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**Measuring a Caring Climate in School:
A Validation Study of the «Caring Climate Scale» in a Norwegian Setting**

BY

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Abstract

Background: A large portion of life for youth is spent in school. Building meaningful and caring relationships in these settings are therefore important for youth to develop within themselves and in society.

Objective: The primary objective of this study was to validate the Caring Climate Scale (CCS) in a Norwegian upper secondary school context. It was further investigated whether there were a variance in psychometric properties in this context and between groups.

Design: The study is a survey based quantitative study that utilized the randomized control group (N=553) of the data collected in 2017 by the COMPLETE project.

Results: Through a construct validity assessment, it was concluded that a 12 item version of the scale was psychometrically valid in a Norwegian upper secondary school context. An assessment of the original 13 item version of the scale by Newton et al. (2007) further confirmed that the 12 item version was more suitable in a Norwegian setting. Additionally, a correlation analysis of a caring climate with measures of teacher support and class satisfaction showed convergent validity of the scale as there were significant associations between the measures. The 12 item CCS also suggested measurement invariance between genders and socioeconomic status (SES), even with a low N in the upper category of SES.

Conclusion: Results indicated that a 12 item version of the scale was more appropriate in a Norwegian school context. Future research would benefit from further validating the scale in the same context in Norway by using the full 20 item scale.

Key words: Caring climate, Positive Youth Development, care, validity, factor analysis

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1. Introduction

1.1 Purpose

School is an intimate part of our lives from an early stage in life. As children and youth spend almost as much time in school as they do at home with their families, school creates an extension of their social circle. Knowing that a substantial part of childhood and adolescent life involves close interaction with people outside the family, the ability to understand the effects a caring climate these external connections provide can have on children and youth, becomes even more significant in future research. The purpose of this study is to contribute to the field of measuring caring climates by exploring whether the Caring Climate Scale (CCS) can be validly used in a Norwegian upper secondary school setting among youth. By using a quantitative design, a factor analysis will be used to investigate what the psychometric properties of the CCS are when applied to a Norwegian context in addition to exploring any underlying dimensions of the CCS. A validation study has been chosen as previous use and validation of the CCS has been done in an international setting and might not explain Norwegian trends. The CCS has also been scarcely used in previous research, which is an additional motivator to further validate the scale. To increase reliability and accuracy of findings, a validation of data is necessary to create credibility in any research, this becomes even more significant for validation of the CCS as it is still considered a relatively new scale (Field, 2009). To identify any psychometric properties and dimensions of the CCS, a caring climate will be explored in depth to gain a better understanding of key aspects that can contribute to a more accurate interpretation of data in this study.

The thesis has its roots in an ongoing governmentally funded project that takes the CCS into use and will therefore mainly focus on investigating and validating the CCS with the data gathered in this project. The information was collected through a survey in 2017 by the COMPLETE project, run by the Department of Health Promotion and Development at the University of Bergen. The COMPLETE Program is a research project investigating the effects of two interventions, the Dreamschool and Presence Team. The goal of this intervention is to create a health promoting school program in secondary and upper-secondary school in Norway. The purpose of the program is to aid in improving well-being and creating a better psychosocial climate in school to prevent students from dropping out (Larsen et al., 2011-2016; Larsen, 2016; Voksne for barn, 2017). As this study originates from the COMPLETE project, it also aims to contribute to existing findings through the validation of the CCS in Norway.

1.2 Background

While the lifestyle of Norwegian youth seemingly has developed in a positive direction with less criminal activity, less drug use and improved academic success, there are also indications of an increase in mental health issues (Helsedirektoratet, 2013; Folkehelseinstituttet, 2018). In 2014 (Holen & Waagene) there was an average of 15-20 percent of children and adolescents in Norway with severe enough mental difficulties that affected their wellbeing, learning abilities, daily activities and socialization with others. In 2019, Bufdir reported that approximately 20% of girls and 7% of boys in junior high school experience psychological difficulties, while 29% of girls and 11% of boys experience psychological difficulties in high school in Norway (Bufdir, 2019). Before puberty, boys are more at risk for developmental physical disorders (ADHD, autism, Tourette's syndrome, etc.) while girls are more at risk for psychological disorders (depression, anxiety, eating disorders, etc.) after puberty (Folkehelseinstituttet, 2018). From 2011 to 2016, there was an increase in psychological diagnoses at the Adolescents' Psychiatric Polyclinic Services (BUP) in Norway from 5 percent to 7 percent among girls between the ages of 15 and 17 years of age (Holen & Waagene, 2014; Folkehelseinstituttet, 2018). This decline in mental health, despite seeing such an improvement in academic success, can be attributed to the emerging high ego-involving climate where the significance is placed obtaining success and competition rather than a task-involving climate where the emphasis is on developing themselves through learning, cooperation, personal growth and effort (Miulli & Nordin-Bates, 2011). If more attention is given to results rather than improvement, there may be higher pressure surrounding academic success among youth where students are forced to perform at high standards due to the competitive and pressure-involved tendencies the ego-involving climate is sustaining (Miulli & Nordin-Bates, 2011; Hogue, Fry & Fry 2016; Helsedirektoratet, 2013). This may jeopardize the health promoting aspect of schooling where students get to participate actively, build resources and life mastery through positive interactions in the class climate (Folkehelseinstituttet, 2018). Positive relationships among students and between students and teachers are therefore very important in youth development to promote mental wellbeing and motivation (Holen & Waagene, 2014; Zhao & Li, 2016). To understand this connection, the concept of health promotion and care will be further explored in this chapter.

1.3 Concepts

1.3.1 Health promotion

Health has been a heavily disputed concept over the last decades with several definitions across fields and specializations (Braut, n.d.; Green, Tones, Cross & Woodal, 2015; Nordqvist, n.a.; Saylor 2004). For the purposes of this study, I will be using the World Health Organizations (WHO) definition of health. WHO defines health as “a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity” (1978) whereas for example the biomedical field would define health according to the absence of illness (Julliard, Klimenko & Jacob, 2006). These different definitions can lead to conflicts when trying to agree on a common goal. The need for a commonality on the understanding of health and how to work towards a positive outcome has been one of the contributing factors to the growth of health promotion as an area of expertise.

Health promotion is considered a relatively new field with the purpose of enabling people to take control over their own health through building resources (Green et al., 2015; WHO, 1986). This purpose was the result of the Ottawa Charter that was established in 1986 after a meeting in Canada and was inspired by WHO’s definition of health, the Alma Ata Declaration and the Lalonde Report (Fertman & Allensworth, 2010; Potvin & Jones, 2011). Further development of health promotion has since been rooted in the Ottawa Charters strategies and action areas. These strategy objectives focus on “advocacy for health to create the essential conditions for health...; enabling all people to achieve their full health potential; and mediating between the different interests in society in the pursuit of health” (WHO, 1998b, p. 2). Health promotion therefore sees health as a positive concept where the social and personal resources, as well as individual physical capabilities, are emphasized (Nutbeam, 1998). Due to the growth of a diverse society, there are increasingly risks of differences and social conflicts (Battistich, Solomon, Watson & Schaps, 1997), which makes such cooperation even more important for sharing knowledge and resources.

Health promotion is an important contribution to improve wellbeing and health as it emphasizes that there are multiple dimensions that need to be considered. Instead of merely attending to the problem at hand, health promotion aims to provide the resources necessary to supply the individual with the possibility to take charge of their own wellbeing (Green et al., 2015). At a larger scale, it is also profitable for a society with a population who is empowered to support themselves rather than only leaning on governmentally funded organizations or clinics. Individuals who are equipped to sustain themselves, will not have to seek out

preventative short-term care at facilities that only focus on curing rather than finding a permanent solution (Holen & Waagene, 2014). To do this, the focus need to be shifted from the individual to society. The settings approach of health promotion is a meso level approach that centers around the social institutions and settings that contribute to health such as schools and workplaces (Green et al., 2015). By making health promoting changes to the organizational structures, administration, management and environment, the settings approach seeks to involve and align all contributors to create a mutually supportive common ground to promote health (Dietscher, 2013; Green et al., 2015). Health promotion therefore is significant in society because it acknowledges that health is a responsibility that should not just be placed on the health sector, but is a shared duty that goes beyond a healthy lifestyle (WHO, 1986).

1.3.2 Health promoting schools

WHO launched the Global School Health Initiative in 1995 as part of a settings-approach with the goal of increasing the number of schools that can call themselves Health Promoting Schools (WHO, 1998b). A health promoting school is a place that seeks to constantly strengthen “its capacity as a healthy setting for living, learning and working” (WHO, 1998b, p. 2) and “strives to provide a healthy environment, school health education and school health services” (WHO, 1998b, p. 3).

Through the Ottawa Charter and Jakarta Declaration, it was acknowledged that special attention needed to be placed in the school environment, among other, to further mobilize and implement health promotion in society (WHO, 1986; WHO 1998b). It was recognized that "health is created and lived by people within the settings of their everyday life; where they learn, work, play, and love" (WHO, 1986), which in turn fueled the settings-approach Health Settings where “community participation, partnership, empowerment and equity” (WHO, 2019, para. 1) was, and is, the main target area. In health promoting schools, this settings-approach allows for flexibility in schools being free to choose which areas of their environment to target but also requires the involvement of the community to maintain any changes that are being made and maintained (WHO, 2019).

1.3.3 School climate

In order to create health promoting schools, school climates need to be identified and understood. A school climate can be defined as “people’s subjective experiences of school life s, and the “ethos”, “feel”, “spirit” or “morale” of a school” (Crown, 2012, p. 2). A school

climate is based upon patterns of all its contributing individuals (students, parents, school personnel) and their experience. It reflects norms, values, relationships, learning and teaching, goals and organizational structures (National School Climate Centre, 2007). While it is a broad term, it is important to distinguish between a school climate and school culture, as a climate refers to the psychological aspect and culture refers to the anthropological feature (McNeil, Prater & Busch, 2009). In other words, school climate is about how things are organized and how things are felt, while school culture is more about how things are done and attitudes of the given district or area (Crown, 2012; Moran, Carlson & Tableman, 2012).

1.3.4 Care

As with the definition of health, several definitions of care exist within the disciplines. For this study, the definition by Care Ethics Scholar Nell Noddings will be used. Care is the shift of focus and attention give to an individual, feeling with the individual and the actual physical caretaking on another (Noddings, 1984). Care is one of the principal domains of happiness (Noddings, 2003). It is the attending to other peoples need or providing a sufficient explanation as to why those needs cannot be met (Noddings, 2001). While care is a positive feeling of someone liking you, it is also most importantly a continuous effort to create competence by helping an individual to flourish by not only aiding for the sole purpose of feeling good yourself, but for the person cared for to feel good (Noddings, 1995; Noddings, 2001). Therefore, care is the ability to recognize and decipher what the other individual is experiencing and feeling as close to their reality as possible (Noddings, 1984).

1.4 Caring climate

1.4.1 Defining a caring climate

A caring climate is in this study best defined as “the extent to which individuals perceive a particular setting to be interpersonally inviting, safe, supportive, and able to provide the experience of being valued and respected” (Newton et al., 2007, p. 70). As with “care”, it is not just a feeling, but an active participation in the environment in order to increase perception of self and the ability to learn how to cope with emotions for oneself, in addition to assisting others in doing the same (Fry et al., 2012).

1.4.2 Why is a caring climate particularly important in school

Youth have a basic psychological need of belonging (Battistich et al., 1997). This need is associated with biological aspects such as cognitive processes, emotional patterns, way of behaving and well-being (Osterman, 2000). Due to this, there is not just one or a few factors that play an important role to the experience of belonging and contribution to class environment. A review of several articles on school climates done by Cohen, McCabe, Michelli and Pickeral (2009) suggests that aspects of school life that shape a school climate can be divided into four main aspects; safety, relationships; teaching and learning; and the external environment (p. 182). If students are met with a negative emotion or experience in one or several of these aspects, there is a higher likelihood of them participating in destructive behaviors such as smoking, drug use, early sexual activity and alcohol consumption (Nutbeam, Smith, Moore & Bauman, 1993). One example that many students struggle with, is bullying. This can have an effect on several of the aspects of a students` school life as it can lead to anxiety, depression and post-traumatic stress (Breivik et al., 2017). As a result, the student can suffer from difficulties learning due to concentration-, motivation- and memory problems (Breivik et al., 2017). A caring climate in school is particularly important because the quality of relationships and perception of support is associated with autonomy, emotional regulation, self-esteem, motivation and growth of personal identity (Osterman, 2000). This means that teachers in particular, are important role models in school, and aid students in more than just learning the material that is presented. Teachers potentially help guide students in the socialization process and to build a caring relationship between each other, and most importantly themselves (Noddings, 1995; Noddings 2005). A caring climate in school can be significant to the development process of youth. If basic psychological needs are met, they are more inclined to bond with the school, which can aid in them identifying with and behaving in accordance to any goals and values present in the school environment (Battistich et al., 1997).

1.4.2.1 Caring climate in Norway

In Norway, the law of education secures youth in Norway free education up through high school level. This law covers many areas of the education, but also places an importance on students being able to develop resources to master life and skills to participate in the community later on (Kunnskapsdepartementet, 1998). While this has been a purpose for educational institutions by law for two decades, it is not until the last few years that the school climate has received an increased amount of attention (Utdanningsdirektoratet, 2016). Studies done by The Norwegian Directorate for Education and Training in 2016 show that there has been a decrease in physical

bullying in Norwegian schools, but also an increase in psychological bullying among students (Utdanningsdirektoratet, 2016). To combat these issues, health promoting school initiatives such as Zippys friends, the Dreamschool and Olweusprogram are working to promote well-being, empowerment and provide students resources to handle stressful situations (Folkehelseinstituttet, 2018).

Zippys friends is a program developed for children between 6-8 years old and is instigated to teach the children how to master daily conflicts, identifying and communicating emotions in addition to exploring ways to manage them (Veia, 2004). By using stories and scenarios, the children are challenged to problem solve with role playing games and exercises to stimulate them intellectually. This program has also been used in other countries such as Denmark, Lithuania and Ireland (Veia, 2004). The Dreamschool is a program developed for youth in secondary and upper-secondary school to increase the psychosocial climate in school by involving students and teachers in implementation of positive, reinforcing measures (Holsen, Larsen & Årdal, 2016). Student mentors are there to strengthen the bond between other students and teachers, while teachers receive a strengthening competence training in how to develop a good learning environment (Holsen et al., 2016). The dreamschool is part of the COMPLETE project in which this thesis has its background in. The Olewusprogram is a prevention program against bullying designed for elementary, middle and junior high school students (Regionalt kunnskapssenter for barn og unge, 2019). It tackles issues on an individual, group and school level by restructuring the school environment and providing the necessary interventions on each level that is required to decrease bullying and antisocial behaviors (Regionalt kunnskapssenter for barn og unge, 2019).

1.4.2.2 Caring climate in the United States

Like in Norway, a caring climate has received a growing interest in the United States (US) for the last two decades (National Institute of Justice, 2018). The U.S. Department of Education, Center for Disease Control and Prevention, Institute for Educational Sciences and State Departments of Education have started placing an increased focus on implementing measures to improve the caring climate in US schools (Thapa, Cohen, Guffey & Higgins-D'Alessandro, 2013; National Institute of Justice, 2018). Nonprofit organizations such as the National School Climate Center (NSCC) provide educational services about school climates and promotion of healthy school settings, research and prevention programs (National School Climate Center, n.d.). Educational institutions such as Brown University has established the Equity-Centered School Climate Initiative based upon the National School Climate Center framework. This

initiative is to assist school districts, individual schools and state departments of education in providing information and developing strategies for improving the school climate to aid in improved student learning (Brown University, 2019). Harvard initiated the School Climate Committee Strategy to for middle school and high school to focus on the reduction of bullying, developing positive social norms and to aid in teaching children to be more respectful and caring (Harvard, 2018).

2. Theory

This chapter will draw upon several theoretical direction to demonstrate and clarify the basis for the current study: Positive Youth Development theory is the overall framework, Care Ethics will be discussed as the specific theory for a caring climate, and validation theory of quantitative studies.

2.1 Positive Youth Development (PYD) theory

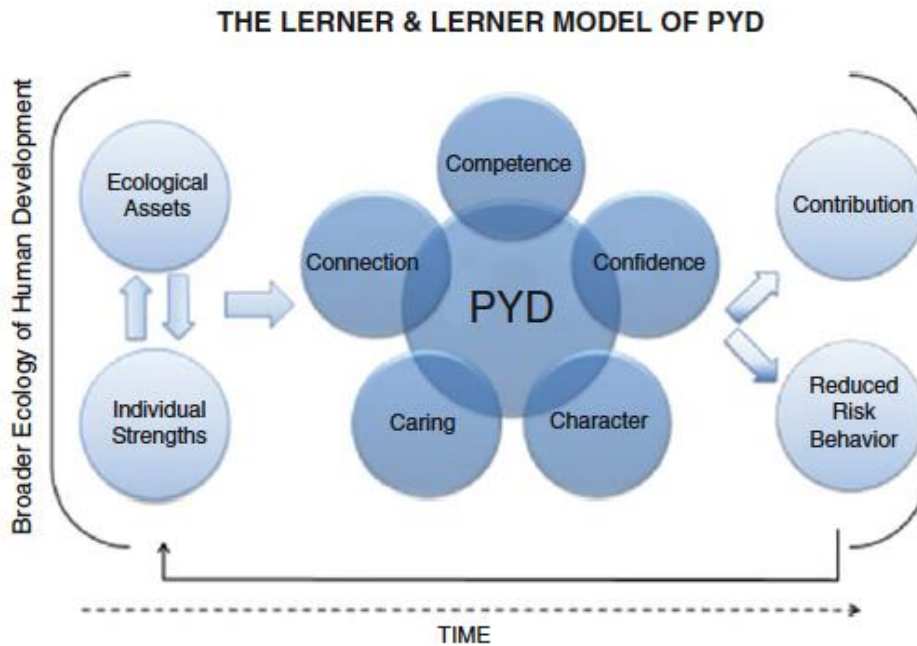
2.1.1 What is PYD theory

High school is a place for learning and growth. Despite this, a large percentage of students experience this period as challenging and struggle academically (Chase, Warren & Lerner, 2015). If not addressed, these challenges can further develop into a state of psychological distress, which might extend to a higher risk of unemployment, sick leave and disability insurances when the youth enters the adult world (Helsedirektoratet, 2013). Positive youth development (PYD) is a theoretical framework that places an emphasis on the strengths of youth and was developed in response to the focus on single problem behavior (Catalano et al., 2019) and the traditional youth development approach (Damon, 2004). There was a consensus among scientists, practitioners and policymakers that there was an underestimation of youth due to the focus on their deficits rather than development potential (Damon, 2004; Catalano et al., 2019). The main focus of PYD has been to identify developmental assets and constructs of the framework through distinguish between constructs and clarifying components that are essential (Catalano et al., 2019).

With roots in life-span developmental psychology, bioecological developmental psychology, life course sociology, community psychology and more, PYD theory emphasize plasticity and promotion of outcomes that are valuable instead of just the prevention of negative behaviors (Lerner, Almerigi, Theokas & Lerner, 2005). While there are various theoretical views of the PYD process, a commonality is the emphasis placed on a relational and developmental systems thinking with a keen interest in the relations between the individual and context (Lerner, Lerner & Benson, 2011). PYD theory is based on the idea that children and youth who experience a positive and beneficial relationship with the individuals in their surroundings, will experience an improved future with contributions to themselves, their family, community, and society (Lerner et al., 2005). In order to achieve these positive contributions, Lerner et al. (2005) identified five important factors that need to be met in everyday life - competence, confidence, connection, character and caring – also more commonly known as the

Five C's Model of PYD (Lerner et al., 2005; Larsen, 2016). See Figure 1 for a visualization of the relational, developmental systems model of the individual ↔ context relations including the Five C's used by Lerner et al. (2005).

Figure 1. Five C's PYD Model (Bowers, Geldhof et al., 2015, p. 4)



2.1.2 The Five C's Model of PYD

Care is one of the Five C's of Lerner et al. PYD framework. While a variety of theoretical views of PYD theory exists, the Five C's Model of PYD has been a key approach when attempting to comprehend PYD (Lerner, Lerner & colleagues, 2016). According to Bowers et al., (2010) the Five C's Model of PYD is the framework that is most empirically supported, where a review of previous research showed that the construct contains good psychometric properties. In addition to this, each of the Five C's - competence, confidence, connection, character and caring – showed a good internal consistency (Bowers et al., 2010). Competence manifests itself as a positive view of one's actions in specific areas; Confidence is having an internal sense of overall positive self-worth and self-efficacy; Connection refers to positive bonds with people and institutions; Character points to an individual's respect for societal and cultural norms; and Caring is an indication of a person's sense of sympathy and empathy for others (Lerner et al., 2005; Bowers et al., 2010; Conway, Heary & Hogan, 2015). If these C's are utilized and the strength of youth are systematically aligned with positive resources that can aid in a personal growth, the positive development that occurs can be operationalized by the Five C's. The idea is that if high levels of these Five C's are combined, they can result in a sixth C, contribution (Bowers et al., 2010;

Conway et al., 2015; Larsen, 2016). The thought is that youth who exhibit high levels of competence, confidence, connection, character and care, are more likely to feel successful in addition to having skills, motivation and resources to contribute “in some way to the key settings and people in their lives” (Callina, Mueller, Buchingham & Guterrez, 2015, p. 77). Evidence from the longitudinal 4-H study of PYD shows that the sixth C is one of the major outcomes of PYD, which shows that investment in PYD can help youth transition to adulthood in a successful and beneficial way (Bowers, Geldhof et al., 2015; Catalano et al., 2019).

2.1.3 The Care C of PYD

The PYD theory is a framework that inspires this paper through its focus on the interaction between context and setting. For this purpose, one of the C’s of the Five C’s model is particularly important, care. Research has shown that youth who have relationships with adults who are caring and committed to them, are one of the most important assets when attempting to promote a PYD across different contexts (Bowers, Johnson, Warren, Tirrell & Lerner, 2015). Additionally, it can aid in lowering levels of risk behaviors. To have a positive outcome, these relationships need to be characterized by an emotional attachment; reciprocal connectedness through support and guidance aligned with the developmental level of the youth; the relationship need to show a progressive complexity in behavioral pattern; and a balance of power as the youth develops (Bowers, Geldhof et al., 2015).

School mates and teachers have an important role in promoting both academic achievement and school engagement (Donlan, Lynch & Lerner, 2015). When positive and supportive relationships are present, there are opportunities for youth to practice social and cognitive skills in addition to achieving a sense of belonging in school, which are predictors of academic achievement and well-being among youth (Donlan et al., 2015). While all the C’s in the Five C’s model can be linked to relational quality youth have with their peers, care in particular can help youth develop meaningful relationships that teaches them character and sympathy (Noddings, 2002; Donlan et al., 2015).

2.2 Care Ethics

2.2.1 What is care ethics?

Care ethics is a moral theory that imply the existence of moral importance in the basic components of relationships and human dependencies (Sander-Staudt, n.a.; Robinson, 2018).

With roots in feminist and political philosophy, moral psychology and philosophical ethics (Dijke, Nistelrooij, Bos & Duyndam, 2018), care ethics is a relational ethic that values moral emotions and places a significance on adapting to the perspective of the individual receiving care, as well as care givers (Dijke et al., 2018). Ideally, care ethics tries to promote well-being and health by motivating individuals to involve themselves in social relations, caring for other people in need and making sure their own needs are met while doing so (Sander-Staudt, n.a.). Dijke et al (2018) distinguished four characteristics of care ethics:

(a) it is a relational moral approach that starts from a relational ontology and anthropology; (b) it is grounded in an epistemology that places a high value on emotions and alternative knowledge sources such as practical, tacit, or embodied knowledge; (c) it uses a normative model of moral deliberation that is primarily based on particularism and contextuality; and (d) it is a political approach with high awareness of the power dimensions implicated in care (p. 3).

2.2.2 Care ethics and character education

The main focus of this paper is Nell Noddings` care ethics, however, a brief description of character education will be done as care ethics is considered an alternative to character education (Noddings, 2002). This means that both theories hold similar ideas, but with a different focal point. Character education is mainly trying to instill virtues that are considered desirable for society, while care ethics are trying to create an environment that supports a moral way of living (Noddings, 2002). Since “character” is defined “as the possession and active manifestation of those character traits called virtues” (Noddings, 2002, p. 3), it is believed that an individual who is taught the correct values, are more inclined to act accordingly when the situation calls for it in character education (Baehr, 2017; Noddings, 2002;). A brief visualization of the differences between care ethics and character education is presented below in Table 1.

Table 1. Visual Comparison of Care Ethics and Character Education (Noddings, 2002)

Care Ethics	Character Education
Relation centered	Agent centered
Caring relation	Caring virtue
Establishing caring conditions	Establishing a caring value
Stories; favor problematizing ethical decisions and arouse sympathies.	Stories; favor heroes and inspirational accounts

2.2.3 Nel Noddings` care ethics

Nel Noddings is a feminist and philosopher of education whose care ethics emphasizes care as the base principle of developing morals and values (Tong, 2005). She defines caring as the attending to needs, opinions and expectations of other individuals through engrossment; an act where the individual who is caring for another displace any selfish motives and attempts to put themselves in the place of the other to provide the type of care that they require (Sander-Staudt, n.a., para 4; Engster, 2004). While natural care normally happens within close circles of friends and family that are engrossed with one another, it can also be extended outside of these circles through ethical caring if the individual chooses to do so by recognizing it as the moral thing to do (Engster, 2004, Noddings, 2012b). A great importance is therefore placed on not passing judgement due to the variation of individuals` experience of situations – care must therefore be applied depending on the context and situation (Sander-Staudt, n. a.; Engster, 2004). As mentioned earlier in this chapter, individuals who are taught the values that reflect ones society, are therefore more inclined to act accordingly when a situation arises, thus extending care and not passing judgement (Noddings, 2002; Engster, 2004)

2.2.4 Care ethics in school

While schools include care and compassion as a highly regarded characteristic to be developed, the current models of ethics in education mostly place emphasis on societal duties including the reward and punishment system (Noddings, 2003; Shelby, 2003; Noddings, 2012a). There is a favored opinion that students need academic training to fulfill a quota of what their countries

need, or that academic achievements and preparation will prevent people from ending up in poverty, participating in criminal activity and other negative influences to society (Noddings, 2002). What often is forgotten is that the issue of poverty is a social issue. Students engaged in an education system that guide them in how to care for oneself, others and the environment, might be able recognize the capacity and capability of humans and their interests and improve this social issue (Noddings, 2002).

Noddings suggests six approaches that need to be taken to move towards an education that emphasize care and care ethics; (1) be clear in the aim of educating competent, caring, loving and loveable individuals; (2) caring for the needs of students and teachers; (3) allowing a balance of responsibility among teachers and students by reducing competitive grading and testing; (4) removing hierarchical curriculums so all students are entitled to the same richness; (5) creating an open agenda to discuss themes of care; and (6) teach that caring enhances competence due to acceptance of responsibilities (Noddings, 2002). Having a reference point in which data can show a positive or negative trend can illustrate whether the approaches might need adjustments to achieve the intended level of care. Obtaining a tool that measure the concept of a caring climate would therefore be helpful in assessing the development and implementation of these suggested approaches, as well as other approaches to promote a caring climate.

2.3 Caring Climate Scale (CCS)

Care in PYD theory and Care Ethics all have one thing in common; they build upon relational connections to teach youth sympathy, empathy and morals (Noddings, 2002; Dijke et al., 2018). As school occupy such a central role for youth, the climate each institution contains will impact and influence its students a great deal. Assuring a caring climate through a caring social connection among youth and the adults is an important factor. To understand these connections, more research and development of good measures of a caring climate need to be culminated.

The theory behind the CCS is Nicolls' theory of achievement motivation (also called achievement goal theory) where the attention is placed upon understanding why someone wants to reach a goal instead of how to achieve it (Maehr & Zusho, 2009); Nell Noddings research on care and care ethics in school where engrossment in the cared for and teaching of morals are promoted (Noddings, 2002); and Battistich et al. scales on assessment of sense of community. Additionally, the CCS argues that a task-involving climate is separate from a caring climate as

it emphasize individual improvement and is mainly focused on achievement, but that it positively should relate to a caring climate (Newton et al., 2007).

The CCS was developed in 2007 by Newton et al. to better measure a caring environment in the physical activity domain. More specifically, “the CCS assesses the extent to which individuals consistently perceive a particular setting to be interpersonally inviting, safe, supportive, and able to provide the experience of being valued and respected” (p. 72). After Newton et al. (2007) had reviewed previous research concerning care and caring climates, a 30-item scale was initially developed. After reviewing the scale, 10 items were removed based upon the clarity, simplicity, the extent each item was reflecting the framework, and whether the scale was consistent. An exploratory factor analysis (EFA) was performed on the remaining 20-items that revealed 6 items below the accepted criterion. After the removal of these, the internal reliability was tested on the 14 items within the criterion by using Cronbach’s alpha. With a coefficient of $\alpha = .92$, it was concluded that the revised 14-item scale had a strong internal reliability in measuring a caring climate (Newton et al., 2007).

In a second study, a confirmatory factor analysis (CFA) was used on the 14-item scale to confirm findings during the first study (Newton et al., 2007). While performing the statistical analysis of data, it was discovered that one of the items only reflected a general caring climate and had similarities with other items of the scale. It was therefore removed from the scale before another CFA was conducted. Results indicated that the new 13-item scale was a better fit for the structure of the model, hence measuring a caring climate more adequately (Newton et al., 2007).

2.4 Validation Theory

2.4.1 What is validity

Validity is a wide topic that consists of several research aspects. Validity is additionally one of the key factors in a psychometric study (Buntis, Buntis & Eggert, 2017) and refers to whether researchers and their instruments are able to measure what is intended and not some other construct (Green et al., 2015). While it appears a simple concept, validation theory has been, and still is, a heavily debated topic among researchers due to its “correspondence between scientific language and common psychological concepts that are used in everyday language” (Buntis et al., 2017, p. 708). The concept of validity has developed from being narrow and evidence based (traditional), to becoming complex and broad (contemporary) (Wolming & Wikstrom, 2010).

This sparked a lot of disputes between researchers who argued in favor of the development of validation theory, while others criticized it as being too complex to be practical. The 1999 and 2014 Standards were published by the American Educational Research Association, American Psychological Association and National Council on Measurement in Education. These Standards only separated the concept of validation theory further from one another towards a traditional and contemporary view (Wolming & Wikstrom, 2010; Widodo, 2018). The traditional concept of validity is encompassed as the property of the instrument, being valid or invalid, employment of statistical analysis, reliability as a condition and the use of four types of validity (Widodo, 2018); while the contemporary concept of validity is referred to as an inference of scores, a continuum, an elaboration of theories and methods, construct validity as its core, and testing of consequences (Widodo, 2018).

The purpose of validity is to give credibility to a study by showing authenticity of the findings that were done by demonstrating reliability of the outcome (Creswell, 2013; Green et al., 2015). Reliability refers to whether results in a study are consistent and replicable regardless of how, when and where the study is performed (Green et al., 2015). This means that the scale that is being used should be as free of any random errors as possible (Pallant, 2016).

2.4.2 Types of validity

As mentioned earlier in this paper, validity is a concept that is constantly under debate among researchers. Due to the complexity of a study, validity is used in several facets and will be broken down for an increased understanding of validation theory. Experimental validity is assessing the quality of a quantitative study and its procedures, while test validity attempts to evaluate the quality of the instrument that has been used in the research (Winsett & Cashion, 2007).

2.4.2.1 Experimental validity

The experimental validity is an overall evaluation of the research design and its ability to provide valid and reliable evidence by looking at internal- and external validity (Polit & Beck, 2010). Internal validity is “the extent to which study results are truly the results of the study and not a product of influences outside the study” (Winsett & Cashion, 2007, p. 639). When analyzing the internal validity of a study, the following elements are taken into consideration; a temporal precedence of cause occurring before the effect; that there is a covariation between the two variables; and eliminating any plausible explanations, such as a third variable, for the observed relationship (Cozby & Bates, 2015). Some threats to internal validity includes historical events,

maturation, testing effects, instrumentation (reliability of measurement instrument), statistical regression, selection bias, mortality, diffusion of treatment, compensatory equalization/rivalry, resentful demoralization (Winsett & Cashion, 2007; Polit & Beck, 2010)

External validity is “the extent to which study findings can be generalized to other groups of patients” (Winsett & Cashion, 2007, p. 639). When evaluating external validity, an importance is placed on adequacy of sampling plan, but most importantly replication. If the research design can be replicated across time, space, people and setting, it is said to have a higher external validity (Polit & Beck, 2010). Some threats to external validity includes; subjects entering the study due to the accessibility to become a subject; the impact of the environmental culture in the study setting; and any events that may influence the study results in a way that may make the results less replicable or generalizable (Winsett & Cashion). It is important to note that internal and external validity generally are conflict with one another; this means that a study that is high in internal validity, might be low in external validity if there is tight control of the setting by the researcher (Polit & Beck, 2010).

2.4.2.2 Test validity

When attempting to validate a scale, researchers need to fulfill certain criteria – types of validity – in order to assure validity and credibility. The more types fulfilled, the stronger the instrument can be considered. There are four main groups of types of validity that can be achieved with the relevant evidence; face- , content- , construct- and criterion related validity. Nunnally & Bernstein (1994) argues that there are three main types of validity; content- , construct- and criterion related validity. They argue that face validity is an assessment after constructing an instrument that offers evidence neither for or against the use of it, but rather is a benefit in achieving acceptance from users and test takers (Nunnally & Bernstein, 1994) See Table 2 below for a general overview of the types of validity including a definition and example related to the CCS.

Table 2. *Types of Validity (Cozby & Bates, 2015; Field, 2009; Polit, 2009)*

Type	Definition	Example
Face validity	Content reflects the measured construct.	The CCS measuring a caring climate contains items pertaining to care.
Content validity	Content is connected to other themes that defines construct measured.	The CCS contains items from several domains related to care.
Construct validity		
- <i>Convergent validity</i>	Score on measure is related to other similar constructs.	Scores from the CCS are related to other measures collected at the same time.
- <i>Discriminant validity</i>	Scores on the measure are not related to other constructs considered theoretically different.	The CCS are not related to measures collected at the same time.
Criterion related validity		
- <i>Concurrent validity</i>	Scores on a measure are related to another measure when concurrently tested between groups.	The CCS are tested between two groups such as genders simultaneously.
- <i>Predictive validity</i>	Scores on the measure predict behavior on a criterion measured at a future time.	The CCS can predict whether a climate will be caring in the future.

2.4.3 Reliability

While validity is an important aspect of a study, reliability also need to be considered. Reliability is whether the interpretation of an instrument is consistent when used in different situations (Field, 2009). A high reliability of an instrument indicates a lower amount of error in the obtained scores, yet high reliability does not necessarily provide evidence for the validity of an instrument (Polit & Beck, 2010). If results are showing consistent scores over different situations, yet the score is not measuring the attribute we are trying to measure, then we can say that the measure is reliable, but not valid, as it is measuring another characteristic than intended.

There are two ways that reliability can be measured; temporal stability and internal consistency (Pallant, 2016). The temporal stability of reliability is measured by a test-retest procedure and assess the correlation between two scores that have been obtained by the same individuals on two different occasions (Cozby & Bates, 2015). If there is a high correlation, the scale is considered to have a high reliability. Internal consistency is the relevant type of reliability in this study and is the extent that the items that the scale is made up of, all are measuring the same characteristic (Pallant, 2016). This can be evaluated by assessing the Cronbach`s alpha statistic

that presents a value of correlation from 0 to 1. While the normal recommendation is that values above .7 are considered a strong correlation, it is important to take into account how many items that comprise the scale and analyze the correlation accordingly (Cozby & Bates, 2015; Pallant, 2016; Polit & Beck, 2009).

2.4.4 Validity in this study

In the development of the CCS, the researchers (Newton et al., 2007) found a strong internal reliability with a coefficient above .9 in addition to correlational support for the scale containing convergent and discriminant validity. While the creators of the CCS already validated their scale and removed elements from that were not applicable for further use, the removed elements have been used in the COMPLETE study. Due to this being a validation study of the scale used in a Norwegian setting, it is practical to approach the validity aspect of the scale in the same manner that the creators did by looking at the convergent and discriminant validity of the scale to adjust the scale accordingly.

3. Literature Review

3.1 Approach

In order to acquire relevant literature on the Caring Climate Scale (CCS) and Positive Youth Development (PYD), the data bases of Oria (University of Bergen's own literature search platform), Web of Science and PsychINFO were used. First, a simple search in Oria was done using search combination «(Positive Youth Development AND Caring Climate AND School)» in addition to limiting the search to peer-reviewed articles from the last 8 years. The results were 3 787 hits that contained few relevant articles connecting PYD theory to the CCS. With a similar search combination, «(Positive Youth Development AND School AND Climate)», Web of Science had 34 hits that were more relevant than those found in the Oria search. Due to the variation between the websites, another separate search of «(Caring Climate Scale)» was then executed in Oria to clarify the extent to which the CCS was being used in both current and present research. With 27 hits, where several relevant articles were found, the search aided in further developing a search strategy that could assist in the literature search.

Subsequent to the searches made, a more complex combination was employed in Web of Science with a limitation of articles up to 8 years old. The search «(Caring OR Care* AND Climate OR Environment AND Youth Development AND Scale OR Measure* AND School OR Education)» came out with 56 hits. After further adjusting the search to contain “Positive Youth Development” instead of “Youth Development”, the results were limited down to 11 hits where most of the articles were relevant to this study. Despite an overwhelming hit in the initial search, important articles regarding the CCS such as *Psychometric Properties of the Caring Climate Scale in a Physical Activity Setting* by Newton et al. (2007) and *Exploring the Connections Between Caring and Social Behaviors in Physical Education* by Gano-Overway (2013), was found. The reference list found in these, and other, articles through the literature search proved to be very useful in further exploration of relevant literature.

3.2 Validity of CCS

3.2.1 Development of the CCS

The purpose of developing the CCS came from the need to measure a caring climate that was exclusively created for a physical activity domain (Newton et al., 2007). The researchers divided the development of the scale in two parts where the first study mainly focused on the

scales structure and establishing face-, discriminant- and convergent validity. The second study attempted to further validate the scale and its final structure through convergent validity. Both studies were conducted on youth that were enrolled in the National Youth Sport Program (NYSP). When developing the initial factor structure in study 1, the CCS had 30 items, but before the initial data collection, experts within sport psychology had reviewed the items and examined them for consistency, operational definition, quality and simplicity. This led to a 20 item version of the scale. Newton et al. (2007) then proceeded to collect data from a group of 353 participants (N = 214 were boys) between the age of 9 to 17 years ($M_{age} = 12.18$). This was done in small groups without NYSP personnel present during the fifth and final week of camp. The participants were given one out of two developed questionnaire packets as a counterbalance measure to reduce bias. Once data was collected, an EFA was performed to identify any factor structures and item suitability. After initial EFA assessment was completed, Newton et al. (2007) forced a single factor solution with cutoff criterion of .55. Results indicated that an additional six items were best removed to optimize the scale. The remaining 14 items showed an internal reliability (Newton et al., 2007).

Study 2 utilized the revised 14 item version of the scale to perform a CFA once data was collected from another NYSP in which there were 395 participants (N = 198 were girls) between the age of 9 to 16 years ($M_{age} = 11.80$) (Newton et al., 2007). The purpose of the second study was to confirm the factor structure from the first study as well as further assess the convergent validity of the scale. Fit indices were utilized to determine the fit of the factor structure, normality of data was tested and bootstrapping was applied. Based upon modification indices and a review of items, one item was removed from the scale before convergent validity was explored. The 13 items showed a strong internal reliability and supported convergent validity (Newton et al., 2007).

3.2.2 Validation of the CCS

The CCS has been around since 2007, yet the research found during the literature review demonstrates that there is still not sufficient studies that have taken the scale into use. Currently, most research implementing the scale have conducted variance and regression analyses, correlation analyses, multivariate analyses and SEM analyses (Newton, Watson et al., 2007; Gano-Overway, Newton, et al., 2009; Fry & Gano-Overway, 2010; Fry, Guivernau et al., 2012; Gould, Flett & Lauer, 2012; Gano-Overway, 2013; Brown & Fry, 2014; Brown, Volberding, Baghurst & Sellers, 2017; Fontana, Fry & Cramer, 2017; Hogue et al., 2017; Newland, Newton, Stark, Podlog & Hall, 2017; Brown, Fry, Wilkonson, Breske & Iwasaki, 2019). While none of

these studies mention that their purpose is to validate the scale, they contain elements of construct and criterion related validity. Only one study specifically performed a validation study of the CCS by utilizing an EFA and CFA on the data in a Turkish physical education setting among university students (Cetinkaya & Mutluer, 2019). This international study was applied in an older population than the scale was developed for, and used the 13 item version of the CCS instead of the full 20 item version of the scale. Despite this, the results indicated evidence of criterion related validity through the correlation values between the CCS and the Athletic Identity Measurement Scale that also was utilized with a value of $r = .482$, $p < 0.01$. Additionally, there was evidence suggesting construct validity of the scale in a Turkish setting after having performed the EFA and CFA on the data. It is important to note that the Turkish study was utilizing lower cut off criteria, .3, (Cetinkaya & Mutluer, 2019) than was done in the original scale by Newton et al., (2007) .55.

The first study using the CCS after its development, was a study by Newton, Watson et al. (2007) that conducted a preliminary study the same year as the CCS was developed that intended to assess the variance between a caring based and traditional curriculum. The purpose was to examine whether this difference had an effect on the perception a participant might have of a caring and motivational climate, enjoyment, expected future participation in the National Youth Sport Program (NYSP) and empathy. Results of a One Way Analysis of Covariance (ANCOVA) and One Way Multivariate Analysis of Covariance (MANCOVA) suggested that participants from the caring group perceived their climate to be more caring than ego-involving. Additionally, the caring group reported a higher level of empathy and thoughts on future involvement in the sport program (Newton, Watson et al., 2007). In a middle school physical education class, Hogue et al., (2017) examined stress responses in a caring climate, task involving climate and ego involving climate through measuring saliva cortisol to assess the effect on mental and physical health. Participants in the ego involving group elicited more hormones in their saliva and the climate was more associated with negative affect, anxiety, shame and a greater sense of humiliation. The caring and task involving climate responded more positively with higher feelings of enjoyment (Hogue et al., 2017).

Another study by Gano-Overway, Newton et al. (2009) utilized the CCS in a study using the sport program (NYSP) at a later point in time. It was intended to assess any influence the perception of a caring climate has on prosocial and antisocial behavior through positive and negative affective self-regulatory efficacy (ASRE) and empathic self-efficacy (ESE). This was done by using a SEM model with item parceling that was determined through a CFA analysis of the items. Results supported previous research where a caring climate can aid youth in

understanding and dealing with their positive and negative emotions through self-efficacy (Gano-Overway, Newton et al., 2009). These findings were also reinforced in a later study where the effect of ASRE on the relationship between a perceived caring climate and psychological well-being was being examined (Fry, Guivernau et al., 2012). Further adding to the research on a caring climate and prosocial and antisocial behaviors, Gano-Overway (2013) investigated the relationship between a caring climate, empathy and prosocial and antisocial behaviors. Empathy was also assessed as a possible mediator between caring and social behaviors and was assessed for invariance between genders. As was previously establish, a caring climate was also found to associate positively to prosocial behavior and empathy and negatively to antisocial behaviors. The mediation model was also found to be invariant across genders (Gano-Overway, 2013). Furthermore, the CCS was utilized in a qualitative study where they wanted to explore the experience physical education teachers had of care within the classroom (Gano-Overway and Guivernau, 2014). The CCS was used to assess whether students of participating teachers perceived them as caring. While two out of eight teachers opted out of the interview, the study found that those two had also been the teachers perceived as less caring by the students. The findings in the study found that caring practices such as reinforcements, creating an inclusive environment, allowing students to make choices themselves and being a good role model to teach care. While there is a need for more usage of the CCS alongside qualitative data, there are indications that a perceived caring teacher can predict a higher level of caring behaviors among students in that particular class (Gano-Overway and Guivernau, 2014).

A Pearson Product Moment correlation was conducted by Fry and Gano-Overway (2010) to investigate whether a perceived caring climate would positively relate to dedication to the sport, attitudes, enjoyment and behaviors with the team and towards the coach among youth athletes from a community soccer league. Results indicated that there were moderate to strong positive correlations between a perceived caring climate and the dependent variables, as well as enjoyment being positively correlated to commitment to the sport (Fry & Gano-Overway, 2010). Gould et al. (2012) confirmed the importance of coaches and caring climates in the sport environment in multiple regression analysis where perceptions of the psychosocial sports climate, elements of climate created by the coach, and relationship between reported gains and participation were assessed. The results further highlighted the importance of how a motivating and caring climate can be an important positive developmental factor (Gould et al., 2012).

The following study additionally adds to the notion of how a caring climate can create more room for development and growth; A high school girls soccer club completed a survey to assess whether there is a relationship between perception of climate on the team to preventative behaviors and treatment of concussions (Brown et al. 2019). Results of a bivariate correlation analysis indicated that higher levels of perceived care in the team and from the coach was related to a higher likelihood of the participant to report injuries, while a participant in an ego involving climate was more likely to not report the concussion and carry on (Brown, Fry et al., 2019). Perception of a caring climate, was in a two-way ANOVA found to relate to positive approaches to classmates and teachers while also enhancing the feeling of being part of a group as well as increasing enjoyment (Newland et al., 2017).

Three studies were utilizing an adult sample in their study, yet staying within the physical activity setting. Brown et al. (2017) conducted a study at a university campus fitness facility where they were attempting to compare perception of a caring climate at the facility between groups of current, former and non-members. Brown and Fry (2014) examined whether there were any associations between a members` perception of staff, fitness setting, motivational climate, future commitment and life satisfaction. Both studies found that the climates were perceived as caring and task-involving. The last study pertains to participants perception of a caring-, task- and ego-involving climate and the relationship this climate has to a sense of compassion, pride and shame (Fontana et al., 2017). Adding to previous research on motivational climates by Newton, Watson et al. (2007) and Hogue et al. (2017), this study found evidence of caring and task involving climates being associated with high feelings of authentic pride and low levels of arrogant pride (Fontana et al., 2017). As has been illustrated above, there are several studies that have focused on applying the CCS in research, utilizing other scales to assess relationships. While this provides a great resource of validity, there is still a need to assure that the scale is validly used in the applicable domain. To do so, further validation is needed.

3.2.3 Opportunities for further validation of the CCS

The CCS has mainly been used in the physical activity domain until this study, as illustrated above. Applying and validating the CCS in other settings could therefore be an interesting focal point for further research utilizing the scale. Additionally, using the full 20 item scale instead of the 13 item version by Newton et al. (2007) would be highly recommended to confirm a suitable factor structure for the domain that is being measured. The same recommendations apply for use and validation of the scale in an international and national setting. Researchers

using the scale have mainly focused on convergent and discriminant validity of the scale, but more is needed on predictive and concurrent validity. Additionally, it is worth mentioning that the participants in the studies mainly are youth from societies with low SES (NYSP is a program for low income families from underserved populations) and majority of participants are black or African Americans (69% in study 1 and 61% in study 2) (Newton et al., 2007). These elements can contribute to a lower generalizability of results to other populations of youth as there might be differences between perception of a caring climate between ethnicities and SES groups.

3.3 CCS utilization

3.3.1 The CCS is mainly utilized in a physical activity, sport or fitness setting

As mentioned in chapter two of this paper, the CCS was developed to measure perceived care among youth in a physical activity setting by Newton, Fry et al. (2007). All articles found during the literature search where the CCS had been utilized, were studies performed in a physical activity-, sport- or fitness setting (Newton Fry et al., 2007; Newton, Watson et al., 2007; Gano-Overway et al., 2009; Fry et al., 2012; Gould et al., 2012; Gano-Overway, 2013; Brown & Fry, 2014; Stark & Newton, 2014; Hogue et al., 2017; Newland et al., 2017). Brown and Fry (2014) used the CCS to examine the associations between participants ($n = 5541$; 92% female; 90% Caucasian) perception of staff behavior, motivational climate, own behavior, commitment to future exercise and life satisfaction at a National Fitness Franchise. Gould et al. (2012) assessed the relationship between psychosocial development and perceived sports climate among 239 underserved youth (64% males; 72.2% Black) from an urban sport program by using the CCS; and Newland et al. (2017) implemented the CCS in their research exploring the relationship between caring climate perceptions and level of group connection, enjoyments and attitudes in activity courses where the participants ($n = 174$; 61.5% males; 78% Caucasian) were already enrolled. Additionally, all studies found in the literature search had been performed in the United States and mainly by authors who had been involved with the development of the scale. Physical activity is naturally something that should be valued and implemented in life, but it is not the only aspect where a caring climate plays an important role (Noddings, 2012a). Using the CCS explicitly in a physical activity setting can therefore produce unrealistic results as it only captures this facet of a school climate. In addition to this, physical activity by itself has been associated with well-being among youth (Stark & Newton, 2014), which could have an

effect on reported results due to the physical activity variable being present. While the scale was developed mainly with a physical activity environment in mind, it may also be used to assess the caring climate in a variety of contexts that are not only specific to physical activity (Newton, Fry et al, 2007). It would therefore be of great value to also use the CCS in other school settings, as well as internationally to increase its validity and reliability.

3.3.2 Perceptions of a caring climate is not significantly different between genders

Surprisingly, the studies that compare the difference in perception of a caring climate between genders, found no significance in perception. The studies that noted the lack of variance between genders, were originally trying to explore the relationships between a perceived caring climate, empathy and social behaviors in middle school physical education classrooms (Gano-Overway, 2013); investigating the relationship between perceptions of a caring psychological climate and group connectedness, enjoyment and attitudes towards classmates and the instructor in physical activity courses offered (Newland et al., 2017); and examining the effects of a caring-based vs a traditionally focused physical activity intervention on underserved adolescents' perceptions of the caring climate, the motivational climate, empathetic concern, enjoyment and future anticipated participation (Newton, Watson et al., 2007).

In these studies, a caring climate was associated with prosocial behavior, positive attitudes, enjoyment, cognitive empathy, future participation in activities and enhanced feelings of group connectedness (Newton, Watson et al, 2007; Gano-Overway, 2013; Newland et al., 2017). Gender differences were not significant when examining the perceptions of a caring climate in the task-involving and caring groups, but results in the study by Newton, Watson et al. (2007) showed that gender, ethnicity and birthplace were significant for the ego-involving climate.

3.3.3 Caring motivational climates elicits positive physical responses in youth

Studies on a caring climate was often associated with ego- and task-involving motivational climates in research found. Many of the studies considered a task-involving climate and caring climate to be indifferent from one another (Hogue et al., 2017; Newland et al., 2017). Another study separated a task-involving, ego-involving and caring climate due to the belief that task- and ego-involving climates both were promoting results and achievement instead of growth (Stark & Newton, 2014), as is the recommendation of the CCS developers (Newton, Fry et al., 2007). This study used adolescent dancers ($n = 83$ females) already engrossed in their dance

environment with the requirement of the dancer having stayed for a minimum of one year at the same dance studio. They examined the relationship between perceptions of the psychosocial climate (task-involving, ego-involving, and caring) and aspects of psychological well-being (positive and negative affect, body-esteem, and teacher and peer friendship quality). The results indicated that a perceived caring climate and task-involving climate were related to increased positive affect, body-esteem and relationship between peers and teachers, while an ego-involving climate was negatively associated (Stark & Newton, 2014). While the study indicated that task-involving and caring climates are associated to a higher well-being and greater body esteem in dancers, other research indicate an occasional rise in ego-involving climates during periods where performances are near, which in turn predicts an increase in anxiety in the dancers (Miulli & Nordin-Bates, 2011). Stark & Newton's (2014) study shows that there might be a correlation between the length of stay at a dance studio and the dancers perception of a caring climate. This can be confirmed by a study previously done by Fry and Gano-Overway (2010) that found the coach to be the key motivator for youths involvement in sports and that coaches who nourished a caring climate had fewer dropouts. It would therefore be interesting to compare shifts in the climate that affects students at different points of the semesters.

In 2017, Hogue et al. were interested in measuring the physiological stress responses in youth through the measure of salivation cortisol levels when participants were subjected to two forms of motivational climate, task-involving and ego-involving. Special importance was placed on psychological stress and stress-responsive hormones to examine psychological stress, shame and motivational responses. Task-involving climates encouraged self-improvement, cooperation and effort, while ego-involving climates encouraged success and competition. The study found that an ego-involving climate produced a significant rise in salivary cortisol levels. This produced a greater experience of humiliation, self-consciousness, shame, negative affect, and anxiety in the participants. The task-involving climate elicited lower physiological stress in the participants, who reported higher ratings of enjoyment, lower stress, positive moods and a higher effort in the tasks. A task-involving climate is therefore thought to be more protective for youth as it is associated with higher ratings of positive affect, self-confidence, effort and enjoyment (Hogue et al., 2017). While the study contained a limited sample size ($n = 47$) in a lab setting, it adds to previous studies because it is one of the few to measure the effects of a caring motivational climate physically and is an important indicator of why a caring climate should be a priority in school.

3.3.4 A caring climate predicts a favorable affective self-regulatory efficacy in youth

Battistich et al. (1997) research program that extended for fifteen years contributed to the concept of a caring climate in the development of the CCS. Their assumption was that once a community established a favorable climate where students needs are met, it would be more likely that the student would become connected to the school and therefore also more inclined to identify with its portrayed values (Battistich et al., 1997). Teachers with a strong sense of community are therefore incredibly important as role models that the student can learn from. Other research on caring climates that utilize the Caring Ability Inventory and School Climate Profile support this notion in its findings, that students prefer relationships with teachers who display a caring, warm, supportive and empathetic role modeling (Simmons & Cavanaugh, 2000). Van Boekel et al. (2016) argue that participation in school sport helps promote a positive youth development due to the facilitation of interactions between students and positive adult role models. In their study, students who participated in school organized sport build resources and relationships that allowed them to translate their gained skills to other settings (Van Boekel et al., 2016).

The importance of having a strong role model to teach students are supported by findings in Gano-Overway et al. (2009) study were they focused on exploring how care was perceived in a sport environment and what influence it might have on the 3 developmental assets (social behaviors, empathy and affective self-regulation). Results suggested that a perceived caring climate in the relationship between youth and adults influences youths' emotional regulatory skills and empathy. Fry et al., (2012) later also found that a caring climate was associated with youth being able to monitor, manage and control their emotions and that both positive affective self-regulatory efficacy (PASRE) and negative self-regulatory efficacy (NASRE) mediated the relationship between a perceived caring climate and mental well-being. PASRE was positively linked to higher hope in life and feelings of happiness, but NASRE was only positively linked to hope (Fry et al., 2012). A caring climate is therefore a valuable asset in helping youth acquiring the skill to understand their emotions, feel empathy, increase compassion and support for one another.

3.3.5 A caring climate promotes proactive social behaviors in youth

A prosocial behavior is when an individual voluntarily attempt to assist someone (i.e. cooperation, helping, looking after someone, share resources), while antisocial behavior is considered behavior that can be harmful to others (i.e. bullying, intimidation, harassment, physically harming another person, ostracizing others) (Gano-Overway et al., 2009). Results in

Battistich et al. (1997) study indicated that student community was positively linked to students prosocial attitudes, motives, social skills, sense of autonomy and behaviour. In addition to this, Gano-Overway's (2013) study utilizing the CCS, reported that a caring middle school climate indicated that a perceived caring climate was positively linked to prosocial behavior and cognitive empathy by students. This means that youth who perceive a caring climate, are more likely to understand the emotions of another person and help that person. It does not necessarily mean that they share the same emotion as that individual, but they develop an ability to empathize with others. There were also indications in the study that negatively predicted anti-social behaviors such as bullying (Gano-Overway, 2013). These results support previous research made by Gano-Overway et al. (2009) and is further strengthened by findings in a recent study by Newland et al. (2019) that shows how a caring climate can lead to the development of the resources and skills, which in turn can predict a promoted prosocial engagement among youth.

3.4 Summary

These previous studies can aid in giving a more detailed picture of one of the less researched concepts, care. Up until now, the CCS has not been used by a great deal of authors or for different types of research, which means that there is a lack in previous research found on the measure. As can be seen in the literature above, the CCS is mainly used in a physical activity setting and has only been used in the United States. There have been attempts to create scales that capture a caring climate in Europe by researchers such as Cavrini, Chianese, Bocch and Dozza (2015), and Lu (2011) in Asia, but with little, to no, success. Another observation is the usage of the CCS on mainly underserved and low-income youth, which could be a potential obstacle in the generalization of results to the overall youth population. Regardless, studies on the CCS and a caring climate in school all point towards the psychosocial benefits (i.e. increased affective self-regulatory efficacy, social skills, enjoyment, engagement, empathy) youth experience if a caring climate is present in their environment (Battistich et al., 1997; Newton, Fry et al., 2007; Newton, Watson et al., 2007; Gano-Overway et al., 2009; Fry et al., 2012; Gould et al., 2012; Gano-Overway, 2013; Brown & Fry, 2014; Stark & Newton, 2014; Hogue et al., 2017; Newland et al., 2017), yet with the exception of one study (Centinkaya & Mutluer, 2019), no research has been done outside the US using the CCS to measure a caring climate. By validating the scale, important contributions can be made to the understanding of care in the research field.

In particular, the assessment of care and its significance to outcomes such as school achievements in the Norwegian context.

4. Purpose and research question

The purpose of this study is to contribute to the field of measuring caring climates by exploring whether the Caring Climate Scale (CCS) can be validly used in a Norwegian school setting among youth. This quantitative study will use data from the second wave of the COMPLETE project (Larsen et al. 2018) survey conducted in spring of 2017, by the Department of Health Promotion and Development at Bergen University in Norway. The study will mainly focus on investigating and validating the CCS in a Norwegian school context through the following research questions:

- 1. What are the psychometric properties of the full 20 item Caring Climate Scale (CCS) applied in a Norwegian upper secondary school setting?**
- 2. What are the psychometric properties of the 13 item CCS applied in a Norwegian upper secondary school setting?**
- 3. Which scale is more suitable in capturing the intended underlying measure; the original 13 item scale or the scale used in the current study?**
- 4. Are there differences in the reporting on the CCS based on gender and socioeconomic status?**

5. Methods

5.1 Epistemological foundation

One concept that greatly influence the choice of research design in a study, are research perspectives, or paradigms. Paradigms are any philosophical attitudes and characteristics the researcher brings to a study that affects the approach the researcher is inclined to adopt (Creswell, 2014). The type of paradigm a researcher identifies with is usually based upon previous experience, which orientation the discipline gravitates to, and any inclinations a mentor involved in the study might have. Creswell (2014) suggests four main research paradigms: Postpositivism, Constructivism, Transformative and Pragmatism. The present study belongs under the Postpositivism paradigm.

Most known as the scientific method, Postpositivism is representative of the traditional research where quantitative designs are the preferred method of study (Creswell, 2014). Due to its predisposition for cause and effect, the Postpositivists use theories and data collections to determine whether the theories can be supported or invalidated. This is done by reducing concepts, ideas and theories to smaller, more distinct sets that can be used to test possible variables in the form of research questions or hypotheses. By testing and verifying these data sets, Postpositivists wish to create a greater understanding of the world and its norms. Since this study is focused on validating, and possibly refining, the CCS in a Norwegian school setting, it holds a Postpositivist position (Creswell, 2014).

5.2 Design and study sample of the COMPLETE project

The COMPLETE project is a mixed design of both a quantitative and qualitative approach with a cluster randomized controlled trial (RCT) combined with qualitative interviews. The selection are students in secondary and upper-secondary school in Norway where the participatory schools were recruited from four counties. A total of 19 schools volunteered to participate in the COMPLETE project, but only 17 were qualified based upon the criteria that they had not previously been involved in the program and that they were not currently part of other research. The qualified schools were then randomly assigned to one of three groups. Six schools were assigned to only implement the Deamschool model, six schools were assigned to implement a combination of the Dreamschool model and Mental Health Support Team (MHST), and five schools were assigned to the control group. There were approximately 3100 students

participating in the COMPLETE project. The data collected were based upon questionnaires the students filled in and Norwegian register data on student absence from school, average grades and school dropout.

5.3 Design and study sample of the current study

The current study is utilizing the descriptive details and CCS from the quantitative data gathered in the COMPLETE project. This study is a survey based study with a quantitative design where data from the COMPLETE project will be examined and refined accordingly to appropriate the psychometric properties of the CCS to fit a Norwegian setting. The survey method of a quantitative study is called a non-experimental design due to the collection of data rather than experimenting for outcomes (Creswell, 2014). Since the current study is a validation study, the survey model is more beneficial since the purpose is to explore features of the CCS instead of measuring effects. One distinction between an experimental and nonexperimental design is that there is a manipulation of an independent variable (Tabachnick & Fidell, 2013). While the COMPLETE project is an experimental design, we will only use the data from the control group to avoid an inaccurate representation of the psychometric properties of the CCS due to the manipulated independent variable in the other experimental groups. As the study is only utilizing the control group (N=553), some data has been excluded from the analysis. This includes some demographic information as well as all scales not relevant to the CCS. Since the sample size of this study is above 500, it is considered very good according to researchers such as Nunnally (as cited by Field, 2009), who recommend having 10 times as many participants as variables, Tabachnick and Fidell (2013), recommends at least 300 participants, and Field (2009) concur that 300 participants should be sufficient as long as all variables have been measured adequately. As this study pertains to youth, which is defined by the United Nation (UN) as individuals between the age of 15 and 24 (United Nations, 2018), any participants below or above this criteria will be removed from further analysis.

5.4 Measures

5.4.1 Caring Climate Scale (CCS)

The CCS was initially a 20-item scale developed by Newton, et al. (2007) in a physical activity setting to assess the extent to which youth perceive a particular climate as supportive, safe, welcoming, and providing a feeling of being valued and respected by others. After Newton et al. (2007) performed an EFA and CFA study on the items in two different studies, it resulted in a final 13-item scale that showed high reliability ($\alpha = .92$). Participants were asked to respond to the items using a five point likert scale (1 = strongly disagree, 2 = disagree, 3 = not sure, 4 = agree and 5 = strongly agree). An example of an item from the CCS is “Kids feel that they are treated fairly” (see Appendix C).

5.4.2 Classmate Support Scale (CSS)

The CSS is a 5-item scale based upon the Teacher and Classmate Support Scale (Torsheim, Wold & Samdal, 2000). Some of the items originate from a classroom climate questionnaire by Manger and Olweus in 1994 (as cited by Torsheim et al., 2000). The CSS has previously been used in the WHO initiative Health Behavior in School aged Children (HBSC) (Samdal et al. 2016). Additionally, it has been used in Norwegian showing strong Chronbach’s alpha values from .74 to .76 (Torsheim et al., 2000; Danielsen, Samdal, Hetland & Wold, 2009). Participants were asked to respond to the items using a five point likert scale (1 = strongly disagree, 3 = not sure and 5 = strongly agree). An example from the CSS is “When a student in my class is sad, there is always someone in the class who wants to help them” (see Appendix C).

5.4.3 Learning Climate Questionnaire (LCQ)

The LCQ is a modified 10-item scale used in the Health Behaviour in Schoolaged Children (HBSC) project to report and map health related habits and phenomenon among youth related to teacher support (Samdal et al. 2009). Originally, the LCQ was adapted from the Health-Care Climate Questionnaire in 1996 by Williams and Deci (1996). A later study showed a high Cronbach’s alpha of .93 and .94 for the two study samples (Black & Deci, 2000). Participants were asked to respond to the items using a five point likert scale (1 = strongly disagree, 2 = disagree, 3 = not sure, 4 = agree and 5 = strongly agree). An example from the LCQ is “I feel understood by my teachers” (see Appendix C).

5.4.4 Demographic Information

To describe the participants, gender, age, socioeconomic status (SES) and country of birth for participant and their parents are included in this study. Gender has been retrieved from official registry data provided by the counties in which the control group was located. SES was self-reported based upon perceived family wealth and was used as proxy for SES. SES was also recoded from five to three categories where the two top categories and the two lower categories were combined. Original categories were 1 = very good, 2 = good, 3 = middle, 4 = bad and 5 = very bad.

5.5 Analysis

5.5.1 Preliminary analysis

Preliminary analyses were done to identify possible errors that might cause distorted estimates in the analysis. Descriptive analyses were executed to assess the mean, standard deviation, minimum and maximum values, variance and frequencies for any irregularities (Pallant, 2016). During this process, the suitability of the data for factor analysis was estimated by exploring the Kaiser-Mayer-Olkin (KMO) value and Bartlett's Test of Sphericity before proceeding with statistical analysis (Field, 2009). For the data to be considered suitable, the KMO value should be above .6 and Bartlett's Test of Sphericity significant ($< .05$) (Kaiser 1970; Kaiser 1974; Bartlett 1954).

5.5.2 Statistical analysis

Statistical analysis of data was performed in IBM SPSS Statistics version 25 and AMOS. While it is possible to calculate statistics manually by using the formulas, it is recommended to use software packages for simplicity and adequacy (Cozby & Bates, 2015). Due to IBM SPSS Statistics not being able to run CFA analyses, AMOS was utilized for CFA SEM analysis (Field, 2009).

5.5.2.1 Construct validity

Construct validity was assessed through EFA and CFA. The original dataset was randomly split in SPSS to allow the EFA and CFA to be performed on two separate datasets. To answer research question 1, an EFA was conducted as the initial analysis on the full 20 item CCS An

EFA was chosen as the initial analysis for this research project due to the nature of the research question. Normally, EFA is used in circumstances where the variables of a newly developed scale is being explored for interrelationships (Pallant, 2016; Tabachnick & Fidell, 2013). In this case, the CCS has been validated in previous research by Newton, et al. (2007), where the results led to an adjusted 13-item scale as opposed to the original 20-item scale. While a confirmatory factor analysis (CFA) might be the recommended measure for further analysis, the EFA was chosen due to the following reasons; Previous development, validation and use of the CCS was done in the United States and might not explain Norwegian trends when it comes to a caring climate; The scale was developed in a physical activity setting with a low SES sample; The age range, 9 to 17 years of age, that was utilized in the scale development by Newton et al. (2007) was bigger; The scale used in the COMPLETE project was the original 20-item scale instead of the adjusted 13-item scale. It might therefore be of greater benefit to assess the scale as “new” in this particular setting and study before proceeding with a CFA. The factors were assessed by using Cattell’s (1966) scree test and eigenvalues > 1.0 , and a cut-off loading of .55, as was done by Newton et al. (2007). Reliability of the EFA was assessed through an analysis of Cronbach’s alpha (α), Item-Total Correlation and Inter-Item Correlation. The recommended values of Cronbach’s alpha (α) are above .7 and Inter-Item Correlation between $r = .3$ and $r = .8$ (Pett, Lackey & Sullivan, 2003; Pallant, 2016). Once EFA was complete, a CFA was performed on the data. By applying the CFA after the EFA, a more accurate assessment of consistency in measuring the intended phenomenon, a caring climate, can be expected (Field, 2009).

A CFA SEM model was generated in SPSS AMOS. Before initiation of the CFA, data was evaluated for goodness of fit to assess whether the data was suitable for a factor analysis. The fit indices that were utilized were minimum discrepancy (χ^2/df), the standardized root mean square residual (SRMR), root mean square error of approximation (RMSEA), Tucker-Lewis index (TLI) and comparative fit index (CFI). As suggested by Hu and Bentler (1999), Hooper, Coughlan and Mullen (2008), Jackson, Gillaspay and Purc-Stephenson (2009) an acceptable model fit was defined by obtaining a SRMR below .08, RMSEA below .08 with 90% confidence interval, a TLI and CFI above .90. There are still debates about the recommended ratio for minimum discrepancy (χ^2/df) among authors where some advocate for a range of up to 5, while others a range up to 2 (Hooper et al., 2008). This paper will therefore assume that the acceptable ratio of the minimum discrepancy (χ^2/df) lies between the two recommendations. When assessing the model, Inter-Item Correlation Matrix and modification

indices (MI) were also reviewed alongside the CCS questions to explore similarities. Based upon this information, any items would be removed or error correlated. The same procedure was followed on the original 13 item CCS as was developed by Newton et al. (2007).

5.5.2.2 Criterion validity

Criterion validity was assessed by performing a bivariate correlation analysis between the CCS, CSS and LCQ on both the 12 item CCS (CFA 1) and 13 item CCS (CFA 2). This type of analysis estimates the degree of relationship between the variables (Tabachnick & Fidell, 2013), which is useful in assessing whether the CCS corresponds with, or can predict, other measures (Field, 2009). This analysis was done with Pearson's product-moment correlation (r) after confirming that the relationships did not violate assumptions of normality, homoscedasticity and linearity.

5.5.2.3 Measurement invariance

To answer research question 5, a measurement invariance approach was chosen to assess the differences between gender (male and female) and SES (poorly off, well off and very well off) in the CFA. This was done on the 12 item CCS and 13 item CCS. When assessing model fit for measurement invariance, the same fit indices previously used in this study (χ^2/df , SRMR, RMSEA, TLI and CFI) were applied as per recommendation (Cheung & Rensvold, 2002). Previously, only χ^2 has been used when evaluating goodness of fit, but Byrne, Shavelson and Mythen (1989) stress the importance of using multiple fit indices and theoretical consideration when evaluating the measurement invariance. Due to this, the difference between CFI (ΔCFI) was also used when assessing measurement invariance. The recommended value of ΔCFI is $< .01$ (Cheung & Rensvold, 2002).

5.6 Quality

5.6.1 Generalizability

Generalizability of a study pertains to how accurately an observed, or measured, value can be used to predict or describe other similar situations (Shavelson, Webb & Rowley, 1989). In other words, generalizability is the extent to which findings used with one specific sample and method also can be used with another population type or another procedure (Kukull & Ganguli, 2012; Cozby & Bates, 2015). Important requirements for generalizability of a study is whether

the sample is representative of the population in which the study is relevant to, in this case Norwegian students in upper secondary school, and large enough in size (Charter, 1999). Other aspects can also affect the generalizability of a study such as the characteristics of the participants (Cozby & Bates, 2015). Some participants are for instance more likely than others to participate in research. This can impact the generalizability of results to the extent that it only is applicable to individuals with similar characteristics as those who volunteered to participate. The COMPLETE project recruited their schools on a volunteer basis from four counties in Norway where 17 schools were selected to participate based upon the requirements (Larsen et al., 2018). While the total amount of participants (approximately N=3100) is high, the selection limitation to volunteer schools in four counties instead of all counties, can have implications for the generalization of this study. Since this study is using the control group (N=553) from the COMPLETE data, it is thought to relate to the general upper secondary population in Norway.

5.6.2 Instruments

The development of an instrument is a time consuming, but important, process. Some relevant steps to assure the quality of an instrument is to evaluate its face validity, make sure the questions are guiding the participant in the right direction, quality prediction by performing a test with an appropriate instrument, and complete a pilot study to test the questionnaire (Saris & Gallhofer, 2014). While the CCS, LCQ and CSS all have previously been validated, the interpretation of the questions and self-report options might be different based upon age, gender, social expectations and personal interests (Saris & Gallhofer, 2014; Cozby & Bates, 2015). Many questions in the LCQ and CCS pertain to the students teachers, in which the answer could be misrepresented by the students due to fear of their answer not being anonymous despite the information provided of anonymity. Additionally, the questions are general towards other students and teachers, which might be an obstacle in capturing the actual environment if the student is basing his or her reporting on a negative relation towards only one student or teacher.

5.7 Ethical implications

This project is under protection of the Norwegian Personal Data Act and the necessary approvals were collected from NSD (The Norwegian Centre for Research Data) under project

number 48551 beforehand by the COMPLETE Project (see Appendix A). The project is also registered with www.clinicaltrials.org under registration number NCT03382080 (Larsen et al. 2018), which is a database of clinical studies. Before data collection, students were given information on the purpose of the survey. A consent form was given to the parents of those students below the age of 16 at the time of the first survey collection (see Appendix B). Since this study is using a dataset from the first follow-up survey conducted during the spring of 2017, where all students were above 16, no additional consent forms were required from the parents.

6. Results

This study intends to explore the psychometric properties of the CCS in a Norwegian upper secondary school setting. In the following chapter, statistical results of the analyses will be presented. This includes the descriptive analysis of the sample, followed by the EFA, CFA and reliability analyses of the two. Following this, a correlation analysis to investigate relationships between a caring climate, teacher support and class satisfaction, in addition to measurement invariance to explore any difference in self-reporting based on gender and SES in the CCS, will be introduced.

6.1 Preparation

First, the categorical variables were examined in SPSS version 25 for possible outliers and other issues. Missing data ranged from 5.6% (N=31) to 11.2% (N=62) across variables (see Table 3). Due to the missing data being at a low rate, it was decided to not do any adjustments to the missing values and proceed with the analysis. After this, the continuous variable, age, was examined for its mean, standard deviation and minimum/maximum. Five participants were removed from the study as they were above 24 years of age. This was based upon the exclusion criteria that defines youth as individuals between 15 and 24 years of age (United Nation, 2018).

After the general data had been examined, another analysis was done to identify any outliers of the sociodemographic variables and CCS that might impact the results negatively. This was done through the explore section of SPSS. Here all variables were selected to the dependent list, then statistics were set to incorporate outliers, histograms and normal probability. The CCS sumscore showed a skewness of .113 and kurtosis of .225, which indicates that the distribution of scores is relatively symmetric as skewness is close to 0, and bell-shaped due to kurtosis being both positive and close to 0. Kolmonogrov-Smirnov showed a significant distribution of normality with $p < .05$, which indicates that the data is suitable for a factor analysis.

6.2 Statistical Analysis

6.2.1 Descriptive Analysis

Descriptive analyses and frequencies were done for gender, country born you/mother/father and socioeconomic status (SES); another one for age; and the CCS items. N=553 participants total

where N=311 (56.2%) were male and N=242 (43.8%) female between the age of 16 and 24 (M=17, SD=.8). The majority of participants was born in Norway (N=482, 87.2%); .5% (N=3) in Sweden, Finland, Denmark or Iceland; 3.8% (N=21) in another country in Europe; 6.5% (N=36) in another country outside of Europe; 1.4% (N=8) did not know where they were born; and .5% (N=3) entries were missing. When reporting their SES, N=353 (63.8%) reporting having a good SES, N=152 (27.5%) reported having a middles SES, while N=41 (7.4%) reported having a bad SES and N=7 (1.3%) entries were missing.

In depth descriptive analyses for the CCS was done to establish number of answers per item, missing values, percentage, mean and standard deviation (see Table 3). The CCS is made up of 20 items. The descriptive analysis showed that the items had a response rate range of 93.5% (N=517) to 95.1% (N=526) and missing entries ranged from 4.9% (N=27) to 6.5% (36). Two items stood out with a high mean and standard deviation, such as item 17 (M=3.62, SD=1.29) and item 20 (M=3.35, SD=1.29) in the scale.

Table 3. Descriptive Statistics of Caring Climate Scale Items, Frequency (N), Percentage (%), Mean and Standard Deviation (SD)

		Total N	N (%)					Mean	SD	
			Strongly agree	Agree	Don't know	Disagree	Strongly disagree			Missing
1	Kids are treated with respect	523 (94.6)	170 (30.7)	240 (43.4)	85 (15.4)	18 (3.3)	10 (1.8)	30 (5.4)	1.96	.89
2	The leaders respect kids	526 (95.1)	164 (29.7)	233 (42.1)	90 (16.3)	24 (4.3)	15 (2.7)	27 (4.9)	2.04	.96
3	The leaders are kind to kids	525 (94.9)	174 (31.5)	231 (41.8)	96 (17.4)	15 (2.7)	9 (1.7)	28 (5.1)	1.96	.89
4	The leaders care about kids	524 (94.8)	161 (29.1)	214 (38.7)	118 (21.3)	20 (3.6)	11 (2)	29 (5.2)	2.06	.93
5	Everyone is treated with kindness	523 (94.6)	162 (29.3)	217 (39.2)	112 (20.3)	22 (4)	10 (1.8)	30 (5.4)	2.05	.93
6	Kids feel that they are treated fairly	524 (94.8)	127 (23)	181 (32.7)	158 (28.6)	41 (7.4)	17 (3.1)	29 (5.2)	2.31	1.03
7	The leaders try to help kids	524 (94.8)	166 (30)	248 (44.8)	86 (15.6)	18 (3.3)	6 (1.1)	29 (5.2)	1.95	.85

8	The leaders want to get to know all the kids	523 (94.6)	139 (25.1)	193 (34.9)	140 (25.3)	41 (7.4)	10 (1.8)	30 (5.4)	2.22	.98
9	Everyone likes kids for who they are	518 (93.7)	134 (24.2)	184 (33.3)	157 (28.4)	31 (5.6)	12 (2.2)	35 (6.3)	2.23	.98
10	The leaders listen to kids	518 (93.7)	126 (22.8)	222 (40.1)	127 (23)	30 (5.4)	13 (2.4)	35 (6.3)	2.19	.95
11	The leaders accept kids for who they are	522 (94.4)	145 (26.2)	224 (40.5)	126 (22.8)	16 (2.9)	11 (2)	31 (5.6)	2.09	.91
12	Kids feel safe	519 (93.9)	151 (27.3)	209 (37.8)	137 (24.8)	14 (2.5)	8 (1.4)	34 (6.1)	2.07	.89
13	Kids feel comfortable	519 (93.9)	154 (27.8)	225 (40.7)	115 (21)	14 (2.5)	10 (1.8)	34 (6.1)	2.04	.90
14	Kids feel welcomed every day	522 (94.4)	158 (28.6)	210 (38)	127 (23)	17 (3.1)	10 (1.8)	31 (5.1)	2.06	.92
15	The leaders want kids to be successful	524 (94.8)	185 (33.5)	223 (40.3)	96 (17.4)	10 (1.8)	10 (1.8)	29 (5.2)	1.93	.88

16	Kids know everyone will be nice to them	517 (93.5)	144 (26)	206 (37.3)	139 (25.1)	18 (3.3)	10 (1.8)	36 (6.5)	2.12	.92
17	The leaders disrespect kids	520 (94)	44 (8)	68 (12.3)	100 (18.1)	137 (24.8)	171 (30.9)	33 (6)	3.62	1.29
18	People miss them when kids are absent	522 (94.4)	98 (17.7)	201 (36.3)	152 (27.5)	47 (8.5)	24 (4.3)	31 (5.6)	2.42	1.04
19	Kids feel the other kids care about them	520 (94)	135 (24.4)	226 (40.9)	129 (23.3)	17 (3.1)	13 (2.4)	33 (6)	2.13	.92
20	People make fun of each other	519 (93.9)	58 (10.5)	78 (14.1)	126 (22.8)	137 (24.8)	129 (21.7)	35 (6.1)	3.35	1.29

Full sample (N=553)

6.2.2 Splitting of Data

An EFA and CFA should not be performed on the same dataset due to overfitting (Fokkema and Greiff, 2017). Solutions to this issue could be using two different data sets, or, if the sample size allows it, splitting one dataset into two separate files where EFA is performed on one and CFA on the other data set (Fokkema and Greiff, 2017). The latter approach was chosen in this study. The dataset was split in two, ensuring a random selection of cases in each set, using the select data option in SPSS. The dataset called Dataset 1 was to be used for further exploration in an EFA, while Dataset 2 would be used for a CFA and a correlation analysis.

6.2.3 Descriptive Analysis After Data Split

The Dataset 1 (EFA) dataset contained N=286 (51.7% of the participants before data split) participants total where N=152 (53.1%) were male and N=134 (46.9%) female between the age of 16 and 23 (M=16.9, SD=.6). The majority of participants was born in Norway (N=251, 87.8%); 1% (N=3) in Sweden, Finland, Denmark or Iceland; 2.8% (N=8) in another country in Europe; 5.9% (N=17) in another country outside of Europe; 2.1% (N=6) did not know where they were born; and .3% (N=1) entries were missing. When reporting their SES, N=172 (60.1%) reported having a good SES, N=86 (30.1%) reported having a middle SES, while N=25 (8.7%) reported having a bad SES and N=3 (1%) entries were missing.

The Dataset 2 (CFA) dataset contained N=267 (48.3% of the participants before data split) participants total where N=159 (59.6%) were male and N=108 (40.4%) female between the age of 16 and 24 (M=17.1, SD=1). The majority of participants was born in Norway (N=231, 86.5%); 4.9% (N=13) in another country in Europe; 7.1% (N=19) in another country outside of Europe; .7% (N=2) did not know where they were born; and .7% (N=2) entries were missing. When reporting their SES, N=181 (67.8%) reported having a good SES, N=66 (24.7%) reported having a middle SES, while N=16 (6%) reported having a bad SES and N=4 (1.5%) entries were missing. Despite the division of the dataset, the sample size is still considered acceptable based upon recommendations of Nunnally and Bernstein (1994), Field (2009) and Tabachnick and Fidell (2013) specified in the Methods chapter.

6.3 Exploratory Factor Analysis (EFA)

An oblique EFA with Maximum Likelihood (ML) rotation was chosen for this study. ML was chosen over PCA, since PCA is a standard type of measure that is considered to be a quicker alternative rather than more accurate (Costello and Osborne, 2005). It is argued that ML is the best choice within the social sciences due to its consideration of correlations between items and wider range of factor loading assessment (Costello and Osborne, 2005). While Newton et al. (2007) initially used a varimax method for rotation in the EFA when developing the CCS, this study used an oblique method to enable correlation between the items (Field, 2009). Since this study is intending to measure one construct, a caring climate, making sure the items correlate is an important step towards an accurate analysis of the results. It was therefore concluded that this would be the best approach to utilize for the analysis of the data. By using a similar approach as Newton et al. (2007) in the development of the CCS, a comparison of the results is more applicable. Additionally, since the CCS was developed with unidimensionality in mind (Newton et al., 2007), a brief analysis of different EFA methods was performed to ensure the correct factor analysis was chosen (Brown, 2009). An ML, Principal Axis Factoring (PA) and Principal Components Analysis (PCA) EFA was performed to confirm that there were no significant variation in loadings between them, as this might indicate the wrong choice of EFA method (Brown, 2009). As the results indicated no significant variance between the different, the ML EFA was utilized as planned.

When conducting the initial EFA with ML, an examination of the KMO value and Bartlett's Test of Sphericity was made to evaluate the suitability of the data for factor analysis. The KMO was .97, which by far exceeds the recommended values of .6 (Field, 2009; Kaiser 1970, 1974), while Bartlett's Test of Sphericity (Bartlett 1954) reached statistical significance $< .05$, indicating suitability of the data for a factor analysis. Once this had been established, the eigenvalues (> 1.0) were explored by reviewing the total variance explained and scree plot (see Figure 2). While the total variance explained indicated that there were two emerging factors with an eigenvalue of 12.35 and 1.45, Cattell's (1966) scree test clearly illustrated only one emerging factor. This was corroborated by the results in the factor matrix, where it was a clear indication of the data being unidimensional as intended by the creators of the CCS (Newton et al. 2007). Since there also were two items that loaded lower than .55 in the emerging factor, another final EFA rotation was done on the data where these two items were removed, a one factor rotation was forced and a factor loading cut-off of .55 was executed, as had been done by Newton et al. (2007). The final rotation showed that the remaining 18 items explained 68.6% of the variance compared to the 20 items explaining 61.7% (see Table 4 for factor loadings).

Figure 2. Scree Test Illustrating Eigenvalues in Initial EFA of the 20 item CCS

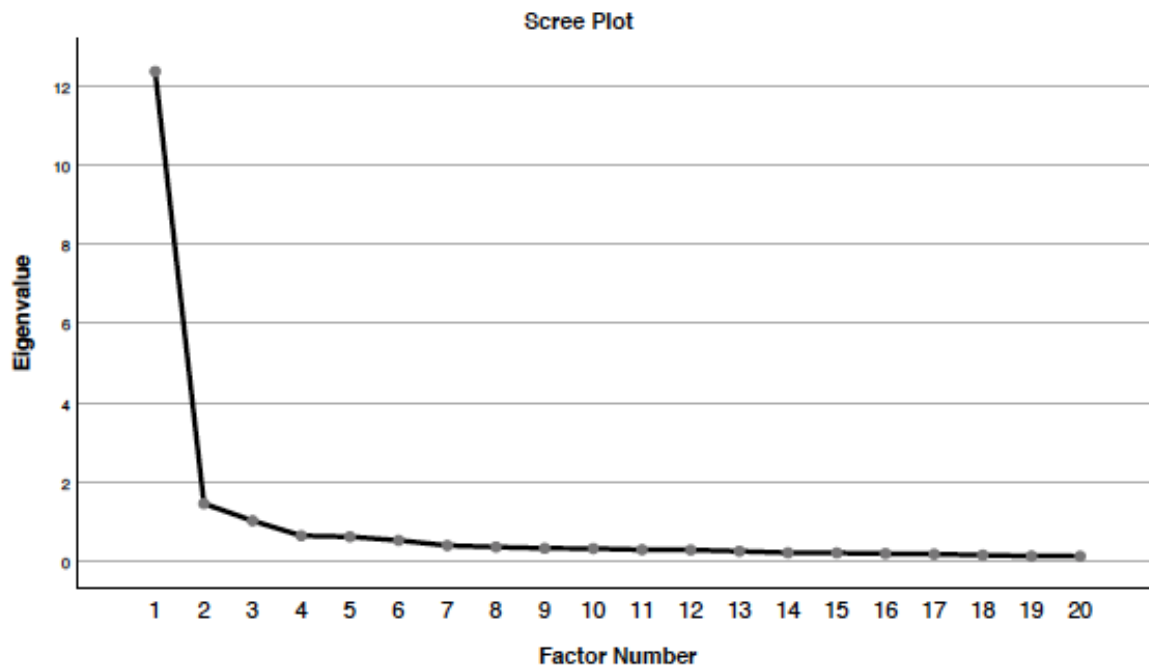


Table 4. Factor Loadings for Maximum Likelihood Exploratory Factor Analysis of the CCS

		Initial Analysis		Final Analysis	
		Factor	h2	Factor	h2
		loadings		loadings	
1	Kids are treated with respect	.80	.63	.76	.58
2	The leaders respect kids	.85	.77	.82	.67
3	The leaders are kind to kids	.86	.83	.85	.73
4	The leaders care about kids	.85	.77	.85	.72
5	Everyone is treated with kindness	.86	.70	.82	.68
6	Kids feel that they are treated fairly	.79	.60	.77	.59
7	The leaders try to help kids	.83	.72	.84	.70
8	The leaders want to get to know all the kids	.76	.71	.76	.57
9	Everyone likes kids for who they are	.77	.64	.77	.59
10	The leaders listen to kids	.86	.76	.86	.73
11	The leaders accept kids for who they are	.86	.77	.86	.74

12	Kids feel safe	.85	.81	.84	.71
13	Kids feel comfortable	.86	.81	.85	.71
14	Kids feel welcomed every day	.83	.79	.82	.67
15	The leaders want kids to be successful	.79	.63	.80	.63
16	Kids know everyone will be nice to them	.80	.71	.80	.64
17	The leaders disrespect kids	-.01	.14	-	-
18	People miss them when kids are absent	.56	.43	.57	.33
19	Kids feel the other kids care about them	.65	.50	.65	.42
20	People make fun of each other	.03	.10	-	-
	Variance (%)	58.82		65.35	
	Alpha Coefficient	.95		.97	

The internal consistency of the 18 item scale was measured through an item analysis of Chronbachs alpha, inter-item correlation and item-total correlation. The CCS showed a high reliability with a Cronbach's $\alpha = .97$, item-total correlation above $r = .5$ and inter-item correlation was between $r = .41$ and $r = .84$. The recommended threshold for the inter-item correlation is between $r = .3$ and $r = .8$ (Pett et al., 2003; Pallant, 2016), which can indicate, in combination with the Chronbachs alpha being relatively high, that some of the questions in the scale are fairly similar to one another. Since the upper inter-item correlation is close to $.8$ and the other data shows a strong reliability, we will proceed with further analysis of data in the CFA to see whether there are indications of question similarity, and hence item redundancy.

6.4 Confirmatory Factor Analysis (CFA)

6.4.1 CFA 1

IBM SPSS AMOS version 25 was used to perform a CFA by using a Structural Equation Model (SEM) on Dataset 2 to assess the factor structure of the 18 item CCS obtained in the EFA. Dataset 2 contained the second part of the randomized dataset that previously had been split. Since AMOS cannot run CFA SEM on incomplete data, a multiple imputation method was used to handle missing data in Dataset 2. This method was chosen for its data-based process that ensures a larger random variation to the imputation of missing data before CFA initiation. Multiple imputation is also recommended as one of the best procedures for data imputation

(Brown, 2015). An evaluation of goodness of fit was performed on the data before initiating the CFA by using χ^2/df , SRMR, RMSEA, TLI and CFI. When used together, these indices were thought to provide a more reliable evaluation of the data and solution provided when performing the factor analysis. The initial test was run with ML to test for goodness of fit, normality and outliers, estimates, correlations, and modification indices. Since the test showed a violation of normality (Multivariate Kurtosis = 236.07, Critical Ratio = 4.65, $p < .05$), another test with a ML Bootstrap method was performed to counteract the non-normality of the data (Newton et al., 2007).

The initial CFA did support the single factor structure as the EFA had done, but there were some variance in the goodness of fit indices ($\chi^2/df = 4.65$, SRMR = .04, RMSEA = .12, TLI = .90 and CFI = .91). While the minimum discrepancy can be argued is within the acceptable ratio, the RMSEA lies far above the recommended value of .08. An investigation of the Mahalanobis distance (MD) showed a few significant jumps between observations (MD = 65.74 to MD = 90.67), but no significant outliers were found in the dataset. When exploring the modification indices, a large amount of the indices loaded very high (MI > 10) with a range of 4 to 77.2. Due to this, the belief that some questions could be too similarly interpreted by participants, as was touched upon in the reliability section of the EFA, was important to investigate. This was done by analyzing the items (in Norwegian) for possible similarities in sentence formulations and word paraphrasing that could cause a higher error correlation among the items. To assure quality of the exploration, an Inter-Item Correlation Matrix and MI details were used alongside the analysis of each item.

Items that stood out were item 2, 3, 5, 11, 13 and 14 (see Table 5). Item 2 (Lærerne respekterer elever/The leaders respect kids) was reflective of respect from only the teachers, which also was incorporated in item 1 (Elever blir behandlet med respekt/Kids are treated with respect) on a larger scale as item 1 pertains to whether the participant felt respected by everyone. Item 2 is therefore a limited repetition of item 1. Item 3 (Lærerne er snille med elever/The leaders are kind with kids) can be interpreted similarly to item 4 (Lærerne bryr seg om elever/The leaders care about kids) since item 3 refers to kindness and item 4 care. Kindness is a reflection of care (Noddings 1995), which can make it confusing to separate between the two items for a participant. Item 3 was therefore removed from further analysis. Item 5 (Alle blir vennlig behandlet/Everyone is treated with kindness) is a very general statement about everyone being treated in a friendly manner. An individual being treated friendly (item 5) was eliminated since it also is correlated with whether someone is being treated with respect (item 1), and being liked for who they are (item 9). Item 11 (Lærerne aksepterer elever for den de

er/The leaders accept kids for who they are) is about acceptance for who they are, which is close to being liked for who they are (item 9). In addition to item 11 being directed towards teachers only, item 9 is open to capture the climate as a whole rather than just the teacher-student relationship. Lastly, item 13 (Elever har det bra/Kids are doing well) and 14 (Elever føler seg velkommen hver dag/Kids feel welcomed everyday) tries to assess whether the participant feels good and feels welcome. When comparing these to item 12 (Elever føler seg trygge/Kids feel safe), that tries to assess a safety feeling participants have, it can be argued that item 13 and 14 is closely related. This is due to the assumption that an individual who feels safe, also feels welcome and good. In addition to this, item 13 and 14 were highly correlated with one another, so it was concluded that they be removed from further analysis in the scale. The result from the similarity analysis also corresponded with the items that loaded higher on the modification indices and were highly correlated (above .8) in the Inter-Item Correlation Matrix. Item 2, 3, 5, 11, 13 and 14 were therefore subsequently removed from the scale before another CFA was made.

Table 5. *CCS Elements from COMPLETE Project Alongside Original CCS Elements*

	From the COMPLETE Project	Original CCS Elements
1	Elever blir behandlet med respekt	Kids are treated with respect
2	Lærerne respekterer elever	The leaders respect kids
3	Lærerne er snille med elever	The leaders are kind to kids
4	Lærerne bryr seg om elever	The leaders care about kids
5	Alle blir vennlig behandlet	Everyone is treated with kindness
6	Elever føler at de blir rettferdig behandlet	Kids feel that they are treated fairly
7	Lærerne forsøker å hjelpe elever	The leaders try to help kids
8	Lærerne ønsker å bli kjent med alle elevene	The leaders want to get to know all the kids
9	Alle liker elever for den de er	Everyone likes kids for who they are
10	Lærerne hører på elever	The leaders listen to kids
11	Lærerne aksepterer elever for den de er	The leaders accept kids for who they are
12	Elever føler seg trygge	Kids feel safe
13	Elever har det bra	Kids feel comfortable
14	Elever føler seg velkommen hver dag	Kids feel welcomed every day
15	Lærerne vil at elever skal lykkes	The leaders want kids to be successful
16	Elever vet at alle vil være hyggelig med de	Kids know everyone will be nice to them

17	Lærerne respekterer ikke elever	The leaders disrespect kids
18	Elever blir savnet når de ikke er der	People miss them when kids are absent
19	Elever føler at andre elever bryr seg om de	Kids feel the other kids care about them
20	Folk gjør narr av hverandre	People make fun of each other

Normally, it is recommended to limit error correlation due to issues where (1) researchers are more focused on achieving model fit rather than a good model; (2) sampling errors where an error correlation might not hold up in other samples than the initial sample; and (3) any underlying structures or relationships that can be masked by correlation of errors (Brown, 2015; Hermida, 2015). In this case, it was decided to proceed with two error variance correlations based upon the modification indices after removal of the six items. Item 8 and 9, as well as item 18 and item 19, were correlated since the analysis of these items did not show any similarities with one another. The result of the remaining 12 items after removal of 6 items and error correlations, showed a good model fit of the scale ($\chi^2/df = 2.15$, SRMR = .24, RMSEA = .66, TLI = .97 and CFI = .98) in a Norwegian setting.

The reliability of the 12 item scale was measured through an item analysis of Chronbach's alpha, inter-item correlation and item-total correlation, as had been done with the EFA. The 12 item CCS showed high reliability with a Cronbach's $\alpha = .96$, item-total correlation above $r = .56$ and inter-item correlation was between $r = .39$ and $r = .79$.

6.4.2 CFA 2

To answer research question 2, a CFA was done to assess whether the original 13 item CCS developed by Newton et al. (2007) would be a better fit in a Norwegian setting than the analysis of the scale resulting from this study. A CFA with ML and Bootstrap was performed on the data after the model had been set up in AMOS. The same fit indices were utilized in this analysis as was used in the previous CFA performed (χ^2/df , SRMR, RMSEA, TLI and CFI). The initial results showed that the original 13-item scale developed by Newton et al. (2007) was a poor fit in a Norwegian setting ($\chi^2/df = 6.92$, SRMR = .04, RMSEA = .15, TLI = .89 and CFI = .91) with a minimum discrepancy above 5, RMSEA above .08 and TLI below .9 as recommended for an acceptable ratio (Hu and Bentler, 1999; Hooper et al., 2008; Jackson et al., 2009). As was done by Newton et al., the MI were inspected to identify any misspecifications in the model. Multiple of the items had high error correlation between each other. As mentioned above, researchers recommend limiting error correlation as much as possible to not mask any

underlying structures to a model (Brown, 2015). Despite this, a few error correlations were performed based upon the rationale that the latent variable they are measuring are similar to one another, which can strengthen the model instead of weaken it (Gerbing & Anderson, 1984). Item 13 and 14, item 12 and 13, item 12 and 14 was correlated due to them all measuring what can be considered the same latent variable, or “hidden” factor (Tabachnick & Fidell, 2013). These items all contain questions pertaining to the student and their perception of the climate. Item 2 and 3 were also correlated based upon a possible latent variable related to teacher directed questions.

Another CFA was subsequently performed after the error correlation. The MI details still contained several high error correlations between item 8 and 9, item 9 and 11, item 1 and 5, item 3 and 4, item 8 and 14. Since they did not seem to measure a similar latent variable, it was decided to not perform any additional error correlations on the data. The results showed an average to poor fit ($\chi^2/df = 3.62$, SRMR = .03, RMSEA = 1, TLI = .95 and CFI = 96) in a Norwegian setting with all indices within an acceptable ratio except the RMSEA with a ratio higher than .08. The reliability analysis of the 13-item scale confirmed the above results with a Cronbach’s $\alpha = .97$, item-total correlation above $r = .76$ and inter-item correlation was between $r = .61$ and $r = .89$. While Chronbach’s alpha is high, the poor range and high maximum inter-item correlation indicates that the overall reliability of the 13-item scale is not the best of fit.

6.5 Correlation Analysis

To assure reliability and validity, a correlation analysis will be performed between the CCS sumscore and CSS sumscore; and between the CCS sumscore and LCQ sumscore. This is to make sure we address the criterion validity of the CCS by exploring its relationship with teacher support and class satisfaction (Cozby & Bates, 2015).

6.5.1 CFA 1

A two-tailed bivariate correlation analysis was performed to assess criterion validity of the 12 item CCS resulting from the CFA 1. The correlation analysis intended to measure the relationship between a caring climate (as measured by the CCS), class satisfaction (as measured by the CSS) and teacher support (as measured by the LCQ). The relationship was measured with Pearson’s product-moment correlation (r). Preliminary analysis of scatterplots showed that the relationships did not violate assumptions of linearity and normality, but was on the border

of violating the assumption of homoscedasity. An investigation of possible outliers discovered in the scatterplot was performed to assure an accurate representation of data. No input errors or other significant issues were found in the data entry. The relationship between a caring climate, class satisfaction and teacher support showed a strong, positive correlation and were all significant ($p < .01$)¹. See Table 6 for variable correlations. This indicates that a higher level of a perceived caring climate is associated with a higher perception of class satisfaction and perceived teacher support.

Table 6. *Pearson’s product-moment correlation between a caring climate, class satisfaction and teacher support*

Scale	1	2	3
1. Caring Climate Scale	-		
2. Class Satisfaction Scale	.459**	-	
3. Learning Climate Questionnaire	.721**	.464**	-

** Correlation is significant at the .01 level (2-tailed)

6.5.2 CFA 2

The same two-tailed bivariate correlation analysis was executed on the 13 item CCS from CFA 2 to assess criterion validity by measuring the relationship between a caring climate, class satisfaction and teacher support with Pearson’s product-moment correlation (r). Initial analyses were made of the scatterplots to ensure no violation of normality, linearity and homoscedasity. While similar results were found for CFA 2, the scatterplot illustrating the relationship between a caring climate and teacher support showed less outliers than CFA 1 did. The cases where outliers did present itself were investigated before proceeding with correlation analysis. Results showed that there was a strong positive correlation between all variables ($p < .01$)² with a small variance from the results achieved in the CFA 1 correlation analysis above (see Table 7).

¹ Results were compared to Spearman Rank Order Correlation (ρ), as this usually is more suitable for ordinal data (Field, 2009), and showed a low variance from the results received in the Pearsons Correlation analysis.

² Results were compared to Spearman ρ , see previous footnote.

Table 7. Pearson’s product-moment correlation between a caring climate (CFA2), class satisfaction and teacher support

Scale	1	2	3
1. Caring Climate Scale	-		
2. Class Satisfaction Scale	.444**	-	
3. Learning Climate Questionnaire	.713**	.464**	-

** Correlation is significant at the .01 level (2-tailed)

6.6 Measurement Invariance

Before an assessment of measurement invariance, a CFA was run on the groups (gender and SES) separately to assess model fit. Once model fit was established, the configural variances were first tested for each group in the CCS unconstrained. Another analysis was then performed where the variances were fully constrained to be equal in each group. The results were used to test for invariance and calculated to obtain the p-value. This was done for both the 12 item CCS and 13 item CCS in different analyses.

6.6.1 CFA 1

Before testing for measurement invariance, two CFA's were separately conducted for the gender group; male ($\chi^2/df = 2.39$, SRMR = .03, RMSEA = .09, TLI = .95 and CFI = .96) and female ($\chi^2/df = 1,74$, SRMR = .04, RMSEA = .08, TLI = .96 and CFI = .97). Subsequently, the same was done for the three SES groups; bad ($\chi^2/df = 3.67$, SRMR = .05, RMSEA = .43, TLI = .55 and CFI = .65), middle ($\chi^2/df = 1.95$, SRMR = .04, RMSEA = .12, TLI = .92 and CFI = .94) and good ($\chi^2/df = 2.12$, SRMR = .03, RMSEA = .08, TLI = .96 and CFI = .97). As per the recommended thresholds (Hu and Bentler, 1999; Hooper et al., 2008; Jackson, Gillaspay and Purc-Stephenson, 2009), there are some indices indicating that there are differences present between the groups that might indicate that the model is not suitable for a measurement invariance assessment. Despite several indices containing an RMSEA above the recommended value of .08, it was proceeded with statistical analyses. Since the SES categories were not evenly distributed, it was expected that RMSEA would be higher than recommended values (Cheung & Rensvold, 2002). Next, measurement invariance was tested for the two groups independently from one another by assessing the model fit for the unconstrained and fully

constrained CFA. The χ^2 and df from the unconstrained and constrained CFA of each group (gender and SES) were used to perform a chi-square difference test in a statistical tool developed by Gaskin (2018). See Table 8 for an overview of the unconstrained and constrained fit indices between gender and SES. Gender; unconstrained ($\chi^2 = 215$, $df = 104$) and fully constrained ($\chi^2 = 224$, $df = 116$) resulted in a p-value of .703. SES; unconstrained ($\chi^2 = 413$, $df = 156$) and fully constrained ($\chi^2 = 445$, $df = 180$) resulted in a p-value of .127 . Both results have a p-value higher than .05 which indicates that the model is invariant. This means that the model is not different for genders (males and females) and SES (bad, middle and good).

Table 8. χ^2 Difference Test and ΔCFI for CFA 1

			χ^2	df	χ^2/df	p	SRMR	RMSEA	TLI	CFI
Multigroup Comparison	Gender	Male (N=159)	124.276	52	2.390		.033	.094	.948	.959
		Female (N=108)	90.322	52	1.737		.036	.083	.958	.967
	SES	Bad (N=16)	191.041	52	3.674		.046	.422	.551	.646
		Middle (N=66)	101.196	52	1.946		.045	.121	.917	.935
		Good (N=181)	110.312	52	2.121		.028	.079	.960	.968
	Gender	Unconstrained	214.609	104	2.064		.033	.063	.952	.962
		Fully Constrained	224.302	116	1.934		.033	.059	.958	.963
		Δ	9	12		.703				.001
	SES	Unconstrained	412.693	156	2.645		.046	.080	.892	.915
		Fully Constrained	445	180	2.472		.116	.075	.903	.912
Δ		32	24		.127				.003	

6.6.2 CFA 2

As had been done with the previous scale, two CFA's were conducted for the gender group; male ($\chi^2/df = 3.05$, SRMR = .03, RMSEA = .11, TLI = .94 and CFI = .95) and female ($\chi^2/df = 2.81$, SRMR = .03, RMSEA = .13, TLI = .92 and CFI = .94). Subsequently, the same was done for the three SES groups; bad ($\chi^2/df = 3.15$, SRMR = .06, RMSEA = .38, TLI = .64 and CFI = .72), middle ($\chi^2/df = 1.73$, SRMR = .03, RMSEA = .11, TLI = .95 and CFI = .96) and good ($\chi^2/df = 3.38$, SRMR = .03, RMSEA = .12, TLI = .94 and CFI = .95). Similar issues in regards to values exceeding or falling short from recommended thresholds also appeared in this analysis. For comparison reasons, it was decided to continue with the analysis. The two groups were tested separately by evaluating the model fit for the unconstrained and fully constrained CFA. A chi-square difference test was used with the χ^2 and df from the unconstrained and constrained CFA done for gender and SES. Gender; unconstrained ($\chi^2 = 352$, df = 120) and fully constrained ($\chi^2 = 363$, df = 133) resulted in a p-value of .611. SES; unconstrained ($\chi^2 = 505$, df = 180) and fully constrained ($\chi^2 = 551$, df = 206) resulted in a p-value of .009. Only one result had a p-value higher than .05 (gender) which indicates that the model is invariant between genders, but variant between SES. In other words, this means that the model is different depending on the SES of the participant and is therefore also not a good scale for individuals with other SES backgrounds based only on these results. It is important to note that the SES variable also contains a skewed selection, which can greatly impact these results. It is therefore also recommended to assess other goodness of fit indices, such as the difference between CFI indices (ΔCFI). As can be seen in table 9 below, the ΔCFI is below .01 between each variable (gender and SES), which also indicates that the model is indeed invariant (Cheung & Rensvold, 2002) despite the results in chi-square difference. The implications of these results will be further explored in the discussion chapter of this paper

Table 9. χ^2 Difference Test and ΔCFI for CFA 2

			χ^2	df	χ^2/df	p	SRMR	RMSEA	TLI	CFI
Multigroup Comparison	Gender	Male (N=159)	182.746	60	3.046		.029	.114	.938	.952
		Female (N=108)	168.737	60	2.812		.034	.130	.918	.937
	SES	Bad (N=16)	188.873	60	3.148		.057	.378	.638	.722
		Middle (N=66)	103.759	60	1.729		.030	.106	.945	.957
		Good (N=181)	202.568	60	3.376		.032	.115	.935	.950
	Gender	Unconstrained	352.563	120	2.930		.029	.085	.930	.946
		Fully Constrained	362.914	133	2.729		.030	.081	.938	.947
		Δ	11	13		.611				.001
	SES	Unconstrained	504.689	180	2.804		.057	.083	.903	.925
Fully Constrained		550.611	206	2.673		.089	.080	.910	.921	
Δ		46	26		.009				.004	

7. Discussion

The following chapter will discuss the findings presented in the previous chapter in light of theory and previous research, as well as discuss implications these results might have on future research and practice. Results will be interpreted based upon Nodding's (1984, 1995, 2005, 2012) care ethics, PYD theory by Lerner et al. (2005) and other previous research pertaining to a caring climate among youth. Furthermore, any limitations to the study will be discussed before recommendations for future research is presented.

7.1 Summary of key findings

The purpose of this study was to assess whether the CCS could be validly used among youth in a Norwegian upper secondary school setting. Results from the construct validity assessment of the CCS indicated that a 12 item version of the scale was psychometrically valid in a Norwegian school setting among youth rather than the full 20 item scale that was utilized, or the original 13 item CCS by Newton et al. (2007). Convergent validity of the 12 item CCS and the original 13 item CCS was assessed through a correlation analysis with measures of teacher support and class satisfaction. Significant associations were established supporting convergent validity of both scales. Results indicated that teacher support showed a higher correlation to a caring climate than class satisfaction. Further investigations of the 12 item CCS suggested measurement invariance of the CCS between genders and SES, despite the low N in one of the SES categories. The 12 item CCS showed construct and convergent validity. These findings will be systematically discussed and interpreted in this chapter in the order of the research questions.

7.2 Interpretation of findings

7.2.1 Discussion of the psychometric properties of the full 20 item CCS applied in a Norwegian upper secondary school setting

The psychometric properties of the CCS in a Norwegian setting was first evaluated through an EFA of the full 20 item scale to assess construct validity and reliability of the scale. As described in the methods chapter, the full 20 item scale was included in the COMPLETE project data collection because at that time point, it had never previously been used in a Norwegian

setting, and not validated outside of the United States (Brown & Fry, 2014; Hogue, 2019; Stark, Newton, 2014; Fontana et al., 2017; Hall, Newland, Newton & Podlog, 2016; Martin et al., 2016; Guivernau & Gano-Overway, 2014; Brown et al., 2017; Brown & Fry, 2014; Gould et al., 2011; Fry et al., 2012; Newton et al., 2007, Newton, Watson et al., 2007; Fry & Gano-Overway, 2010; Gano-Overway, 2013; Hogue et al., 2017).³ The EFA results contained two loadings below .55 and these were subsequently removed. A commonly used cut off for removing loadings is usually .3 (Tabachnick & Fidell, 2013), and was used in a validation study of the CCS in a Turkish University setting (Centinkaya & Mutluer, 2019). However .3 is the lowest recommended cut-off and only counts for 10% of the overlapping variance (Tabachnick & Fidell, 2013). Further, Newton et al. (2007) applied a stricter cutoff criteria of .55 in the development of the scale, and to be more in line with the original study, it was decided to use the same strict cutoff in the present study. The 18 remaining items showed a good internal reliability, but with indications of item redundancy. The indication of item redundancy was confirmed in the CFA and an additional 6 items were removed after a closer inspection through face validity of the items as well as an exploration of each factor loading. Once this was done, the scale showed a very good fit. Results from the internal reliability analysis strongly supported the final 12 item scale as a measurement of a caring climate among upper secondary students in Norway.

Multiple items were removed from the 20 item scale and the 12 item scale shows both similarities and differences compared with the original 13 item scale (Newton et al., 2007). When investigating these side by side (see Table 10) there seems to be a variance in preference of question formulation. For instance, in the current Norwegian sample, items containing a positive and supportive notion, such as “the leaders want kids to succeed”, is retained. The original 13 item scale (Newton et al., 2007), on the contrary, contains more direct questions such as “the leaders respect kids”. A possible explanation for this variance could lie within culture and its effect on an individuals` perceptions of items and phrasing. Culture is composed of elements such as values, norms and social axioms (Minkov, 2011) which affect our communication style. Low-context cultures (such as the United States) use a simple and direct communication method where information is understood at face value. High-context cultures (such as China) use a more sophisticated communication style in which information is both verbalized and read between the lines (Meyer, 2014; Kim, Pan & Park, 1998). While Norway

³ One validation study of the CCS has recently been completed in Turkey where the 13 item scale was utilized (Centinkaya & Mutluer, 2019).

also is a low-context culture, the United States is even lower (Meyer, 2014), which can explain the difference in items of the current scale and the 13 item scale (Newton et al., 2007). Additionally supporting this, studies evaluating cross cultural comparisons of life satisfaction among youth have noted that there are differences in perception of life satisfaction among youth in different cultures (Proctor, Lindley & Maltby, 2009). From a cultural perspective, adapting the CCS to fit the perceptions of the country who wish to use the scale could provide answers more representative of the sample and add to the understanding of what a caring climate represents in different cultures.

Table 10. Comparison of final items (scale in current study has been translated directly from Norwegian to English for comparison purposes)

Current 12 item scale	Original 13 item scale
1 Students are treated with respect	Kids are treated with respect
2 The teachers respect students**	The leaders respect kids
3 The teachers are kind with students**	The leaders are kind to kids
4 The teachers care about students	The leaders care about kids
5 Everyone is treated with kindness**	Everyone is treated with kindness
6 Students feel that they are treated fairly	Kids feel that they are treated fairly
7 The teachers try to help students	The leaders try to help kids
8 The teachers want to get to know all the students	The leaders want to get to know all the kids
9 Everyone likes students for who they are	Everyone likes kids for who they are
10 The teachers listen to students	The leaders listen to kids
11 The teachers accept students for who they are**	The leaders accept kids for who they are
12 Students feel safe	Kids feel safe
13 Students are doing well**	Kids feel comfortable
14 Students feel welcomed every day**	Kids feel welcomed every day**
15 The teachers want students to succeed	The leaders want kids to be successful**
16 Students know everyone will be nice to them	Kids know everyone will be nice to them**
17 The teachers disrespect kids**	The leaders disrespect kids**

18	People miss them when students are absent	People miss them when kids are absent**
19	Students feel the other students care about them	Kids feel the other kids care about them**
20	People make fun of each other**	People make fun of each other**

** Removed items

Culture embodies an abundance of elements. The way we communicate, as illustrated above, is greatly affected by our culture. This is also the case in our daily life and our environment. A study by Inglehart, done from 1970 to 2006 (as cited by Minkov, 2011), showed that cultural distinction between the countries he studied (Belgium, Italy, France, the Netherlands, West Germany and the United Kingdom) remained the same over 36 years. Culture is in other words generally stable and is not necessarily changed by the politics of that nation (Minkov, 2011; Minkov, Blagoev & Hofstede, 2012). Instead, the social institutions and policies often reflect the cultural values present in that nation (Schwartz, 2014). In Norway, the focus is on providing all students with a similar education in which everyone is equal, while the United States cultivates success and ambition which in turn generates a competitive environment (Borg & Pålshaugen, 2019; Schwartz, 2014; Ødegård, 2006). Compared to other nations, Norway has for this reason come far in implementing health promoting aspects into its educational policy (Borg & Pålshaugen, 2019; Sørli & Ogden, 2015). Therefore, due to the cultural differences in school policies between the USA and Norway, another measure is needed to reflect a caring climate in Norwegian school settings.

As studies also have shown that there can be variation of culture within large countries (Minkov, 2011), it might additionally be beneficial to conduct further validations of the scale in each cultural context. It is important to note that within a reasonable literature search, no other articles were found that attempted to make an adjusted version of the CCS scale by using an EFA and the full 20 item version of the scale. Studies were mainly centered around applying and validating the 13 item scale finalized by Newton et al. (2007) in which one study predominantly used modification indices to fit the scale and another to assess the scale items (Centinkaya & Mutluer, 2019; Moore & Fry, 2014). The lack of validation of the full scale further strengthens the need to additionally validate the full 20 item scale both in an international and national settings.

Convergent validity of the CCS was supported through an analysis of the relationship between the perception of a caring climate, and each of the measures of teacher support and

class satisfaction. Before discussing these relationships further, it should be noted that convergent validity and construct validity often is used synonymously in research. Cozby and Bates (2015) for instance is using construct validity as an overall term of the types of validity (face-, content-, convergent-, discriminant-, concurrent-, and predictive validity). Field (2009) is not mentioning convergent or construct validity, yet is referring to different types of validity as measuring a construct. Tabachnick and Fidell (2013) is using the term construct validity when assessing the validity following a factor analysis. Newton et al. (2007) refers to convergent validity in their development of the CCS, Brown and Fry (2014) construct validity, and Fontana et al., (2017) refers to convergent validity. See Table 2 in the theory chapter for a visual overview of the types of validity adjusted according to the interchanging validity terms discussed above.

When assessing the 12 item scale against other measures, it was found that the perception of teacher support and class satisfaction was positively associated with the perception of a caring climate. This is in line with previous research findings where a caring climate is associated with an increased sense of support for youth (Stark & Newton, 2014; Hall, Newland, Newton & Podlog, 2016). It additionally further strengthens the purpose of the scale to measure a notion of care by illustrating an aspect that is closely related to Noddings' theorising. Teachers are central in meeting the students need by encouraging them to learn how to care for others by being cared for (Noddings, 2005). Battistich et al. (1997) emphasize how school as an institution is where individuals learn how to be a part of a community, which only happens if their needs for competence, autonomy and belonging are met through being able to actively participate in a caring climate. Noddings (2003) argue that the effect of care only will be successful if there is a balance between inferred need by the school (for instance to complete homework) and expressed need of the student (learning how life works). To achieve this, there need to be a relationship of care and trust built between the teacher and student (Noddings, 2003). The teacher can thus be seen as a mediator between a students personal needs and societal obligations by assuring a safe environment for them to learn how to manage and cope with any life challenges. Additionally, class satisfaction, or school satisfaction, is an important aspect to consider. While this is a construct that is still mainly used as a predictor of academic achievements, research has shown that important factors to class satisfaction lies in whether students feel supported by both teachers and peers, safe and justly treated (Samdal, Nutbeam, Wold & Kannas, 1998; Verkuyten & Thijs, 2002; Elmore & Huebner, 2010). As noted above in Noddings research, having schools address the basic needs of its students in the sense of experiencing achievements and belonging is also indicative of an individual experiencing a

positive class satisfaction (Verkuyten & Thijs, 2002). Between the relationships, perception of teacher support and a caring climate consisted of a stronger positive association than perception of class satisfaction and a caring climate. The reason for this could be related to the teacher being such a central part of school. While they are an mediator between the students and the institution, they are also a role model. Some research show that students who indicate a negative class satisfaction, experience a different social relationship with their teacher than those who indicate a positive class satisfaction (Baker, 1999). There also have been findings suggesting that social support from peers and teachers had a direct effect on class satisfaction (Danielsen et al., 2009). Making sure that students are met in a positive and inclusive way in which they feel supported and cared for is crucial. Further research of class satisfaction and its association to a caring climate is therefore needed.

7.2.2 Discussion of the psychometric properties of the 13-item CCS applied in a Norwegian upper secondary school setting.

To understand more about the 12 item scale that the current study resulted in, an assessment of the 13 item scale was also completed. In this sample, the fit of the 13 item scale was poor despite incorporating five suggested changes suggested through the modification indices. To each acceptable fit in the Norwegian school sample, eight modifications had to be conducted. While this is generally permissive, it is not recommended to make too many modification indices as this could be an indication that the construct is not concise enough in measuring the intended phenomenon (Gillaspy & Purc-Stephenson, 2009). In research found, there are no specific limitations that should be applied when utilizing modification indices, but most researchers recommend using it with caution and only if it is empirically and theoretically justifiable to error correlate items (Teo, 2013; MacCallum, Roznowski & Necowitz 1992; Hermida, 2015; Perry, Nicholls, Clough & Crust, 2015; Jorgensen, 2017). Hermida (2015) expresses concerns (1) that the usage of modification indices permits a possible manipulation of a model to achieve a good fit; (2) that sampling errors could be the reason for high modification indices and should therefore not be modified; and (3) that the adjustment made based upon modification indices could bias any parameter estimates of the measure and construct. In the development of the scale, Newton et al. (2007) does not mention applying any modification indices, other than to assess the removal of one item. A similar approach is done by Moore and Fry (2014) in their study utilizing the CCS, yet no error correlation between items were applied. The lack of previous research utilizing the CCS with error correlations, could support recommendation of cautiously applying modification indices to improve the fit

of the scale as the indice only has been used in the general assessment of the scale. However, the first international study to apply the CCS in Turkey, completed four modifications to their version due to items` semantic affinity to one another (Centinkaya & Mutluer, 2019). Out of the four modifications that were done in the Turkish study, only one matched with the modifications done in the current evaluation of the 13 item scale, and none to the 12 item scale. Previous research utilizing the CCS with factor analysis also used different samples from one another. This includes a sample from a National Youth Sport Program, physical education students, adults in a recreational sport setting and university students in physical education who are certified athletes (Fry et al., 2012; Gano-Overway, 2013; Fontana et al., 2017; Cetinkaya & Mutluer, 2019). These studies all show acceptable fit indices with the 13 item scale where $\chi^2(SD)$, SRMR, RMSEA, TLI and CFI has been consistently used for reference (Fry et al., 2012; Gano-Overway, 2013; Fontana et al., 2017; Cetinkaya & Mutluer, 2019). While it is positive that the scale has been attempted validated in other settings and with different samples (youth and adult), the CCS would greatly benefit from further validation within a similar population and setting consistently so as to confirm that the scale is dependable.

7.2.3 Discussion of potential explanations for the different scale structures found in this study – why does it seem like the 12-item scale is more appropriate in a Norwegian upper secondary school setting than the established 13-item scale?

As touched upon in sub chapter 7.2.1, cultural variances appear to influence the retention of items, as can be seen in the resulting 12 item scale when compared to the original 13 item scale of Newton et al. (2007). An analysis of translation and phrasing was done for the 12 item scale in Norwegian by using an online dictionary (UiB Norwegian Dictionary, 2020), online synonym dictionary (Norwegian Synonym Dictionary, 2020) and online translator tool (Microsoft Translator, 2020). Items 1-2, 4-10, 12, 14, 16-20 were assessed as well translated when performing a back and forth translation of the sentences and individual choice of word for each sentence. Item 3 was translated to “lærerne er snille med elever”, which directly translates to “the teachers are kind with students”. While this is fairly similar to the original scale item (“the leaders are kind to kids”), the Norwegian translation could have adjusted the adverb “with” in Norwegian to reflect the original item, which would have been “to” (“mot” in Norwegian). Item 11 was translated to «lærerne aksepterer elever for den de er”. This translates to «the teachers accept students for who they are” which is the same translation as the original 13 item scale. Considering the sample age and the word accept (“aksepterer” in Norwegian) might not be a word that is as commonly used among youth in Norway, a simpler Norwegian

synonym such as “godtar” could have been more beneficial to utilize among Norwegian youth. Item 13, “elever har det bra” is directly translated to “students are doing well”. Although the word “bra” is a Norwegian synonym for “comfortable” and more commonly used among youth. A possible issue with the translation of this item, could lie in the phrasing as the item is stating a current state (“are doing”) instead of reflecting on how the student is feeling as the original 13 item scale is attempting to assess. Item 15, “lærere vil at elever skal lykkes” is translated to “teachers want students to succeed”. While this is similar to the original scale (“The leaders want kids to be successful), it is a positively phrased sentence that can be seen as focusing on wanting students to succeed in their endeavors rather than to be successful in tasks given.

As can be seen in table 10, item 3, 11 and 13 were not retained in the 12 item scale in this study. In the item analysis above, it is possible that these items were not reflecting a Norwegian culture and values through the phrasing and choice of wording. It could also simply be possible that item 3 and 11 were difficult for the participants to answer, as it would require them to anticipate the opinions of their teacher. Additionally, item 13 is a very general statement as to students wellbeing, which can be challenging to assess for youth unless there is a specification of which aspect of their wellbeing they are supposed to rate. Item 15 was retained in the 12 item scale, but not in the original 13 item scale. As mentioned previously, this item is very positively loaded in the Norwegian counterpart than the American formulation, which relates back to cultural aspects that can affect how a participant perceives items. Particularly the direct communication style in the United States that is taken at face value (Meyer, 2014).

To further add to this, an analysis of the modification indices and error correlations will be discussed. In the 12 item scale, two error correlations that were done; item 8 and 9; and 18 and 19. Since item 8 (“the teachers want to get to know all the students”) pertained to the teachers and item 9 (“everyone likes kids for who they are”) to everyone, it was determined that there was not substantial support to remove any of them from the scale. Since an assumption can be made that an individual who likes another would wish to get to know them, they were error correlated instead. The same situation applies to item 18 (“people miss them when kids are absent”) and item 19 (“students feel the other students care about them”) as item 18 pertains to everyone, while item 19 only to students. For the 13 item scale, there were multiple error correlations that needed to be performed; 1 and 2; 2 and 3; 12 and 14; 12 and 13; 13 and 14. When comparing these to the 12 item scale, there were no error correlation similarities between the two. Alternatively, it appears that the items that were error correlated in the 13 item version were the same as some of the removed items in the 12 item scale (item 2, 3, 5, 11, 13, 14, 17 and 20 were removed). This strengthens the notion that some of the items

might not have been representative of a Norwegian school context. It may be that some of the items were not appropriately translated or culturally relevant in measuring the perception of a caring climate as discussed above.

7.3.4 Discussion of measurement invariance between genders and socioeconomic status

To further validate the 12 item scale, measurement invariance tests were performed for genders and SES. While this was not done during the development of the scale by Newton et al. (2007) or any other studies where the CCS has been utilized besides one study by Gano-Overway (2013). Using measurement invariance on the CCS adds important understanding to whether the scale can be validly used for both boys and girls, as well as between different socioeconomical groups. In the current sample, the 12 item scale was measurement invariant for genders and SES, which indicates that there is no variation in item perception depending on gender or SES group. However, it has to be emphasized that the results should be interpreted with caution due to a very low N (16) in the upper SES category. This will be further discussed in the following section on methodological considerations.

7.3 Methodological considerations

In this subchapter methodological considerations of the study will be made in light of strengths and weaknesses of the study through previous research, research design and generalizability.

7.3.1 Previous research

To the best of knowledge, this is the first study applying the CCS to a school setting among youth to assess an important aspect of students daily life. Previous use of the scale has been related to physical activity or sports settings among youth (Newton et al., 2007; Newton, Watson et al., 2007; Fry & Gano-Overway, 2010; Fry et al., 2012; Gould et al., 2012; Gano-Overway, 2013; Moore & Fry, 2014; Moore, Brown & Fry, 2015; Hogue, 2016; Martin et al., 2016; Morgan, Newland, Newton, Podlog & Baucom et al., 2016; Brown et al., 2019), with the exception of a few that targets an adult sample (Brown & Fry, 2014; Brown et al., 2017; Fontana et al., 2017). Little previous research has been done using the CCS, particularly validation studies. With the exception of a few studies (Gould et al., 2012; Martin et al., 2016; Centinkaya & Mutluer, 2019; Hogue, 2019), mostly the same authors who developed the scale have been using the CCS after its validation. The adaptation of the CCS to a Norwegian school context

allows for a more general understanding of the caring climate without additional variables, such as physical activity. Instead of targeting one particular group of youth, the 12 item CCS in a Norwegian school context can be perceived as a more inclusive scale that can be utilized to a larger extent. Additionally, having included measurement invariance to validate the scale is another strength that should be noted, as this only was utilized in one other study with the CCS by Gano-Overway (2013) on genders. Although measurement invariance were found in this study, it is a weakness that the sample population for the upper SES category was low.

7.3.2 Research design

A survey design was chosen based upon the available data from the COMPLETE project. The survey contained 59 questions with sub questions in which the CCS was question 51, CSS question number 49 and LCQ question number 50 (see Appendix C). As they are located at the end of the COMPLETE questionnaire, the quality might be lower than desired due to factors such as gradual loss of attention during survey completion that can cause an increase in uniform answers (Glaesic & Bosniak, 2009; Sahlqvist et al., 2011) and thus render the answers less reliable. Additionally exclusively using a scale to measure a caring climate could be a limitation as it could be seen as not capturing all relevant information from participants. A qualitative study would allow for more clarifications and specifications around the participants perception (Morgado, Meireles, Neves, Amaral & Ferreira, 2017), which could be favorable when attempting to understand a caring climate in depth. It is also important to consider how the variance in sample types could affect the scoring on scales. The current sample is Norwegian, while the original 13 item scale is using an underserved population in the United States (Newton et al., 2007). Studies have shown that individuals from some underserved regions in the world who are uneducated might answer one of the extremes on surveys containing a Likert scale, thus rendering the answers not representative of the intended measure (Minkov, 2011). Seeing the Norwegian sample in this study is scoring higher on perceived SES and is not considered an underserved population, it is perceived that the answers are representative of a caring climate in an upper secondary school setting in Norway.

When validating a new scale, it is important to perform proper validity tests on the scale before applying it to a sample. One way this is done, which was also performed by Newton et al. (2007) during development of the scale, is a face validity test where experts assure the scale items are measuring the intended phenomenon (Morgado et al., 2017). While this was not done in this study, face validity was assessed during the CFA and could be argued is a strength in

this study rather than a weakness as initial face validity already had been done by Newton et al. (2007) before factor analysis.

7.3.3 Generalizability

The current study intended to evaluate whether a caring climate among upper secondary students in Norway can be measured through the CCS. A strength to the generalizability of the results is the representation of participants as they are from different schools around the country. Due to this, the outcome is more likely to represent the whole upper secondary population. Utilizing the randomized control group of the COMPLETE data (Larsen et al., 2018) additionally allows for a stronger generalizability of the data, as the results reflect a caring climate as is, without any added variables to the environment. Some limitations that can affect the generalizability of the results are that the participating schools were volunteer schools, yet it can be argued that this also can be considered a strength as the students themselves did not volunteer, but the school. This relates to how some participants who volunteer might have different characteristics and motivations to participate in such studies than those who don't (Cozby & Bates, 2015). Additionally, schools utilized for the study were from four out of eighteen counties in Norway (Regjeringen, 2019)⁴, this also might impact the generalizability as some counties were not represented in the study. Furthermore, there was an underrepresentation of participants who reported a perceived low SES. Norway is considered one of the best countries to live in from a socioeconomic perspective with lower levels of poor SES, research show that this population struggle more in school than its counterpart with good SES (Bufdir, 2018). Assuring that students with poor SES is also represented would additionally strengthen the generalizability and external validity of the study.

7.4 Recommendations for future research

Assuring reliability and validity of the CCS is needed for the scale to be applicable in any specific context. There are currently multiple studies using the CCS in a physical activity setting, but lacking in studies applying the scale to other environments. As this study has applied the scale in a Norwegian school setting, it is crucial to have more validations in this type of context to ensure that the assessments are accurate and adjusted accordingly. This is particularly

⁴ From 2020, Norway merged several counties and went from 18 to 11 counties (Regjeringen, 2019).

illustrated in the contrasting scale that this study resulted in compared to the original 13 item scale by Newton et al. (2007). It is therefore recommended research on the CCS utilize the 20 item scale instead of 13 item scale. Future research is therefore needed to confirm the findings in this study. It could also be interesting to validate the scale internationally to establish whether there are any elements of cultural differences in youth that affects how a caring climate is perceived. Additionally, there is a need for research establishing predictive validity of the CCS in which a caring climate can predict other behaviors. As specified throughout this paper, little research using the CCS has been utilized, it is therefore important to create a solid basis of the scale by assessing the validity of the scale.

8. Conclusion

Youth spend most of their time in school surrounded by their classmates and teachers. The quality of the relationships built during this time sets an example for how youth can regulate emotions, build their self-esteem, learn autonomy and develop a personal identity. Care is one of many factors that contribute to creating a nurturing climate for youth. Assuring a measure that can contribute to a greater understanding of caring climates and how they affect youth, is therefore beneficial to develop meaningful relationships in the school domain.

The current study intended to identify and validate the psychometric properties of the CCS in a Norwegian upper secondary school setting. Contrary to the original scale by Newton et al. (2007) that contained 13 items, results indicated that a revised 12 item version of the scale was psychometrically valid in a Norwegian setting. Additionally, a perceived caring climate was found to associate with perceived teacher support and class satisfaction when assessing the convergent validity of the 12 item scale. Teacher support was slightly more correlated to a caring climate than class satisfaction. Furthermore, it was found measurement invariance between genders and SES in reporting on the CCS, despite a low N in the upper SES category.

A limitation to this study is the lack of representation of participants in the upper SES category that was revealed during the measurement invariance testing. Additionally, an extensive survey was given to the students in which the CCS placement was nearly at the end of the survey. This might have had an effect on the answers given by the participants as previous research indicate that a gradual loss of attention can occur during lengthy questionnaires. To the best of knowledge, this is the first study that has utilized the CCS in a school context in a Norwegian setting. It is therefore recommended that future research attempt to further validate the CCS in a similar setting to confirm the findings of this study. Furthermore, applying the full 20 item scale instead of the 13 item version of the scale by Newton et al. (2007) is recommended to assure that the factor structure is suitable for the measured domain. The current study contributes to the existing body of research on the CCS by validating the scale in a Norwegian school setting.

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APPENDIX

Appendix A - NSD Approval



Torill Marie Bogsnes Larsen
HEMIL-senteret Universitetet i Bergen
Christiesgt. 13
5015 BERGEN

Vår dato: 27.06.2016

Vår ref: 48551 / 3 / ASF

Deres dato:

Deres ref:

TILBAKEMELDING PÅ MELDING OM BEHANDLING AV PERSONOPPLYSNINGER

Vi viser til melding om behandling av personopplysninger, mottatt 02.05.2016. Meldingen gjelder prosjektet:

48551	<i>Gode psykososiale læringsmiljø bedrer gjennomføring i den videregående skolen</i>
Behandlingsansvarlig	<i>Universitetet i Bergen, ved institusjonens øverste leder</i>
Daglig ansvarlig	<i>Torill Marie Bogsnes Larsen</i>

Personvernombudet har vurdert prosjektet, og finner at behandlingen av personopplysninger vil være regulert av § 7-27 i personopplysningsforskriften. Personvernombudet tilrår at prosjektet gjennomføres.

Personvernombudets tilråding forutsetter at prosjektet gjennomføres i tråd med opplysningene gitt i meldeskjemaet, korrespondanse med ombudet, ombudets kommentarer samt personopplysningsloven og helseregisterloven med forskrifter. Behandlingen av personopplysninger kan settes i gang.

Det gjøres oppmerksom på at det skal gis ny melding dersom behandlingen endres i forhold til de opplysninger som ligger til grunn for personvernombudets vurdering. Endringsmeldinger gis via et eget skjema, <http://www.nsd.uib.no/personvern/meldeplikt/skjema.html>. Det skal også gis melding etter tre år dersom prosjektet fortsatt pågår. Meldinger skal skje skriftlig til ombudet.

Personvernombudet har lagt ut opplysninger om prosjektet i en offentlig database, <http://pvo.nsd.no/prosjekt>.

Personvernombudet vil ved prosjektets avslutning, 31.12.2019, rette en henvendelse angående status for behandlingen av personopplysninger.

Vennlig hilsen

Kjersti Haugstvedt

Amalie Statland Fantoft

Kontaktperson: Amalie Statland Fantoft tlf: 55 58 36 41

Vedlegg: Prosjektvurdering

Dokumentet er elektronisk produsert og godkjent ved NSDs rutiner for elektronisk godkjenning.



NASJONAL SAMARBEIDSSSTUDIE

I meldeskjemaet har dere opplyst om at prosjektet er en nasjonal samarbeidsstudie hvor Universitetet i Bergen er behandlingsansvarlig institusjon. Personvernombudet forutsetter at dere har avklart ansvaret for behandlingen av personopplysninger mellom institusjonene. Vi anbefaler at dere inngår en avtale som omfatter ansvarsfordeling, ansvarsstruktur, hvem som initierer prosjektet, bruk av data og eventuelt eierskap.

FORMÅL

Målet med prosjektet er å prøve ut og evaluere både implementeringsprosess og effekt av forskningsbaserte tiltak som bedrer det psykososiale læringsmiljøet og bidrar til reduksjon av frafall innenfor videregående opplæring.

UTVALG

Utvalget består av omtrent 2500 elever i første klasse på videregående, ved 17 skoler. De samme elevene blir fulgt frem til våren 2019. I tillegg utgjør omtrent 500 lærere, ansatte i oppfølgingstjenesten, rektor, elever og elevmentorer en del av utvalget.

SAMTYKKE

Enkelte av informantene i prosjektet er under 16 år. I e-post mottatt 24.06.2016, beskriver forsker at det vil bli hentet inn aktivt samtykke fra foreldre, for alle elever som ikke er fylt 16 år innen dato for datainnsamling. Fylkeskoordinator tilknyttet prosjektet (ansatt i fylkeskommunen) vil på bakgrunn av lister for opptak identifisere de elevene hvor det er behov for samtykke. Da det er eleven selv som søker opptak til videregående opplæring, er ikke fylket sikker på om de vil ha foreldres e-post. En e-post vil derfor bli sendt til eleven med forespørsel om å sende den videre til foreldre. Det vil bli sendt en påminnelse på SMS. Ved skolestart vil det bli gitt skriftlig informasjonsskriv til de elevene hvor en ennå ikke har mottatt tilbakemelding på samtykke. Det vil bli lagt opp til at foreldrene kan levere samtykke på nett ved hjelp av et svarskjema, på SMS eller skriftlig på tilbakemeldingsskjema i informasjonsskrivet. Informasjonsskrivet mottatt 24.06.2016, er godt utformet.

Elever som er 16 år eller over, skal samtykke til deltakelse selv. Vi er enig i at umyndige elever over 16 år kan samtykke selv til deltakelse i dette prosjektet, og opplysningene kan behandles med hjemmel i personopplysningsloven §§ 8 første ledd og 9 a). Informasjonsskrivet mottatt 24.06.2016, er godt utformet

DATAMATERIALET

Data innhentes gjennom elektronisk spørreskjema, intervju og registerdata. Spørreskjema til elevene vil bli besvart i en klassesstime. Personvernombudet legger til grunn at elever som ikke deltar i undersøkelsen vil ha tilrettelagte aktiviteter mens undersøkelsen pågår. Det er vår vurdering at man gjennom spørreskjema til elevene innhenter opplysninger om (psykiske) helseforhold. Slike opplysninger er etter personopplysningsloven § 2 punkt 8 c) sensitive. Første spørreskjemaundersøkelse gjennomføres ved skolestart høsten 2016. Deretter vil det

gjennomføres en oppfølging våren 2017, 2018 og 2019.

Forskergruppen skal også koble på registerdata fra fylkeskommunen til svarene fra undersøkelsen. Variablene som skal innhentes fra fylkeskommunenes register er:

- Kjønn
- Studieretning
- Gjennomsnittskarakter
- Fravær
- Frafall
- Avbruddsårsak

Forsker forklarer hvilke verdier variabelen avbruddsårsaker består av, på e-post mottatt 24.06.2016.

Personvernombudet vurderer at forskergruppen ikke får tilgang på særlig sensitiv informasjon gjennom verdiene på variabelen.

KOBLING

Det er fylkene som registrerer de indikatorene forskergruppen trenger for å analysere effekten av tiltakene. Fylkene er aktive samarbeidspartnere i dette prosjektet, og det er etablert egne koordinatorstillinger i hvert fylke. Koordinatoren henter ut informasjon fra fylkets eget register. Ut fra klasselister for alle førsteklasser ved de inkluderte skolene vil det bli laget unike ID-nummer for alle elevene, som ikke er identifiserbare. Klasselisten med nye unike ID-nummer og elevenes navn vil gjøres tilgjengelig for forskerne som gjennomfører datainnsamlingen i klassen. På denne måten kan de gi elevene deres unike id som de fører inn i spørreskjemaet. Etter datainnsamlingen er gjennomført på skolen vil klasselistene destrueres. Det samme unike ID-nummeret brukes også i registerdata fra fylkets register for å anonymisere informasjonen før den sendes til forskerne, for kobling opp mot spørreskjemadata. Håndteringen av koblingsnøkkelen vil gjøres av fylkeskoordinator, og koblingsnøkkelen vil ikke være tilgjengelig for forskerne.

DATABEHANDLER

Eanalyzer er databehandler i prosjektet, og personvernombudet forutsetter at det inngås en databehandleravtale med Eanalyzer, jf. personopplysningsloven § 15.

INFORMASJONSSIKKERHET

Forventet prosjektslutt er 31.12.2019. Ifølge prosjektmeldingen skal innsamlede opplysninger da anonymiseres. Anonymisering innebærer å bearbeide datamaterialet slik at ingen enkeltpersoner kan gjenkjennes. Det gjøres ved å:

- slette direkte personopplysninger (som navn/koblingsnøkkel)
- slette/omskrive indirekte personopplysninger (identifiserende sammenstilling av bakgrunnsopplysninger som f.eks. bosted/arbeidssted, alder og kjønn)

VILKÅR

Personvernombudet ber om å få tilsendt spørreskjema og/eller intervjuguider for hver runde - i god tid før oppstart/datainnsamling. Skjema sendes: personvernombudet@nsd.uib.no

Appendix B - Informed Consent Form for Parents



INFORMASJON OM SAMTYKKE

Evaluering av prosjektet «Gode psykososiale læringsmiljø betrar gjennomføring i den vidaregåande skulen»

Kjære foreldre/føresette

Lenke til samtykkeskjema finner du på slutten av denne teksten.

Vi er ei gruppe forskarar frå Universitetet i Bergen, Nordlandsforskning og Oxford Research som har fått i oppdrag av Kunnskapsdepartementet (KD) å gjennomføre ei evaluering av ulike tiltak som skal auke gjennomføringa i vidaregåande skule. Målet for evalueringa er å undersøke om tiltaka medverkar til å skape eit betre psykososialt miljø og læringsmiljø på utvalte vidaregåande skular.

Skulen som dottera/sonen din skal byrje på, har sagt seg villig til å delta i denne studien, og i det høve inviterer vi han/ho til å delta i ei spørjeundersøking. Undersøkinga har spørsmål om ho/han sjølv, forventningar ho/han har til det sosiale miljøet i klassen og ved skulen, korleis ho/han opplever skulearbeidet og hennar/hans relasjon til andre ved skulen.

Spørjeundersøkinga vil bli gjennomført i løpet av ein skuletime. Forskarar vil vere til stades under gjennomføringa og svare på spørsmål. Første spørjeundersøkinga skal gjennomførast ved skolestart hausten 2016. Deretter vil det gjennomførast ei oppfølging våren 2017, 2018 og 2019.

For å auke kunnskapen om gjennomføring i vidaregåande opplæring ønskjer vi å sjå elevane sitt svar i samanheng med eksisterande registerdata om prestasjonar, fråvær og eventuelle sluttårsaker.

For å kunne følgje eleven over tid nyttar vi eit unikt, ikkje identifiserbart idnummer. Dette nummeret bruker eleven når ho/han svarar på undersøkinga, og til å setje saman registerdataa frå fylkeskommunen med svara på spørjeskjemaet. Datafila frå fylket vil innehalde unikt id, kjønn, studieretning, snittkarakter, fråvær og eventuell årsak til fråfall. All informasjon vil vere anonymt på forskarane sine hender. Handteringa av koplingsnøkkelen blir handsama av fylkeskoordinator og vil ikkje vere tilgjengelig for forskarane.

Det er frivillig for barnet ditt å delta i prosjektet, og all informasjonen som ho/han eventuelt gir frå seg vil vere konfidensliett og ikkje tilgjengelig for nokon andre, inkludert foreldre/føresette og hennar/hans lærar. Barnet ditt kan trekke seg frå studien på eitkvart tidspunkt ved å informere oss direkte eller gjennom læraren. Dette gjeld og dersom du ikkje ønskjer at me skal nytte svara som barnet ditt eventuelt allereie har gitt oss. For at barnet ditt skal kunne bli med i denne undersøkinga, er vi avhengige av løyve frå deg.

Ved å gi løyve til å ta del i dette prosjektet, gir du oss høve til å nytte svara frå spørjeskjemaet til vitskapelege arbeid, og eventuelt publisere resultatane i vitskapelege tidsskrift, så lenge barnet ditt sin anonymitet blir ivareteken.

Når evalueringstudien er avslutta vil skulen få ein rapport der resultatane frå studien blir presentert. Vi set stor pris på om du vil la barnet ditt delta i studien.

Dersom du har spørsmål om prosjektet, ta kontakt med ein av oss.

Studien er meldt til Personvernombudet for forskning, NSD - Norsk senter for forskningsdata AS.

For å gi ditt samtykke, [klikk her](#)

eller send ein SMS til 97 52 34 27 med svar (ja/nei), skulen barnet ditt skal gå på, studieretninga barnet ditt skal gå på, barnet sitt namn, barnet sin fødselsdato og ditt eige namn (eksempel «JA, GARNES, STUDIESPESIALISERENDE, OLA NORMANN, 06.09.2000, PER NORMANN»)

Vennlig hilsen
Professor Torill Larsen
Mobil 41 50 11 27
Prosjektleder, UiB



Frida Mathisen
Mobil 97 52 34 27
Prosjektkoordinator, UiB

UNIVERSITETET I BERGEN



Appendix C - COMPLETE Project Questionnaire

1. Spørreskjema

Ved å svare på disse spørsmålene, vil du hjelpe oss med å finne ut mer om det sosiale miljøet i klassen og ved skolen. I tillegg vil vi gjerne vite mer om ungdoms motivasjon, deltagelse, trivsel og bruk av sosiale medier. Svarene dine skal være hemmelige. Opplysningene behandles konfidensielt, og det er kun forskergruppen som har tilgang til svarene. Ingen på skolen vil få lov til å se ditt spørreskjema. Ved å delta samtykker du også til at informasjon om studieretning, kjønn, karaktersnitt, fravær og eventuell årsak til frafall fra skoleeiers register kobles sammen med spørreskjema. All informasjon vil bli behandlet konfidensielt og være anonymt på forskernes hånd.

Les hvert enkelt spørsmål, og svar så ærlig som du kan. Selv om noen spørsmål virker veldig like, er det viktig at du svarer på alle. Hvis du har spørsmål, spør en av forskerne som er tilstede.

2. ID:

3. I hvilken måned ble du født?

(Oppgi kun ett svar)

Januar	Febru ar	Mars	April	Mai	Juni	Juli	Augus t	Septe mber	Oktob er	Novem ber	Dese mber
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

4. Hvilket år er du født? (eks. 1999)

(Oppgi verdi)

5. Kjønn:

(Oppgi kun ett svar)

Jente

Gutt

Annet

6. Hvilken skole går du på?

(Oppgi kun ett svar)

Bardufoss, Breivika/Ishavsbyen, Firda, Norheimsund eller Øystese

Nord Troms, Rå, Eid, Hafstad, Stord eller Fusa

- Senja, Kvaløya, Polarsirkelen, Mo og Øyrane, Garnes eller Austrheim

7. Hvilken klasse går du i?

8. Har du tenkt å fortsette på videregående skole neste år?

(Oppgi kun ett svar)

- Ja
- Sannsynlig
- Lite sannsynlig
- Nei
- Annet

9. I hvilket land er du og dine foreldre født?

(Oppgi kun ett svar pr. spørsmål)

	I Norge	I Sverige, Finland, Danmark eller Island	Annet land i Europa	Annet land utenfor Europa	Vet ikke
Du	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mor	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Far	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

10. Hvem har du bodd sammen med dette skoleåret?

(Oppgi kun ett svar)

- Begge foreldrene mine
- Bare mor
- Bare far
- Litt hos hver
- Mor og stefar/mors samboer
- Far og stemor/fars samboer

Annet, hvis ingen av alternativene

11. Hvor ofte er du involvert i det følgende på fritiden?

(Oppgi kun ett svar pr. spørsmål)

	Aldri eller nesten aldri	En gang i måneden	Hver uke	Daglig eller nesten daglig
Snakke med foreldrene mine om samfunnsspørsmål eller politikk	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Se på TV for å bli informert om nasjonale og internasjonale nyheter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lese aviser for å bli informert om nasjonale og internasjonale nyheter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Snakke om politikk eller samfunnsspørsmål med venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bruke internett til å bli informert om nasjonale og internasjonale nyheter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Snakke med foreldrene mine om hva som skjer i andre land	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Snakke med venner om hva som skjer i andre land	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Delta i en ungdomsklubb (som f.eks. ten sing, korps, politisk ungdomsparti, miljøverngruppe)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

12. Hvor ofte deltar du vanligvis i disse typene organiserte aktiviteter på fritiden?

(Med organiserte aktiviteter mener vi aktiviteter som er drevet av idrettsklubber, andre klubber eller organisasjoner)

(Oppgi kun ett svar pr. spørsmål)

	Holder ikke på med denne typen aktivitet	2-3 ganger i måneden eller sjeldnere	Omtrent 1 dag i uken	2 ganger i uken eller oftere
Organisert lagidrett (for eksempel fotball, håndball, basketball, ishockey)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Organiserte individuelle fysiske aktiviteter (for eksempel svømming, sykling, kampsport, friidrett, turn, dans, langrenn)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Organiserte musikk- og dramaaktiviteter i grupper (for eksempel korps, kor, band, teatergruppe)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Organiserte individuelle musikkaktiviteter (for eksempel spille et instrument, ta musikktimer)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Andre organiserte aktiviteter i grupper (for eksempel kirkelige aktiviteter, speider)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

13. Nedenfor er noen spørsmål om hvordan du synes du selv er. Klikk på det svaralternativet som passer best for deg.

(Oppgi kun ett svar pr. spørsmål)

Stemmer svært godt	Stemmer nokså godt	Stemmer nokså dårlig	Stemmer svært dårlig
--------------------	--------------------	----------------------	----------------------

Jeg synes jeg er like smart som andre på min alder	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg synes det er ganske vanskelig å få venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg klarer å få virkelig nære venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er ofte skuffet over meg selv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er ganske sein med å bli ferdig med skolearbeidet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har mange venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg tror jeg kan gjøre det bra i nesten hvilken som helst ny sport	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har en nær venn som jeg kan dele hemmeligheter med	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg liker ikke den måten jeg lever livet mitt på	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg gjør det svært godt på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Andre ungdommer har vanskelig for å like meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

14. Nedenfor er noen spørsmål om hvordan du synes du selv er. Klikk på det svaralternativet som passer best for deg.

(Oppgi kun ett svar pr. spørsmål)

	Stemmer svært godt	Stemmer nokså godt	Stemmer nokså dårlig	Stemmer svært dårlig
Jeg synes jeg er bedre i sport enn andre på min alder	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg har en venn som jeg kan dele ting med	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er stort sett fornøyd med meg selv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vansker med å svare riktig på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er populær blant jevnaldrende	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg synes jeg ser bra ut	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg synes det er vanskelig å få venner som jeg kan stole på	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg liker meg selv slik jeg er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg tror jeg er ganske intelligent	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler at jevnaldrende godtar meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg liker utseende mitt veldig godt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har ikke noen god venn som jeg kan dele virkelig personlige ting med	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er svært fornøyd med hvordan jeg er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

15. Hvor mange nære gutte- og jentevenner har du nå for tiden?

(Oppgi kun ett svar pr. spørsmål)

	Ingen	En	To	Tre eller flere
Gutt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jente	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

16. Nedenfor er noen spørsmål om dine venner og om deg selv. Klikk på det som passer best på deg fra 1 (ikke i det hele tatt) til 5 (veldig godt).

(Oppgi kun ett svar pr. spørsmål)

	1 (Ikke i det hele tatt)	2	3	4	5 (Veldig godt)
Hvor godt uttrykker du dine meninger når de andre i klassen er uenig med deg?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt blir du venner med andre jevnaldrende ?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt kan du ta en prat med en ukjent person?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt kan du samarbeide i overensstemmelse med de andre i klassen din?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt holder du på vennskap med andre jevnaldrende ?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt kan du fortelle om en morsom hendelse til en gruppe jevnaldrende ?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Hvor godt kan du fortelle andre jevnaldrende at de gjør noe som du ikke liker?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Mine venner er gode venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine venner bryr seg om meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

17. Hvor god råd har din familie?

(Oppgi kun ett svar)

- Svært god råd
- God råd
- Middels god råd
- Ikke særlig god
- Dårlig råd

18. Hvor enig eller uenig er du i det følgende?

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Enig	Vet ikke	Uenig	Helt uenig
Jeg har mange gode samtaler med mine foreldre/foresatte	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
I min familie føler jeg meg betydningsfull og viktig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte gir meg hjelp og støtte når jeg trenger det	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Voksne i min by/på mitt hjemsted får meg til å føle meg viktig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Voksne i min by/på mitt hjemsted hører på det jeg har å si	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

19. Hvordan passer utsagnene nedenfor på dine foreldre/foresatte?

(Oppgi kun ett svar pr. Spørsmål)

	Stemmer svært dårlig	Stemmer ganske dårlig	Stemmer ganske godt	Stemmer svært godt
Mine foreldre/foresatte synes jeg skal ta videregående opplæring	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte syntes jeg skulle velge utdanningsprogram i videregående selv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte går ofte på foreldremøter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte er svært interessert i skolearbeidet mitt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte synes det er viktig at jeg gjør leksene mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mine foreldre/foresatte hjelper meg sjeldent med skolearbeidet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

20. Hvor viktig er det følgende for deg i ditt liv? Skalaen går fra "Ikke viktig" til "veldig viktig". Klikk en gang for hver linje.

(Oppgi kun ett svar pr. spørsmål)

	Ikke viktig	Litt viktig	Vet ikke	Ganske viktig	Veldig viktig
Hjelpe andre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bidra til å gjøre verden til et bedre sted å leve	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Bidra til at det blir mindre sult og fattigdom i verden	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Sørge for at alle mennesker blir rettferdig behandlet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Stå opp for at alle har de samme rettighetene og mulighetene	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Gjøre det jeg mener er rett, selv om vennene mine gjør narr av meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Stå opp for det jeg tror på, selv om det er upopulært	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Snakke sant, selv om det ikke er lett	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Akseptere konsekvensene av mine handlinger når jeg gjør noe feil eller dumt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Gjøre mitt beste, selv om jeg har en oppgave jeg ikke liker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Gi tid og penger for at andre skal få et bedre liv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

21. Hvor godt beskriver disse påstandene deg? Oppgi hvor godt hver påstand passer til å beskrive deg på en skala fra 1 (Ikke godt) til 5 (Veldig godt).

(Oppgi kun ett svar pr. spørsmål)

	1 (Ikke godt)	2	3	4	5 (Veldig godt)
Når jeg ser at noen blir utnyttet vil jeg hjelpe dem	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Det plager meg når vonde ting skjer med gode mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Det plager meg når vonde ting skjer med alle mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg synes synd på mennesker som ikke har det jeg har	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Når jeg ser at noen blir plaget, synes jeg synd på dem	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg blir trist av å se noen som ikke har venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Når jeg ser en annen som er såret eller opprørt, synes jeg synd på dem	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

22. Tenk på noen som kjenner deg godt. Hvordan vil de rangere deg på hver av de følgende påstandene?

(Oppgi kun ett svar pr. spørsmål)

	Ikke likt meg	Litt likt meg	En del likt meg	Ganske likt meg	Veldig mye likt meg
At jeg vet mye om folk fra andre kulturer	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
At jeg trives med å være sammen med	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

folk fra en
annen kultur
en min

23. Alle er en del av ulike grupper og fellesskap som for eksempel familier, skoleklasser, nabolag, idrettslag, by, land og storsamfunn. Hvor godt stemmer de følgende utsagnene om hvordan du opplever å være med i slike grupper og fellesskap?

(Oppgi kun ett svar pr. spørsmål)

	Stemmer helt	Stemmer godt	Stemmer ganske godt	Stemmer noe	Stemmer ikke særlig godt	Stemmer ikke i det hele tatt
Jeg opplever sterk samhörighet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever ansvar overfor andre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at det er godt å være en del av et fellesskap	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at jeg bidrar uten at jeg forventer å få noe igjen for det	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at jeg betyr mye for andre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at andre betyr mye for meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at jeg har tillit til mennesker flest	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg
opplever at
vi er
avhengige
av
hverandre

24. Hvor ofte møter du venner utenom skoletiden?

(Oppgi kun ett svar)

- Sjelden eller aldri
- Mindre enn ukentlig
- Ukentlig
- Daglig

25. Hvor ofte snakker du med vennene dine på telefonen (både hustelefon og mobiltelefon)?

(Oppgi kun ett svar)

- Mer enn 3 ganger om dagen
- 2-3 ganger om dagen
- 1 gang om dagen
- 4-6 ganger i uken
- Sjeldnere

26. Hvor ofte tar du kontakt med vennene dine gjennom sosiale medier, som for eksempel Facebook, My Space, Twitter, andre apper (f.eks. Instagram og Snapchat), spill (f.eks. Xbox), YouTube, osv.?

(Oppgi kun ett svar)

- Sjelden eller aldri
- Mindre enn ukentlig
- Ukentlig
- Daglig
- Hele tiden

27. Hvor godt stemmer følgende utsagn med dine erfaringer?

(Oppgi kun ett svar pr. spørsmål)

	1 (Helt usant)	2	3	4	5	6	7 (Helt sant)
Ved å være på nettet føler jeg meg mer involvert i hva som skjer med mine venner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Ved å være på nettet kan jeg og mine venner opprettholde vennskapet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Ved å være på nettet kan jeg forbedre mitt forhold til vennene mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg oppmuntrer vennene mine på nettet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg bruker nettet for å kommunisere med venner jeg ser regelmessig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Å være på nettet hjelper meg å opprettholde min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

posisjon i
vennegje
ngen

28. I løpet av det siste året, har du...

(Oppgi kun ett svar pr. spørsmål)

	Aldri	Av og til	Ofte	Nesten alltid	Alltid
...syntes at det var vanskelig å ikke sjekke sosiale medier mens du gjorde noe annet (for eksempel skolearbeid)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
...følt behov for å bruke sosiale medier oftere og oftere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
...følt behov for å sjekke meldinger på sosiale medier oftere og oftere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
...ikke konsentrert deg på skolen eller mens du gjorde lekser fordi du var på sosiale medier?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
...ikke fått nok søvn fordi du var på sosiale medier til sent på natten?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
...ikke gitt oppmerksomhet til/ikke brydd deg om folk rundt deg (for eksempel	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

familie eller venner) fordi du var på sosiale medier?

...ikke hatt interesse av hobbyer eller andre aktiviteter fordi du heller ville være på sosiale medier?

...hatt alvorlige problemer på skolen fordi du brukte for mye tid på sosiale medier?

29. Mobbing

Vi sier at en elev BLIR MOBBET når en annen elev eller flere andre elever sier eller gjør vonde og ubehagelige ting mot han eller henne. Det er også mobbing når en elev blir ertet gjentatte ganger på en måte som han eller hun ikke liker eller når han eller hun med vilje blir holdt utenfor. Men det er IKKE MOBBING når to omtrent like sterke (jevnbryrdige) elever slåss eller krangler. Det er heller ikke mobbing når noen blir ertet på en snill og vennskapelig måte.

30. Hvor ofte er du blitt mobbet på skolen i løpet av de siste skolemånedene?

(Oppgi kun ett svar)

- Jeg er ikke blitt mobbet på skolen i løpet av de siste skolemånedene
- Bare en sjelden gang
- 2 eller 3 ganger i måneden
- Omtrent 1 gang i uken
- Flere ganger i uken

31. Hvor ofte har du selv vært med på å mobbe en annen elev/andre elever på skolen i løpet av de siste skolemånedene?

(Oppgi kun ett svar)

- Jeg har ikke mobbet en annen elev/andre på skolen i løpet av de siste skolemånedene

- Bare en sjelden gang
- 2 eller 3 ganger i måneden
- Omtrent 1 gang i uken
- Flere ganger i uken

32. Hvor ofte har du blitt mobbet på skolen i løpet av de siste skolemånedene på måtene som er beskrevet her?

(Oppgi kun ett svar pr. spørsmål)

	Jeg har ikke blitt mobbet på denne måten de siste skolemånedene	1 eller 2 ganger	2 eller 3 ganger i måneden	Omtrent en gang i uken	Flere ganger i uken
Andre elever har med vilje holdt meg utenfor, stengt meg ute fra venneflokken eller oversett meg helt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Andre elever har spredt løgner eller falske rykter om meg og prøvd å få andre til å mislike meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er blitt mobbet med ubehagelige ord, kommentarer, tegn eller handlinger som har seksuell betydning	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

33. Hvor ofte har du blitt mobbet på følgende måte i løpet av de siste skolemånedene?

(Oppgi kun ett svar pr. spørsmål)

	Jeg har ikke blitt mobbet på denne måten de siste	1 eller 2 ganger	2 eller 3 ganger i måneden	Omtrent en gang i uken	Flere ganger i uken
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skolemånedene

Noen sendte stygge meldinger, innlegg på veggen min, eposter og SMS'er, eller laget en internettside som gjorde narr av meg

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------	--------------------------	--------------------------

Noen tok ufine eller upassende bilder av meg, uten tillatelse, og la dem på internett

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------	--------------------------	--------------------------

34. Klikk i den boksen som best beskriver hvor ofte du har følt deg slik i løpet av de siste ukene.

(Oppgi kun ett svar pr. spørsmål)

	Aldri	Av og til	Ofte	Nesten alltid
Jeg er fornøyd med hvordan jeg har det for tiden	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Livet mitt går bra	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Livet mitt er akkurat slik det skal være	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg kunne tenke meg å forandre mange ting i livet mitt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg skulle ønske livet var annerledes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har et godt liv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg trives med hva som skjer i livet mitt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg har det jeg ønsker meg i livet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har det bedre enn de fleste andre på min alder	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

35. Nedenfor er en liste over noen problemer eller plager. Har du vært plaget av noe av dette de siste 14 dagene?

(Oppgi kun ett svar pr. spørsmål)

	Ikke plaget	Litt plaget	Ganske plaget	Veldig plaget
Vært stadig redd og engstelig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Følt deg anspent eller uroilig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Følt håpløshet når du tenker på framtida	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Følt deg nedenfor og trist	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bekymret deg for mye om forskjellige ting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

36. Hvor stresset blir du av skolearbeidet (både arbeid du skal gjøre på skolen og lekser)?

(Oppgi kun ett svar)

- Ikke i det hele tatt
- Litt
- Ganske mye
- Svært mye

37. Hvorfor har du valgt å ta videregående opplæring?

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Litt enig	Litt uenig	Helt uenig
Fordi det er nødvendig med utdanning for å komme videre i livet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Fordi det ikke var noen andre muligheter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi rådgiver anbefalte meg det	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi vennene mine skulle begynne	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi det er det alle gjør	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi jeg hadde lyst til å gå mer på skole	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi foreldrene mine ikke ville ha meg hjemme uten noe å gjøre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Fordi jeg ikke får meg jobb	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Vet ikke hvorfor	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

38. Hvordan tror du at det kommer til å gå med deg dette skoleåret?

Dersom ingen av alternativene passer helt, velg det som passer best

(Oppgi kun ett svar)

- Jeg vil fullføre med 5-ere og 6-ere i de fleste fag
- Jeg vil fullføre med 4-ere og 5-ere i de fleste fag
- Jeg vil fullføre med 3-ere og 4-ere i de fleste fag
- Jeg vil fullføre med 2-ere og 3-ere i de fleste fag
- Jeg vil fullføre, og jeg vil få 2-ere i de fleste fag
- Jeg kommer til å gjennomføre, men med karakteren 1 eller ikke vurdering i noen fag
- Jeg kommer til å slutte før skoleåret er over

39. Basert på din situasjon det siste året, hvor enig eller uenig er du i disse utsagnene?

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Litt enig	Litt uenig	Helt uenig
Jeg hadde trengt et	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

innføringsår før
vg1 for å bli
bedre faglig
forberedt for
videregående

Hadde det vært
mulig ville jeg
heller begynt å
jobbe etter
tiende klasse
enn å begynne i
videregående

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------

Jeg føler at jeg
mestrer de
fleste fagene i
ungdomsskolen

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------

Jeg strever i
mange fag, men
syntes ikke at
skolen og
lærerne hjelper
meg nok

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------

Jeg strever så
mye med det
faglige at jeg
vurderer å
slutte i
videregående
opplæring

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------

40. Går du dette skoleåret på det tilbudet (utdanningsprogrammet/programrådet) og den skolen du helst vil gå på?

(Oppgi kun ett svar)

- Ja, jeg er elev på det tilbudet og på den skolen jeg helst vil gå på
- Ja, jeg er elev på det tilbudet jeg helst vil, men ikke på den skolen jeg helst vil gå på
- Ja, jeg er elev på den skolen jeg helst vil, men ikke på det tilbudet jeg helst vil gå på
- Nei, jeg er verken elev på det tilbudet eller på den skolen jeg helst vil gå på

41. Hva er den høyeste utdanningen du har tenkt å ta?

(Oppgi kun ett svar)

- Universitet eller høyskoleutdanning av høyere grad (f.eks. master, lektor, advokat, sivilingeniør, lege)
- Universitet eller høyskoleutdanning av lavere grad (f.eks. bachelor, lærer, politi, sykepleier, ingeniør, journalist)
- Videregående skole: studiespesialisering / idrettsfag / musikk, dans og drama

Videregående skole: yrkesfag

Har ikke bestemt meg

Annet

42. Hva er din fars høyeste fullførte utdanning?

(Oppgi kun ett svar)

Universitet eller høyskoleutdanning av høyere grad (f.eks. master, lektor, advokat, sivilingeniør, lege)

Universitet eller høyskoleutdanning av lavere grad (f.eks. bachelor, lærer, politi, sykepleier, ingeniør, journalist)

Videregående skole

Vet ikke

Annet

43. Hva er din mors høyeste fullførte utdanning?

(Oppgi kun ett svar)

Universitet eller høyskoleutdanning av høyere grad (f.eks. master, lektor, advokat, sivilingeniør, lege)

Universitet eller høyskoleutdanning av lavere grad (f.eks. bachelor, lærer, politi, sykepleier, ingeniør, journalist)

Videregående skole

Vet ikke

Annet

44. Nedenfor står noen påstander om hvordan du tenker om deg selv og hva du tenker om å gå på skolen. Sett kryss for hvor enig eller uenig du er i hver enkelt uttalelse.

(Oppgi kun ett svar pr. Spørsmål)

	Helt enig	Enig	Verken enig eller uenig	Uenig	Helt uenig
Jeg gleder meg til å gå på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg liker å gå på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har det gøy på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Alt i alt er jeg glad for at jeg er meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Når jeg blir voksen, er jeg sikker på at jeg vil ha et godt liv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg gjør ting jeg vet at jeg ikke burde gjøre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Vanligvis oppfører jeg meg slik jeg vet jeg skal	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

45. Hvor godt liker du deg på skolen akkurat nå for tiden?

(Oppgi kun ett svar)

- Liker meg veldig godt
- Liker meg ganske godt
- Liker meg ikke særlig godt
- Liker meg ikke i det hele tatt

46. I hvilken grad beskriver disse utsagnene hvordan du har det?

(Oppgi kun ett svar pr. spørsmål)

I svært stor grad I ganske stor grad I noen grad I liten grad Ikke i det hele tatt

Jeg har nok kontakt med andre mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler meg ofte ensom	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler ofte at andre ikke forstår meg og min situasjon	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg synes det er vanskelig å snakke med mennesker jeg ikke har møtt før	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler meg ofte ensom selv når jeg er sammen med andre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler at andre bryr seg om meg	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

**47. Nedenfor står noen påstander om skolearbeid. Klikk en gang for hver påstand.
(Oppgi kun ett svar pr. spørsmål)**

	Helt enig	Enig	Verken enig eller uenig	Uenig	Helt uenig
Jeg kan gjøre det vanskeligste skolearbeidet dersom jeg går inn for det	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Dersom jeg har nok tid kan jeg utføre alt skolearbeidet på en god måte	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg kan gjøre nesten alt skolearbeidet dersom jeg ikke gir opp	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg får til skolearbeidet selv om det er vanskelig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er sikker på å mestre det vi lærer i timene	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er sikker på at jeg kan finne ut hvordan jeg skal utføre det mest vanskeligste skolearbeidet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

48. I løpet av dette skoleåret: Hvor ofte har du hatt følgende opplevelser når du holder på med skolearbeid.

(Oppgi kun ett svar pr. spørsmål)

	Svært ofte	Ganske ofte	Av og til	Ikke i det hele tatt
Jeg legger ned all min energi når jeg holder på med skolearbeid (som for eksempel lekser, prosjektarbeid, gruppearbeid og annet skolearbeid)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg setter meg selv på prøve når jeg holder på med skolearbeid	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg arbeider konsentrert når jeg driver med skolearbeid	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg setter meg mål når jeg holder på med skolearbeid	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg finner ut hvordan jeg kan nå mine mål i skolearbeidet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg planlegger
hvordan jeg
skal gjøre
skolearbeid

49. Nedenfor står noen påstander om klassen din og det å gå på skolen. Klikk på et svaralternativ på hver linje for hvor enig eller uenig du er i uttalelsen.

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Enig	Verken enig eller uenig	Uenig	Helt uenig
Elevene i klassen min liker å være med hverandre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
De fleste i klassen min er snille og hjelpsomme	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
De andre elevene godtar meg som jeg er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Når en elev i klassen min er lei seg, er det alltid noen andre i klassen som vil prøve å hjelp	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elevene i klassen min behandler hverandre med respekt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg får mye oppmuntring og støtte på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne på skolen oppmuntrer meg til å bli så god som mulig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

50. Nedenfor står noen flere påstander om dine lærere. Klikk på hver linje for hvor enig eller uenig du er i hver uttalelse.

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Enig	Verken enig eller uenig	Uenig	Helt uenig
Lærerne mine viser tillit til at jeg kan gjøre det bra i faget	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine gir meg valgmulighet er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine oppmuntrer meg til å stille spørsmål	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine lytter til hvordan jeg har lyst til å gjøre ting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler meg forstått av lærerne mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg kan være åpen med lærerne mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine godtar meg som jeg er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har stor tillit til lærerne mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine gir meg fullstendige og nøyaktige svar på spørsmålene mine	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne mine bryr seg om meg som person	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

51. Les gjennom beskrivelsene nedenfor og tenk på hva som er typisk for din skole og dine lærere. Klikk på det alternativet som passer best med din opplevelse.

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Enig	Vet ikke	Uenig	Helt uenig
Elever bli behandlet med respekt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne respekterer elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne er snille med elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne bryr seg om elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Alle blir vennlig behandlet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever føler at de blir rettferdig behandlet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne forsøker å hjelpe elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne ønsker å bli kjent med alle elevene	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Alle liker elever for den de er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne hører på elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne aksepterer elever for den de er	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever føler seg trygge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever har det bra	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever føler seg velkommen hver dag	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne vil at elever skal lykkes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Elever vet at alle vil være hyggelig med de	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lærerne respekterer ikke elever	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever blir savnet når de ikke er der	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever føler at andre elever bryr seg om de	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Folk gjør narr av hverandre	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

52. Hvor enig eller uenig er du i disse utsagnene?

(Oppgi kun ett svar pr. spørsmål)

	Helt enig	Litt enig	Litt uenig	Helt uenig
Jeg ønsker å ha så mye å si som mulig på avgjørelser som blir tatt på min skole	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Det er mange måter for elever som meg å ha innflytelse på hva skolen gjør	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg vet hvordan jeg kan få informasjon om et tema hvis jeg vil forbedre et problem på skolen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg vet hvordan regler- og retningslinjer blir bestemt på min skole	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har snakket med voksne på skolen om saker jeg ønsker å forbedre på min skole	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg har snakket med andre elever om saker jeg ønsker å forbedre på min skole	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Dersom det dukker opp problemer som påvirker elever på skolen min, gjør vi noe med det	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever burde jobbe for å forbedre skolen vår, selv om vi ikke alltid kan gjøre de endringene vi ønsker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever har et ord med i laget når det gjelder hva som skjer på skolen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elever på denne skolen får hjelpe til med å planlegge spesielle aktiviteter og arrangementer	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Det er et elevråd her som får være med å bestemme viktige saker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

53. Nedenfor finner du en del utsagn om følelser og tanker. Klikk på det som best beskriver din opplevelse for hvert utsagn de siste 2 ukene.

(Oppgi kun ett svar pr. spørsmål)

	Ikke i det hele tatt	Sjelden	En del av tiden	Ofte	Hele tiden
Jeg har vært optimistisk med hensyn til fremtiden	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har følt meg nyttig	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg har følt meg avslappet	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har følt interesse for andre mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har hatt mye energi	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har håndtert problemer godt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har tenkt klart	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vært fornøyd med meg selv	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har følt nærhet til andre mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har følt meg selvsikker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vært i stand til å ta beslutninger	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har følt meg elsket	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vært interessert i nye ting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vært i godt humør	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

54. For hver av påstandene under, kryss av i hvilken grad de passer for deg

(Oppgi kun ett svar pr. spørsmål)

	Hele tiden	Ofte	En del av tiden	Sjelden	Ikke i det hele tatt
Jeg respekterer kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er fornøyd med kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Jeg synes at kroppen min i det minste har noen gode kvaliteter	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har en positiv holdning til kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg lytter til kroppens behov	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er glad i kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg setter pris på de ulike og unike sidene ved kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Oppførselen min viser min positive holdning til kroppen min, for eksempel at jeg går med hodet hevet og smiler	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg er komfortabel i kroppen min	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg føler meg fin å se på selv om jeg er ulik medias fremstillinger av tiltrekkende mennesker	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

55. Nedenfor finner du noen spørsmål om gjennomføring av "Drømmeklassen". Svar det som passer best med din opplevelse.

(Oppgi kun ett svar pr. spørsmål)

	Ja	Nei
Vi gjennomførte "Drømmeklassen 1" (3-timers opplegg) i klassen	<input type="checkbox"/>	<input type="checkbox"/>

min i oppstarten av skoleåret i fjor høst

Vi gjennomførte "Drømmeklassen 2" (3-timers opplegg) i klassen min i vinter

56. I hvilken grad stemmer utsagnene med din erfaring med Drømmeklassen?

(Oppgi kun ett svar pr. spørsmål)

	I svært stor grad	I ganske stor grad	I noen grad	I liten grad	Ikke i det hele tatt
Vi har brukt Drømmeklass eplakaten	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Vi har jobbet med klasse miljøet med kontaktlærer mellom Drømmeklassen 1 og 2	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg har vært med på aktiviteter sammen med elevmentorene	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at elevmentorene klarer å hjelpe elever som har blitt stående utenfor	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jeg opplever at klassen min er positiv til elevmentorene	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Elevmentorene våre er jevnlig innom klassen	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

57. Kjenner du til at skolen har et nærværsteam?

(Oppgi kun ett svar)

Ja

Nei

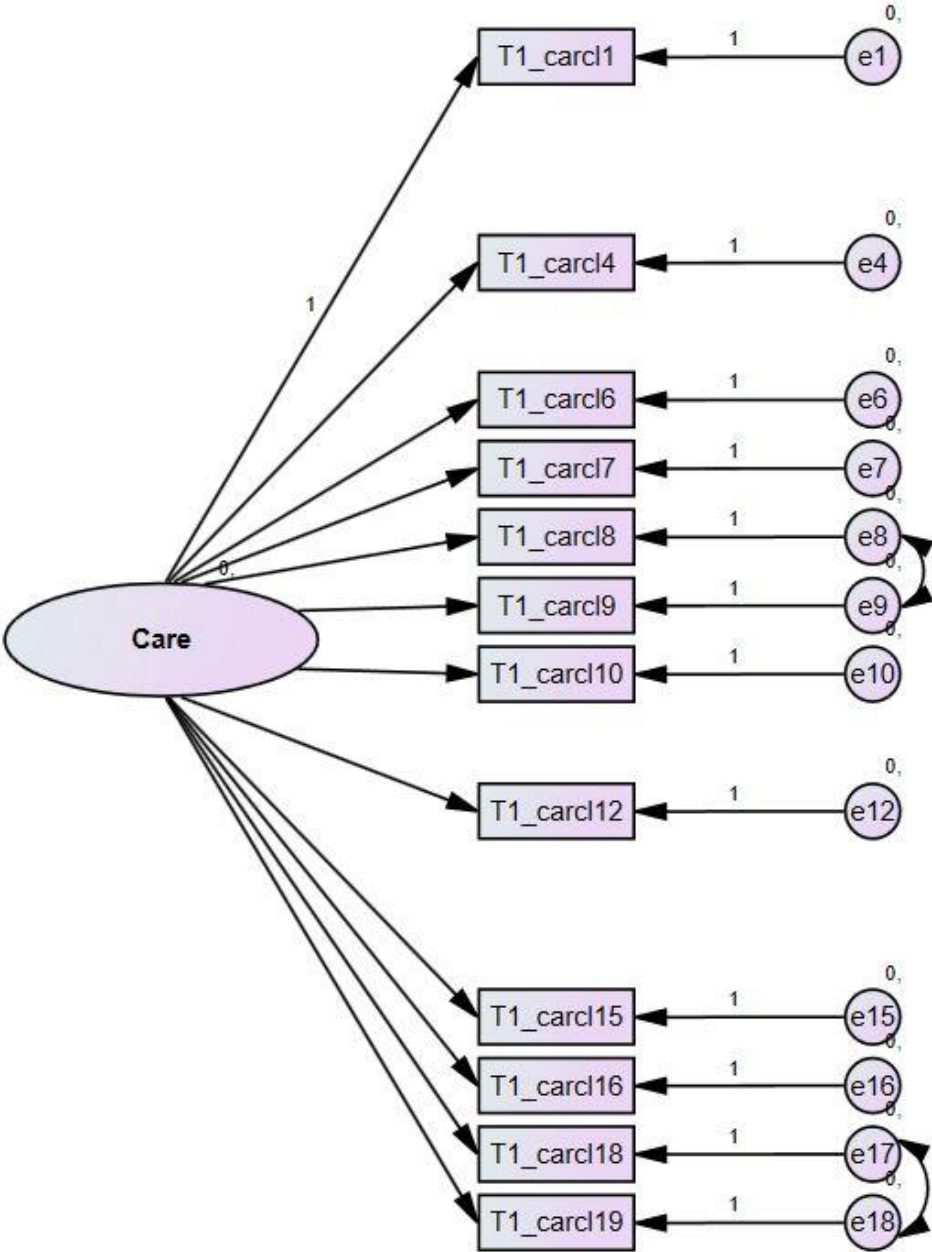
**58. Hvis ja:****(Oppgi kun ett svar pr. spørsmål)**

	Ja	Nei
Kjenner du til noen som jobber i Nærværsteamet på din skole?	<input type="checkbox"/>	<input type="checkbox"/>
Vet du hvor Nærværsteamet på din skole holder til?	<input type="checkbox"/>	<input type="checkbox"/>
Har du vært i kontakt med Nærværsteamet på din skole?	<input type="checkbox"/>	<input type="checkbox"/>

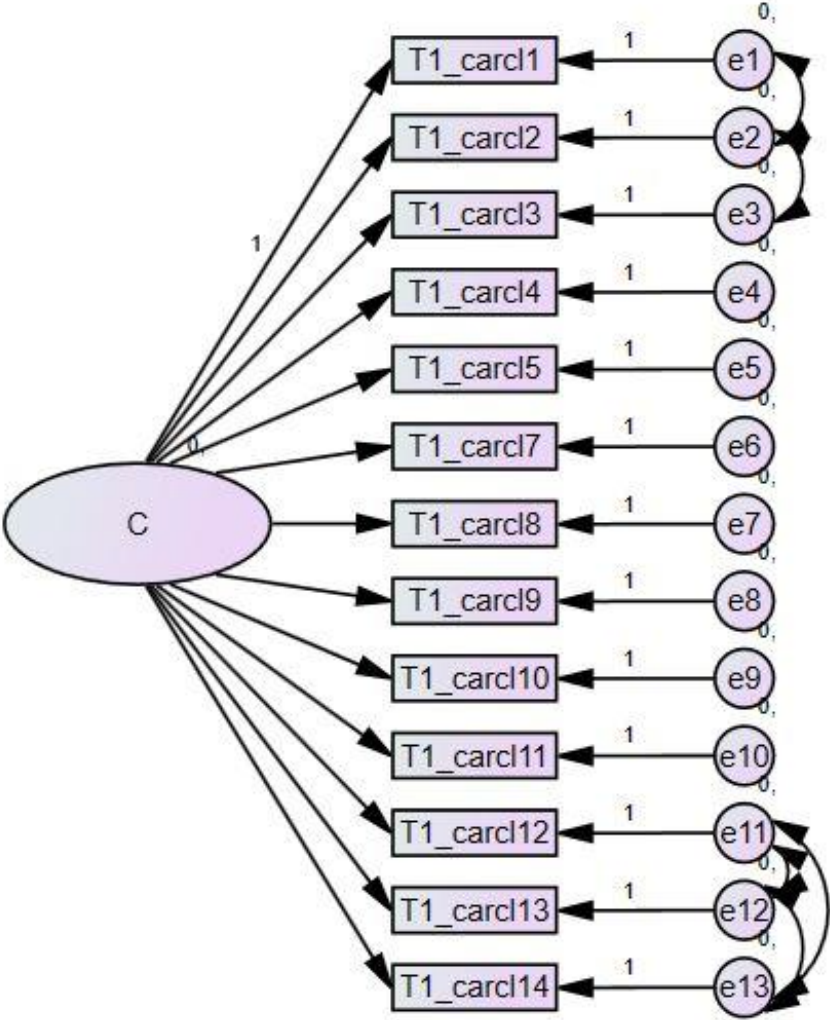
59. Hvis ja, hvordan opplevde du møtet med dem?**(Oppgi kun ett svar)**

1 (Svært godt)	2	3	4	5 (Svært dårlig)
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Appendix D - Figure 3. CFA 1 with Error Correlations



Appendix E – Figure 4. CFA 2 with Error Correlations



Appendix F - SPSS Synthax

* Encoding: UTF-8.

---Cleansing dataset---

```
FREQUENCIES VARIABLES=KJØNN T1_countryborn T1_countrybornmo
T1_countrybornfa T1_ses T1_ses_A
  T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl6 T1_carcl7 T1_carcl8
T1_carcl9
  T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14 T1_carcl15 T1_carcl16
T1_carcl17 T1_carcl18
  T1_carcl19 T1_carcl20
/STATISTICS=STDDEV VARIANCE RANGE MINIMUM MAXIMUM MEAN
MEDIAN
/ORDER=ANALYSIS.
```

```
DESCRIPTIVES VARIABLES=T1_age
/STATISTICS=MEAN STDDEV MIN MAX.
```

```
EXAMINE VARIABLES=KJØNN T1_age T1_countryborn T1_countrybornmo
T1_countrybornfa T1_ses T1_ses_A
  T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl6 T1_carcl7 T1_carcl8
T1_carcl9
  T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14 T1_carcl15 T1_carcl16
T1_carcl17 T1_carcl18
  T1_carcl19 T1_carcl20
/PLOT BOXPLOT STEMLEAF HISTOGRAM NPLOT
/COMPARE GROUPS
/STATISTICS DESCRIPTIVES EXTREME
/CINTERVAL 95
/MISSING LISTWISE
/NOTOTAL.
```

```
EXAMINE VARIABLES=KJØNN T1_age T1_countryborn T1_countrybornmo
T1_countrybornfa T1_ses T1_ses_A
/PLOT BOXPLOT STEMLEAF HISTOGRAM NPLOT
/COMPARE GROUPS
/STATISTICS DESCRIPTIVES EXTREME
/CINTERVAL 95
/MISSING LISTWISE
/NOTOTAL.
```

```
EXAMINE VARIABLES=T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl6
T1_carcl7 T1_carcl8
```

```
T1_carcl9 T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14 T1_carcl15
T1_carcl16 T1_carcl17
  T1_carcl18 T1_carcl19 T1_carcl20
/PLOT BOXPLOT STEMLEAF HISTOGRAM NPLOT
/COMPARE GROUPS
/STATISTICS DESCRIPTIVES EXTREME
/CINTERVAL 95
/MISSING LISTWISE
/NOTOTAL.
```

---Descriptives---

```
FREQUENCIES VARIABLES=KJØNN T1_countryborn T1_countrybornmo
T1_countrybornfa T1_ses
  T1_ses_A
/STATISTICS=STDDEV VARIANCE RANGE MINIMUM MAXIMUM MEAN
MEDIAN MODE
/HISTOGRAM NORMAL
/ORDER=ANALYSIS.
```

```
DESCRIPTIVES VARIABLES=T1_age
/STATISTICS=MEAN STDDEV VARIANCE RANGE MIN MAX.
```

```
FREQUENCIES VARIABLES=T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5
T1_carcl6 T1_carcl7
  T1_carcl8 T1_carcl9 T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14
T1_carcl15 T1_carcl16
  T1_carcl17 T1_carcl18 T1_carcl19 T1_carcl20
/STATISTICS=STDDEV RANGE MEAN MEDIAN MODE
/ORDER=ANALYSIS.
```

```
FREQUENCIES VARIABLES=T1_ses_A
/STATISTICS=STDDEV VARIANCE RANGE MINIMUM MAXIMUM MEAN
/ORDER=ANALYSIS.
```

---Other Descriptives---

```
CROSSTABS
/TABLES=T1_age BY T1_ses_A
/FORMAT=AVALUE TABLES
/CELLS=COUNT
/COUNT ROUND CELL.
```

```
CROSSTABS
/TABLES=KJØNN BY T1_ses_A
```

```
/FORMAT=AVALUE TABLES
/CELLS=COUNT
/COUNT ROUND CELL.
```

---Testing Normality---

```
EXAMINE VARIABLES=T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16
T1_carc17 T1_carc18
  T1_carc19 T1_carc10 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc117
  T1_carc118 T1_carc119 T1_carc120
/PLOT BOXPLOT STEMLEAF HISTOGRAM NPLOT
/COMPARE GROUPS
/STATISTICS DESCRIPTIVES EXTREME
/CINTERVAL 95
/MISSING LISTWISE
/NOTOTAL.
```

---Splitting of data---

```
USE ALL.
COMPUTE filter_$=(uniform(1)<=.50).
VARIABLE LABELS filter_$ 'Approximately 50% of the cases (SAMPLE)'.
FORMATS filter_$ (f1.0).
FILTER BY filter_$.
EXECUTE.
```

```
DATASET COPY Dataset2.
DATASET ACTIVATE Dataset2.
FILTER OFF.
USE ALL.
SELECT IF (NOT(filter_$=0)).
EXECUTE.
DATASET ACTIVATE Dataset2.
```

--- EFA Comparisons (RandomData1)---

PC EFA

```
FACTOR
/VARIABLES T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16 T1_carc17
T1_carc18
  T1_carc19 T1_carc10 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc117
  T1_carc118 T1_carc119 T1_carc120
/MISSING PAIRWISE
```

```
/ANALYSIS T1_carc1 T1_carc2 T1_carc3 T1_carc4 T1_carc5 T1_carc6 T1_carc7
T1_carc8
  T1_carc9 T1_carc10 T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15
T1_carc16 T1_carc17
  T1_carc18 T1_carc19 T1_carc20
/PRINT INITIAL KMO EXTRACTION ROTATION
/FORMAT SORT BLANK(.30)
/CRITERIA MINEIGEN(1) ITERATE(25)
/EXTRACTION PC
/CRITERIA ITERATE(25) DELTA(0)
/ROTATION OBLIMIN
/METHOD=CORRELATION.
```

ML EFA

FACTOR

```
/VARIABLES T1_carc1 T1_carc2 T1_carc3 T1_carc4 T1_carc5 T1_carc6 T1_carc7
T1_carc8
  T1_carc9 T1_carc10 T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15
T1_carc16 T1_carc17
  T1_carc18 T1_carc19 T1_carc20
/MISSING PAIRWISE
/ANALYSIS T1_carc1 T1_carc2 T1_carc3 T1_carc4 T1_carc5 T1_carc6 T1_carc7
T1_carc8
  T1_carc9 T1_carc10 T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15
T1_carc16 T1_carc17
  T1_carc18 T1_carc19 T1_carc20
/PRINT INITIAL KMO EXTRACTION ROTATION
/FORMAT SORT BLANK(.30)
/CRITERIA MINEIGEN(1) ITERATE(25)
/EXTRACTION ML
/CRITERIA ITERATE(25) DELTA(0)
/ROTATION OBLIMIN.
```

PFA EFA

FACTOR

```
/VARIABLES T1_carc1 T1_carc2 T1_carc3 T1_carc4 T1_carc5 T1_carc6 T1_carc7
T1_carc8
  T1_carc9 T1_carc10 T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15
T1_carc16 T1_carc17
  T1_carc18 T1_carc19 T1_carc20
/MISSING PAIRWISE
/ANALYSIS T1_carc1 T1_carc2 T1_carc3 T1_carc4 T1_carc5 T1_carc6 T1_carc7
T1_carc8
  T1_carc9 T1_carc10 T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15
T1_carc16 T1_carc17
  T1_carc18 T1_carc19 T1_carc20
```

```
/PRINT INITIAL KMO EXTRACTION ROTATION
/FORMAT SORT BLANK(.30)
/CRITERIA MINEIGEN(1) ITERATE(25)
/EXTRACTION PAF
/CRITERIA ITERATE(25) DELTA(0)
/ROTATION OBLIMIN
/METHOD=CORRELATION.
```

--EFA with ML (Dataset1)---

```
FACTOR
/VARIABLES T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16 T1_carc17
T1_carc18
T1_carc19 T1_carc110 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc117
T1_carc118 T1_carc119 T1_carc120
/MISSING PAIRWISE
/ANALYSIS T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16 T1_carc17
T1_carc18
T1_carc19 T1_carc110 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc117
T1_carc118 T1_carc119 T1_carc120
/PRINT UNIVARIATE INITIAL CORRELATION KMO EXTRACTION ROTATION
/FORMAT SORT
/PLOT EIGEN
/CRITERIA MINEIGEN(1) ITERATE(25)
/EXTRACTION ML
/CRITERIA ITERATE(25) DELTA(0)
/ROTATION OBLIMIN.
```

Forcing EFA ML with 1 factor loading, .55 cut off and removing two items (T1_carc117 and T1_carc120)

```
FACTOR
/VARIABLES T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16 T1_carc17
T1_carc18
T1_carc19 T1_carc110 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc118
T1_carc119
/MISSING PAIRWISE
/ANALYSIS T1_carc11 T1_carc12 T1_carc13 T1_carc14 T1_carc15 T1_carc16 T1_carc17
T1_carc18
T1_carc19 T1_carc110 T1_carc111 T1_carc112 T1_carc113 T1_carc114 T1_carc115
T1_carc116 T1_carc118
T1_carc119
/PRINT UNIVARIATE INITIAL CORRELATION KMO EXTRACTION ROTATION
/FORMAT SORT
/PLOT EIGEN
```



```
/CRITERIA FACTORS(1) ITERATE(25)
/EXTRACTION ML
/CRITERIA ITERATE(25) DELTA(0)
/ROTATION OBLIMIN.
```

---Reliability Analysis---

Before removed items

RELIABILITY

```
/VARIABLES=T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl6 T1_carcl7
T1_carcl8
T1_carcl9 T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14 T1_carcl15
T1_carcl16 T1_carcl18
T1_carcl19 T1_carcl17 T1_carcl20
/SCALE('CCS') ALL
/MODEL=ALPHA
/STATISTICS=DESCRIPTIVE SCALE CORR
/SUMMARY=TOTAL.
```

After removed items

RELIABILITY

```
/VARIABLES=T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl6 T1_carcl7
T1_carcl8
T1_carcl9 T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14 T1_carcl15
T1_carcl16 T1_carcl18
T1_carcl19
/SCALE('CCS') ALL
/MODEL=ALPHA
/STATISTICS=DESCRIPTIVE SCALE CORR
/SUMMARY=TOTAL.
```

---CFA (Dataset2) Performed in SPSS AMOS---

RELIABILITY

```
/VARIABLES=T1_carcl1 T1_carcl4 T1_carcl6 T1_carcl7 T1_carcl8 T1_carcl9 T1_carcl10
T1_carcl12 T1_carcl15 T1_carcl16 T1_carcl18 T1_carcl19
/SCALE('ALL VARIABLES') ALL
/MODEL=ALPHA
/STATISTICS=DESCRIPTIVE SCALE CORR
/SUMMARY=TOTAL CORR.
```

---CFA 13-item Reliability Analysis---

RELIABILITY

```
/VARIABLES=T1_carcl1 T1_carcl2 T1_carcl3 T1_carcl4 T1_carcl5 T1_carcl7 T1_carcl8  
T1_carcl9 T1_carcl10 T1_carcl11 T1_carcl12 T1_carcl13 T1_carcl14  
/SCALE('ALL VARIABLES') ALL  
/MODEL=ALPHA  
/STATISTICS=DESCRIPTIVE SCALE CORR  
/SUMMARY=TOTAL CORR.
```