered more often than Open, Cultural and Social. That is in line with Stoltz and Grahn's (2021a) findings of qualities that supports lower levels of stress except for Diverse. That makes me wonder if Diverse is interpreted differently in this study compared to theirs. I suggest that Diverse in this study mostly is connected to biodiversity, while their study might have been more about visual aspects. A biodiverse environment might not be as mentally demanding as a visually diverse environment.

Findings in this study reminds of findings in the study by Skriver Hansen et al. (2021) regarding experienced practitioners. They saw that highly experienced mainly were older than 41 years, the same was found in this study. Similarities are also shown in the results were the less experienced seek nature for socialisation. Areas near dwellings are essential in both studies. Skriver Hansen and colleagues (2021) argues that experienced practitioners seek new areas further out, but that is not supported by this study. But their preference for nature areas within 5-10 minutes from their dwelling could be connected to their need for regularly nature exposure while their descriptions of a utopic area is another type of recreation. Experienced practitioners wants to be far away from others, and if areas get crowded, they are likely to seek out new ones as Skriver Hansen and colleagues argues.

## 6. Conclusions and future implications

Nature areas near dwellings (within 5-10 minutes) are vital for all outdoor practitioners regardless of previous experience. All practitioners prefer serene nature areas with trees, water, views, and nature sounds. Practitioners with less previous experience in outdoor recreation are more interested in areas with social support, and they are in general younger than the more experienced. They were the least stressed group, and they seek nature's restorative qualities. Practitioners with high experience prefer biodiverse nature without trails, away from other people and disturbance to heal and recover from stress. They seem more sensitive to stressful experiences. They prefer nature near dwellings which possibly is connected to their regular nature exposure and stress-relief while their utopic outdoor environment is in wild nature far away from disturbance. The group with average experience suffers more frequently from stress than the other groups, and they also seek the healing qualities from nature but maybe not as often as they need. They express a wish for variation and the choice of company depending on mood. Many of the respondents didn't want to specify one motive for being in nature. It is likely that preference is affected by experience and that it changes depending on what people want to do or feel. Most of the respondents search for solitude and serene areas, and that is therefore vital to offer enough nature areas for everybody to enjoy nature in that sense. Further studies could dig deeper in why the novice nature visitors are younger and how place attachment affects choices of environments for outdoor recreation. It would also be interesting to learn more about what aspects in nature that supports healing and recovering from higher levels of stress.

## References

- Adevi, A. A. & Grahn, P. (2012). Preference for Landscape: A Matter of Cultural Determinants or Innate Reflexes that Point to Our Evolutionary Background? *Landscape Research*. 37, 27-49. <https://doi.org/10.1080/01426397.2011.576884>
- Appleton, J. (1975). *The Experience of landscape*. London: Wiley.
- Bangasser, D.A. & Wiersielis, K.R. (2018). Sex differences in stress responses: a critical role for corticotropin-releasing factor. *Hormones (Athens)*. 17:1, 5-13. DOI: [10.1007/s42000-018-0002-z](https://doi.org/10.1007/s42000-018-0002-z)
- Berto, R. (2007). Assessing the restorative value of the environment: A study on the elderly in comparison with young adults and adolescents. *International Journal of Psychology*. 42 (5), 331–34. <https://doi.org/10.1080/00207590601000590>
- Besson, A. (2020). Aesthetics and Affordances in a Favourite Place: On the Interactional Use of Environments for Restoration. *Environmental Values*. 29 (5), 557–577. <https://doi.org/10.3197/096327119X15678473650893>
- Bonaiuto, P., Ginanni, A.M. & Biasi, V. (2016). Perception Theories and the Environmental Experience. Bonnes, M., Lee, T. & Bonaiuto, M. (eds.) In: *Psychological theories for environmental issues*. Ashgate: Aldershot. 95-136. <https://doi.org/10.4324/9781315245720>
- Bonnes, M., Lee, T. & Bonaiuto, M. (2016). Theory and Practice in Environmental Psychology – An Introduction. Bonnes, M., Lee, T. & Bonaiuto, M. (eds.) In: *Psychological theories for environmental issues*. Ashgate: Aldershot. 1-26. <https://doi.org/10.4324/9781315245720>
- Braun, V. & Clarke, V. (2006). Using thematic analysis in psychology. *Qualitative research in Psychology*. 3(2), 77-101.

<http://dx.doi.org/10.1191/1478088706qp063oa>

De Jong, K., Albin, M., Skärbäck, E., Grahn, P. & Björk, J. (2012). Perceived green qualities were associated with neighbourhood satisfaction, physical activity, and general health: Results from a cross-sectional study in suburban and rural Scania, southern Sweden. *Health & Place* (18), 1374-1380.

Depoy, E. & Gitlin, L.N. (2020). *Introduction to Research*. St. Louis: Elsevier.

Falk, j. & Balling, J. (2010). Evolutionary influence on human landscape preference. *Environment and behaviour*. 42(4), 479-493.  
<https://doi.org/10.1177/0013916509341244>

Fredman, P., Ankre, R. & Chekalina, T. (2019). *Friluftsliv 2018 – Nationell undersökning av svenska folkets friluftsvanor*. 6887. Bromma: Naturvårdsverket.  
[Friluftsliv 2018 \(naturvardsverket.se\)](https://doi.org/10.1177/0013916509341244)

Gibson, J. J. (1979). The theory of affordances. Giesecking, J.J., Mangold, W., Katz, C., Low, S. & Saegert, S. (eds.) In: *The People Place and Space Reader*. New York: Routledge. 56-60.  
<https://doi.org/10.4324/9781315816852>

Giuliani, M. V. (2016). Theory of attachment and place attachment. Bonnes, M., Lee, T. and Bonaiuto, M. (eds.) In: *Psychological theories for environmental issues*. Ashgate: Aldershot. 137-170.  
<https://doi.org/10.4324/9781315245720>

Grahn, P. & Stigsdotter, U.A. (2003). Landscape planning and stress. *Urban Forestry. Urban Greening*. 2, 1-18.  
<https://doi.org/10.1078/1618-8667-00019>

Grahn, P. & Stigsdotter, U.K. (2010). The relation between perceived sensory dimensions of urban green space and stress restoration. *Landscape and Urban Planning*. 94, 264–275.  
<https://doi.org/10.1016/j.landurbplan.2009.10.012>

Hartig, T., Van den Berg, A., Hagerhall, C.M., Tomalak, M., Bauer, N., Hansmann, R., Ojala, A., Syngollitou, E., Carrus, G., Van Herzele, A., Bell, S., Camilleri Podesta, M.T., & Waaseth, G. (2011). Health Benefits of Nature Experience: Psychological, Social and Cultural Processes. *Forests, Trees and Human Health*. 127-168.

[http://dx.doi.org/10.1007/978-90-481-9806-1\\_5](http://dx.doi.org/10.1007/978-90-481-9806-1_5)

Kaplan, R. & Kaplan, S. (1989). *The Experience of Nature*. Cambridge: Cambridge University Press.

Korpela, K. & Hartig, T. (1996). Restorative qualities of favorite places. *Journal of Environmental psychology*. 16, 221-233.

<https://doi.org/10.1006/jevp.1996.0018>

Mather, G. (2011). *Essentials of sensation and perception*. New York: Routledge.

<https://doi.org/10.4324/9781315787275> E-book

Orians, G. (2008). Nature and Human Nature. *Daedalus*. 137(2), 39-48.

<https://www.jstor.org/stable/20028179>

O'Súilleabháin, P.S., Howard, S. & Hughes, B.M. (2018) Openness to experience and stress responsivity: An examination of cardiovascular and underlying hemodynamic trajectories within an acute stress exposure. *PLoS ONE*. 13(6): e0199221.

<https://doi.org/10.1371/journal.pone.0199221>

Richardson, E.A. & Mitchell, R. (2010). Gender differences in relationships between urban green space and health in the United Kingdom. *Social Science & Medicine*. 71, 568–575.

<https://doi.org/10.1016/j.socscimed.2010.04.015>

Scannel, L. and Gifford, R. (2010). Defining place attachment: a tripartite organizing framework. *Journal of Environmental Psychology*. 30, 1-10.

<https://doi.org/10.1016/j.jenvp.2009.09.006>

Scannel, L. and Gifford, R. (2017). The experienced psychological benefits of place attachment. *Journal of Environmental Psychology*. 51, 256-269.

<https://doi.org/10.1016/j.jenvp.2017.04.001>

Skriver Hansen, A., Falla Arce, J. & Lindberg, I. (2021). *Friluftslivet under coronapandemin. Kartläggning av friluftsvanor och vistelse i naturen under coronapandemin i Västra Götaland*. (2021,1). Göteborg: Mistra sport and outdoor.

[10.13140/RG.2.2.17507.27683](https://doi.org/10.13140/RG.2.2.17507.27683)

Sonntag-Öström, E., Nordin, M., Lundell, Y., Dolling, A., Wiklund, U., Karlsson, M., Carlberg, B. & Slunga Järvholm, L. (2014). Restorative effects of visits to urban and forest environments in patients with exhaustion disorder. *Urban Forestry & urban Greening*. 13, 344-354.

<https://doi.org/10.1016/j.ufug.2013.12.007>

Spector, P.E. (1981) *Research Designs*. Thousand Oaks: Sage publications.  
<https://dx.doi.org/10.4135/9781412985673>

Stoltz, J. & Grahn, P. (2021a). Perceived sensory dimensions: An evidence approach to greenspace aesthetics. *Urban Forestry & Urban Greening*. 59, 1-9.  
<https://doi.org/10.1016/j.ufug.2021.126989>

Stoltz, J. & Grahn, P. (2021b). Urbana grönområden – indikatorer för hälsa och välbefinnande. *Movium Fakta*. 3, 1-8.  
[Movium Fakta #3/2021 – Urbana grönområden by Tidskriften STAD - Issuu](https://doi.org/10.1016/j.ufug.2021.126989)

Stoltz, J., Lundell, Y., Skärbäck, E., Annerstedt van den Bosch, M., Grahn, P., Nordström, E-M. & Dolling, A. (2016). Planning for restorative forests: describing stress-reducing qualities of forest stands using available forest stand data. *European Journal of Forest Research*. 135(5), 803-813.  
<https://link.springer.com/article/10.1007/s10342-016-0974-7>

Terrell, S. (2011). Mixed-methods research methodologies. *The Qualitative Report*, 17(1), 254-280.  
<https://doi.org/10.46743/2160-3715/2012.1819>

Ulrich, R. S. (1986). Human responses to vegetation and landscapes. *Landscape and Urban Planning*. 13, 29-44.  
[DOI:10.1016/0169-2046\(86\)90005-8](https://doi.org/10.1016/0169-2046(86)90005-8)

Williams, P.G., Rau, H.K., Cribbet, M.R. & Gunn, H.E. (2009). Openness to Experience and stress regulation. *Journal of Research in Personality*. 43(5), 777-784.  
<https://doi.org/10.1016/j.jrp.2009.06.003>

Skr 2012/13:51, Mål för friluftslivspolitiken. Stockholm: Miljödepartementet.  
[Microsoft Word - 121305100 \(regeringen.se\)](https://www.regeringen.se/491313/publications/491313)

SFS 2010:2008, *Förordning om statsbidrag till friluftsanslagställen*. Stockholm: Miljödepartementet.  
[Regeringskansliets rättsdatabaser \(gov.se\)](https://www.regeringen.se/491313/publications/491313)





## Acknowledgements

I want to thank Friluftsrämjandet for helping me pilot the survey and distribute it to all members with an email-address. I also want to thank my friends and family for supporting me in this journey. A special thanks to Jonathan for guiding me in this research process.

# Appendix 1

## 6.1. Enkät om friluftsliv

Den här enkäten används som underlag för en mastersuppsats inom Miljöpsykologi på Sveriges lantbruksuniversitet. Genom att svara på enkäten godkänner du att resultatet får användas i uppsatsen. Alla svar är anonyma och kan alltså inte kopplas till en enskild person.

Enkäten förväntas ge information om vad människor söker i naturen. Det ger underlag till planering, utveckling och kommunikation kring platser för friluftsliv.

Friluftsliv definieras här som vistelse utomhus i natur- eller kulturlandskapet för välbefinnande och naturupplevelser utan krav på tävling. Frågorna kommer att handla om besök i naturen och inte fokusera på olika typer av aktiviteter eller olika typer av natur.

### 1. Min ålder är

- 0-15 år
- 16-25 år
- 26-40 år
- 41-65 år
- + 65 år

### 2. Jag identifierar mig som

- Kvinna
- Man
- Icke-binär
- Jag vill inte svara

### 3. Min högst avslutade utbildning är

- Går på förskola eller i grundskola fortfarande

- Grundskola
  - Gymnasieutbildning
  - Folkhögskola eller liknande
  - Högskola eller universitet högst 3 år
  - Högskola eller universitet mer än 3 år
4. Jag är medlem i Friluftsrådet
- Ja
  - Nej
5. Upplever du stress
- Aldrig 1 2 3 4 5 Ofta
6. Jag vistas i naturen
- Sällan eller aldrig
  - Regelbundet
  - Ofta och länge
7. Jag söker mig till naturen främst för att (välj ett alternativ):
- Få frisk luft
  - Komma bort från vardagen
  - Motionera
  - Umgås med andra
  - Uppleva ett äventyr
  - Uppleva natur
  - Vara ensam
  - Slappna av
  - Annat
8. Hur lång tid tar det från din bostad till det naturområde du helst besöker?
- Några minuters gång (avståndet är max 300 m)
  - Upp till 30 min gång eller cykel
  - Upp till 60 minuters resa med bil eller kollektivtrafik
  - Mer än 1 timmes resa med bil eller kollektivtrafik
9. Det naturområde jag helst besöker är ett sådant område (välj ett alternativ):
- Park, trädgård eller koloniområde
  - Naturreservat eller nationalpark
  - Övrig natur med utsatta leder

- Natur utan utsatta leder
- Annat

10. Tänk på det naturområde som du helst besöker. Hur väl stämmer de olika påståenden om den platsen? Platsen är...

	Stämmer/stämmer inte
Social (möter andra, plats att umgås, lek)	<input type="checkbox"/> <input type="checkbox"/>
Kultiverad (spår av människor, konst, historia)	<input type="checkbox"/> <input type="checkbox"/>
Öppen (vyer, översiktlig, plan, rymlig)	<input type="checkbox"/> <input type="checkbox"/>
Sammanhållen (helhet, fri, en annan värld)	<input type="checkbox"/> <input type="checkbox"/>
Rofylld (stilla, tyst, avskild, ostörd, lugn)	<input type="checkbox"/> <input type="checkbox"/>
Naturlig (vild, orörd, gamla träd)	<input type="checkbox"/> <input type="checkbox"/>
Skyddad (buskage, säker, gömställe, kullar)	<input type="checkbox"/> <input type="checkbox"/>
Varierad (terräng/natur, olika sorters växter och djur)	<input type="checkbox"/> <input type="checkbox"/>

11. Beskriv med egna ord vad som är viktigast med en plats i naturen, vad ska den innehålla för att du ska vilja vara där?