

Inclusion and Well-Being of International Psychology Students at the University of Groningen.

About the Impact of the "Buddy Project"

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Master Thesis

Applied Social Psychology

S3608379

January 2023

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Abstract

The current work explores an intervention aimed to help international students arriving at the University of Groningen perceive a higher sense of support and inclusion, namely: the "Buddy Project." The project pairs first-year students with more senior students to support them during the challenges they face in their first study year. We hypothesized that participants of the project score higher on well-being and perceived support and lower on loneliness than non-participating first-year students. Further, we hypothesized that inclusion and in-group identification would mediate this relationship. We did not find significant differences between the groups and, therefore, could not conduct a mediation analysis. Generally, we found high scores on inclusion, well-being, and perceived support in all participants. Future research is needed to investigate the underlying processes behind and the stability of these high scores to analyze further whether and how an intervention like the "Buddy Project" may contribute to students' adjustment.

Keywords: international students, inclusion, perceived support, Buddy Project, well-being, adjustment

Inclusion and Well-being of International Psychology Students at the University of Groningen.

About the impact of the "Buddy Project."

Beginning to study at a university often marks a significant life change in a young person's life. For many students, it is their first time moving away from their families, and it brings many challenges, like being more responsible and self-sufficient. According to Bronfenbrenner (1979), first-year students undergo an ecological transition in which they must find new roles in the university context. These transitions can be accompanied by a great deal of stress (Smith & Khawaja, 2011). This stress can be due to a high study load and a lack of confidence in their ability to handle it (Dwyer & Cummings, 2001). Moreover, being away from one's familiar social network may cast additional stress due to the decreased social support experienced (Wintre & Yaffe, 2000).

In recent years, universities have been encouraging an internationalization of the student body since they are – among other motives - striving to increase cultural awareness and diversity (Bevis, 2002). In the Netherlands, the number of international students in 2020 has more than tripled since 2006, with 103.700 international students enrolled in one of the Dutch universities (Statista, 2022). A quarter of the students at the University of Groningen consist of international students representing 127 different nationalities (*University of Groningen*, 2022).

Compared with first-year students studying in their home country, international students, who move away from their home country to pursue their academic careers, face a whole additional set of obstacles and challenges (Khanal & Ghaulee, 2019). These students have to adjust to a different culture and face challenges like finding housing in a new country or getting along without being proficient in the local language. Furthermore, they might not have any social contacts in the new host country, thereby lacking social support. This lack of

support can lead to loneliness and high levels of stress at the beginning of one's student life (McLachlan & Justice, 2009; Smith & Khawaja, 2011).

Since many universities want to attract international students, higher education institutions are motivated to think about factors that could facilitate the start of this new chapter in a young person's life when studying abroad. According to research by Cho and Yu (2015), an essential part of integrating into a new study environment in a different country is feeling included and supported by the university. Matching this goal, in 2017, the Psychology Department of the University of Groningen established a "Buddy Project" to offer support to first-year students from abroad.

The present research revolves around this project and investigates if people participating in it have, compared with non-participants, a higher perception of support and higher well-being during their first months at the university (Ballato & Schroeder, 2021), as well as lower levels of loneliness. We hypothesize that the perceived support and well-being of people participating in the program will be higher than that of people who do not participate and that higher levels of perceived inclusion and university identification may partly mediate this effect. Moreover, we expect loneliness to be lower among participants of the "Buddy Project" compared to non-participants.

Definition and Relevance of Inclusion

One relevant component in international students' adaptation to their new environment concerns their perceived inclusion in their new university. Inclusion on an individual level is defined as the extent to which group members perceive their group to provide them with a sense of belonging and authenticity (Jansen et al., 2014). This definition implies that one's degree of inclusion largely depends on the group in which one wants to be included rather than only on the individual. Hence, the signals an individual receives from a group as to

whether they belong and are appreciated are crucial for reaching high levels of perceived inclusion.

In various settings, research has focused on the importance of inclusion for the well-being of individuals and the functioning of groups. A recent study by Jaiswal and Dyaram (2020) explored the relationship between employees' perceptions of diversity and well-being and the mediating role of perceived inclusion in the workplace. They found that perceived inclusion was a significant mediator in the relationship between diversity and well-being when knowledge diversity, namely individual differences regarding task-related knowledge, experience, and functional background, is taken into account. Furthermore, Adams et al. (2020) studied the relationship between positive leadership and well-being and the mediating effect of inclusion. Their findings suggest that perceived inclusion, compared to discrimination, had a stronger mediating effect on the relationship between positive leadership and well-being. Considering these findings on the relationship and well-being and the role inclusion plays in it, applying it to the diverse university setting might add value and new insights into approaches that might increase well-being in this context.

Inclusion of international students

International students are a source of increased diversity at universities. This diversity can bring both challenges and benefits. Not only does diversity increase the well-being of minorities, but it also increases opportunities which can lead to greater levels of innovation and perception of fairness (Jansen et al., 2014). Meeussen et al. (2014) similarly found in their study that increasing multiculturalism in the student environment increases the perceived acceptance of members of the minority within the group. Since diversity adds value to the university context and the student body, it should be in the universities' interest to foster the inclusion of international students to encourage high well-being within their student body. Inclusion of international students in the university setting can be understood in the

sense of inclusion in the organizational university setting, which relates to inclusion by their peers (in this case: Psychology students) as well as inclusion in the host society (in this case: The Netherlands). Since this study will be realized within a university environment, it will emphasize the first two contexts, namely inclusion in the organizational university setting and with peers. Furthermore, Shore et al. (2011) defined sense of belonging to the group as an essential component of inclusion. Therefore, it is highly plausible to assume that a sense of belonging plays a significant role when moving to a different country. This study will use the concept of perceived sense of belonging to conceptualize international students' feelings of inclusion in the university.¹

Since international first-year students experience considerable changes in their routines, they are prone to experience acculturative stress, which describes the physical, social, and psychological impact of their adaptation to the new culture (Cena et al., 2021). By moving to a foreign country, international students assume the role of a minority in their new situation since they are different from the majority, namely Dutch students, at their university, which can bring along insecurities through a diminished sense of belonging. This implies that the acculturation challenges experienced by international students are closely related to perceiving or not perceiving inclusion. As stated before, these students may experience loneliness and insecurities concerning the foreign environment they engage in and thus may aim to find ways to adapt to these significant changes. This adaptation can be facilitated through a safe sense of belonging regarding social relations and support (Cena et al., 2021). Belonging can be achieved through stable and continuous personal relationships and the regular contact an individual has with the people they are in personal relationships with (Baumeister & Leary, 1995).

¹For this study we used the sense of belonging subscale of the inclusion scale (Jansen et al., 2014). Since sense of belonging is the concept representing inclusion in this study, these terms might be used interchangeably.

Hoffman et al. (2002) introduced five key elements essential to students' perception of a high sense of belonging: peer support, faculty support, classroom comfort, the absence of isolation, and an empathetic faculty. These factors emphasize the social aspects that help students adjust to university life and the role that the university plays in facilitating students' emergence of a sense of belonging. Through an intervention aimed at inclusion, multiple of these critical elements could be fulfilled, which might increase newly arrived students' sense of belonging.

Previous studies have already investigated international students' sense of belonging and well-being. For example, Cena et al. (2021) explored international students' academic and social experiences and how they influence their sense of belonging. They found that locals being friendly to the international students and being familiar with one's environment positively impacted their sense of belonging. These findings could be an impetus for the importance of a person already studying at the university who has lived in the Netherlands for a while to support international first-year Psychology students.

Moreover, there is substantial evidence of the importance of international students' social support (Ye, 2006) and their sense of belonging (Yao, 2015). For example, a study on a sample of 112 Chinese international students at universities in the United States examined the relationship between acculturative stress and well-being. The study's findings indicate that well-being was negatively related to acculturative stress. The results also implicate that social support may act as a buffer that helps to cope with acculturative stress (Ye, 2006) successfully. Furthermore, in her essay, Yao (2015) promotes the importance of increasing international students' sense of belonging to support their transition to campus. She emphasizes that using the concept of sense of belonging underlines the international students' experiences and pushes the dominant culture to the background in examining international students' experiences. Therefore, the concept includes the students' unique needs, which

might help influence their achievements in a culturally inclusive way and will be used within this study to conceptualize inclusion. Together, these findings indicate that inclusion and, more specifically, sense of belonging are relevant predictors of students' adjustment and wellbeing in the first months of starting their studies. Accordingly, interventions enhancing a sense of belonging seem valuable to increase social support and well-being and decrease loneliness and acculturation challenges.

In line with this idea, research by Cho and Yu (2015) suggests that increased organizational support is likely to increase satisfaction and decrease students' stress. For that reason, the present research will emphasize the university's role in enhancing international students' well-being and sense of belonging during their study abroad. This study will add to the existing literature by considering a specific program that the Dutch University of Groningen has already been offering for multiple years. It is supposed to foster inclusion by pairing incoming new students in their first months of study with more senior students. Through the program, international students may enhance their sense of belonging through contact with fellow, more experienced students. Considering the rapidly increasing number of international students in the Netherlands (Statistics Netherlands, 2022), the importance of including these students in the university and society becomes obvious. If the program achieves the goal of decreasing new international students' acculturation stressors and challenges and if it supports their inclusion process, an increase in well-being might be observed. In that case, this could potentially motivate other faculties within the University of Groningen or other universities in the country to include programs like this in their organizational structure.

Social support and the "Buddy Project"

Cohen and Wills (1985) found evidence in their research that social support does not only directly increase well-being but also indirectly. Social support can act as a cushion

regarding stressful events like moving abroad to study at university. The impact of such stressful events may be less strong through that buffer and can therefore promote successful inclusion. Furthermore, previous studies found that perceived social support is relevant for different types of social adjustment in first-year students, including their personal, emotional, and social adjustment (Friedlander et al., 2007; Tao et al., 2000). Therefore, feeling supported might help international students in various domains of their adjustment and also buffer against negative experiences they might have after moving to a different country.

To support international students who have just started studying in the Netherlands, the Psychology Department at the University of Groningen established the "Buddy Project" in 2017. The project's general goal is to facilitate the inclusion of new university students, to help them adjust to their new life in Groningen, and to help them navigate the educational system in the Netherlands (Ballato & Schroeder, 2021). First-year psychology students are matched with students who have already been studying at the university for a while, mainly second- and third-year students. These senior buddies are prepared for their function as a buddy with a short training. Furthermore, pairs are matched according to their interests and field of study. The buddies are available to answer questions and point the new student toward important resources to ease the inclusion of the new student in their study environment. Another task of the buddy is to provide the new student with information on how the working areas of the university operate, including explaining tools like the online student portal Brightspace and pointing the student to other activities in and around the building. Furthermore, the project offers the buddy pairs a range of social activities, such as a Yoga workshop. These activities are held in larger group settings since they are available to all buddy pairs. Typically, they are organized and moderated by the coordinators of the program. The project starts at the beginning of the new academic year and ends after the first semester of their study.

Allport's intergroup contact hypothesis (1954) proposes four key factors that characterize the positive effects of intergroup contact: equal status, intergroup cooperation, common goals, and support from social and institutional authorities. Consequently, these factors should be taken into account when considering sources of social support for international students. The "Buddy Project" of the University of Groningen includes these factors in its attempt to grant new students help to adjust to university life. Since the buddies are also university students, the characteristic of equal status is given. Furthermore, the matching procedure ensures, to a certain extent, common goals between the buddy pairs. The university initiated the project and supports it as well, which provides support from the institutional authorities. Furthermore, intergroup cooperation can occur by connecting new students and students who have already gained more experience studying at the University of Groningen.

As mentioned above, new international students can likely experience acculturation stress and challenges. A program like this might support students by increasing their sense of belonging and decreasing their insecurities about newly entered academic environments. The social support given by the peer could act as a buffer to the stress the new student experiences and aid their adjustment to the university context (Cohen & Wills, 1985).

The present research

By comparing a cohort of Psychology first-year students who either do or do not participate in the department's "Buddy Project," this study investigates whether this intervention, directed at international students' inclusion, indeed translates into higher levels of perceived support and well-being. The present research poses the question: Does participation in the "Buddy Project" affect participants' actual well-being and their perceived support? More specifically, we hypothesize that *participation in such intervention will* predict higher well-being (1.1), a higher perception of support (1.2), and fewer feelings of

loneliness (1.3) in participants in the "Buddy Project" compared with first-year students who did not participate. Furthermore, we hypothesize that the relationship between participation in the project and well-being will be mediated by inclusion (perceived sense of belonging) (2.1). We also hypothesize that the relationship between participation in the project and well-being will be mediated by in-group identification (2.2).

Method

Participants

An a priori power analysis was conducted using the program $G^*Power version 3.1.9.7$ (Faul et al. 2007) to estimate the minimum required sample size. The results of the analysis indicated that to achieve 80% power for detecting a small to medium effect at a significance level of $\alpha = 0.05$ was n = 64 for the independent samples t-test. Three hundred twenty participants were recruited using the student sampling platform SONA. The sample consisted of 131 international first-year Psychology students at the University of Groningen. Since the study aimed to gain insight into international students' experiences at the University of Groningen, the 177 Dutch students in the sample were excluded from the analysis. Furthermore, 14 participants were excluded because they were either younger than 18 years old, did not indicate if they participated in the "Buddy Project," or spent less than 120 seconds answering the survey questions. This yielded a sample of 129 participants. Sixty-three participants of the included sample participated in the university's "Buddy Project," whereas 66 did not. The participants' age ranged from 18 to 31 (M=19.78, SD=1.61). The sample consisted of 99 participants who identified as female, 29 identified as male, and one participant identified as non-binary. A large part (44%) of the sample was German. In total,

²It was assumed that reading and answering the questionnaire would take 15 minutes on average; thus, spending no more than two minutes for filling in the questionnaire signals that the questions and answers were not seriously read and answered.

29 different nationalities were represented from three different continents. The vast majority of participants (91%) came from a European country.

Procedure

Participants were recruited through the first-year SONA pool, and their participation was rewarded with 0.5 study credits. Participants were first informed about the objectives of the study. This was followed by presenting them with an informed consent form stating that their participation in the study was voluntary and that the information obtained was confidential. If they agreed to participate in the study, they were transmitted to the online questionnaire on the Qualtrics platform, which took approximately 15 minutes to complete. The study was concluded with a message thanking the participants for their participation. Moreover, the researcher's e-mail address was provided with the message that they could reach out to the researcher if they wanted to receive a summary of the study results.

We collected the data in November 2022, at which time the participating students had been studying at the university for two months. The university's ethical committee of psychology approved the study. The data obtained during the study was collected via Qualtrics. Personal data identifiers used in this study included SONA IDs which were anonymized after data collection ended.

Materials

An online questionnaire was used to measure different constructs relevant to this study. Participants were asked to answer most questions on a 7-point Likert scale, to which the option "prefer not to answer" was added. The option "prefer not to say" was coded as a missing value. All measures can be found in Appendix A. The following measures of the

questionnaire are presented in chronological order.³ First, participants were asked to provide demographic information about themselves, including their age, gender, nationality, living situation, and whether they had studied at a university before starting their Bachelor program at the University of Groningen. This was followed by questions about their participation in the "Buddy Project." If the participant also participated in the "Buddy Project," they were asked about their experiences within the project. This included questions like "How often did you meet your buddy?" and "How satisfied are you with the contact?".

Inclusion: Sense of Belonging

To gain insight into the participants' sense of inclusion, they were given a set of statements and were asked to answer them. These items were derived from the 16-item perceived group inclusion scale (PGIS; Jansens et al., 2014). For this study, only the sense of belonging subscale was included, consisting of a 4-item group membership subscale and a 4-item group affection subscale. The participants were asked to indicate their level of agreement on a 7-point Likert scale (1 = strongly disagree; 7 = strongly agree) on items like "People in the psychology department (my fellow students, staff members, etc.) give me the feeling that I belong." The items were collapsed into a composite score demonstrating the degree to which the participants felt they belonged to the psychology department (α = .90). The PGIS reliably assesses inclusion and possesses both nomological and predictive validity (Jansen et al., 2014). The belonging subscale of the PGIS has a high reliability of α = .93.

In-group Identification

Identification with being a psychology student was measured with eight items from Leach et al.'s (2008) 20-items hierarchical model of in-group identification. It included items

³Only the measures relevant for this study will be presented. In the questionnaire, multiple measures were included which were relevant for a related project but will be left out in the context of this study. The complete questionnaire can be found in Appendix A.

like "I feel a bond with psychology students" or "The fact that I am a psychology student is an important part of my identity." Participants were asked to indicate their level of agreement on a 7-point Likert scale (1 = strongly disagree; 7 = strongly agree). The items were collapsed into a composite score indicating their identification level with their in-group, namely psychology students ($\alpha = .87$).

University support

Four items from Cho & Yu's (2015) survey were used to measure perceived university support. These items were initially derived from the Perceived Organizational Support scale (POS; Eisenberger et al., 1986). They included items like "Help is available from the University of Groningen when I have a problem." Participants indicated to what degree they agreed on a 7-point Likert scale (1 = strongly disagree; 7 = strongly agree). One item, namely "The University of Groningen fails to appreciate any extra effort from me," was negatively coded and therefore reversed. Initially, the reliability of this scale was low (α = .59). When deleting item three, "The University of Groningen fails to appreciate any extra effort from me," the reliability of the scale was higher (α = .69). The deleted item might have been interpreted differently than the other items since it was negatively framed and reversed which could have led to this lower reliability. The nonexistence of a lack of effort might be different from an actual effort made by the university. The remaining three items were collapsed into a composite score, signifying participants' perceived support from the University of Groningen (α = .69).

Well-being

After this, participants were asked about their well-being since starting to study at the University of Groningen. The items included five items from the satisfaction with life scale

(SWLS; Diener et al., 1985), which were then collapsed into a composite score indicating participants' overall well-being ($\alpha = .86$).

Loneliness

Furthermore, we were interested in exploring possible feelings of loneliness that international first-year students might experience. For this, we used three items on their perceived loneliness (Russell et al., 1978). The statements were "I have nobody to talk to," "I feel as if nobody really understands me," and "I feel completely alone." Participants indicated their degree of agreement on a 7-point Likert scale (1 = strongly disagree; 7 = strongly agree). The items were collapsed into a composite score which indicated their feelings of loneliness ($\alpha = .84$)

At the end of the questionnaire, participants were asked if English was their first language.⁴ If their answer was "No," they were asked, "How difficult was it for you to do this survey in English?" which they were asked to indicate on a 5-point Likert scale (1 = extremely difficult; 5 = extremely easy).⁵ Furthermore, they were presented with the open question: "Is there anything else you want us to know about your study experiences?".

Results

Analytic Strategy

To examine whether there was a difference between participants of the "Buddy Project" and non-participants of the program regarding their well-being, perceived university support, and loneliness, we conducted an independent samples t-test using the software IBM SPSS Statistics (Version 29). If well-being, loneliness, or perceived university support differed between the participants of the two groups, this was supposed to be followed by a

⁴ 26 of the 129 participants indicated that English was their first language.

⁵ The difficulty level was perceived as very easy (M = 4.9, SD = .37).

regression analysis to test for possible mediation. Possible mediators for this relationship were perceived inclusion (sense of belonging) and in-group identification with psychology students.

Descriptives

Within the entire sample, perceived inclusion was relatively high (M = 5.36, SD = .94). Similarly, identification with the psychology department was reasonably high (M = 5.12, SD = 1.03). Perceived university support of the sample (M = 5.06, SD = .82) was also relatively high. The well-being scores of the entire sample were also fairly high (M = 4.83, SD = 1.29). An overview of this data can be found in Figure 1.

We analyzed the possible intercorrelation between perceived inclusion, identification with people in the psychology department, perceived university support, and well-being (Table 1). All variables had a medium to large positive intercorrelation, indicating a strong, positive relationship between them.

Figure 1.

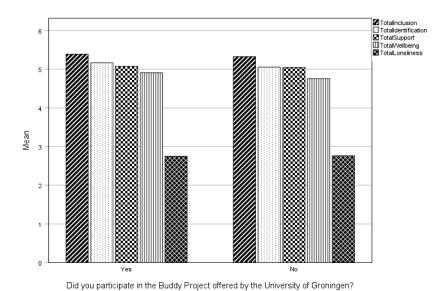


Table 1.

Correlations

		Inclusion	Identification	Support	Well-being
Inclusion	Pearson	1			
	Correlation				
	Sig. (2-tailed)				
	N	129			
Identification	Pearson	.593**	1		
	Correlation				
	Sig. (2-tailed)	<,001			
	N	129	129		
Support	Pearson	.411**	.343**	1	
	Correlation				
	Sig. (2-tailed)	<,001	<,001		
	N	129	129	129	
Well-being	Pearson	.420**	.442**	.459**	1
	Correlation				
	Sig. (2-tailed)	<,001	<,001	<,001	
	N	129	129	129	129
	Mean	5.36	5.12	5.06	4.83
	Standard Deviation	.94	1.03	.82	1.29

^{**.} Correlation is significant at the 0.01 level (2-tailed).

Assumption Test

Before testing the hypotheses, we tested for the assumption of normality and homogeneity of well-being and perceived support. The normality of well-being was assessed using the Shapiro-Wilk test, which indicated that the scores were not normally distributed, W(131) = .958, p < .001. The data can still be described as reasonably normal when observing the histogram (Figure 2) and the QQ plot (Figure 3). Since the sample size was quite large, we decided to continue the data analysis in the planned manner.

Figure 2.

Frequencies of Well-being Scores

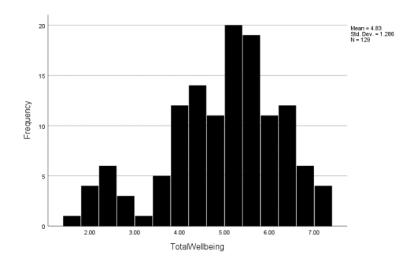
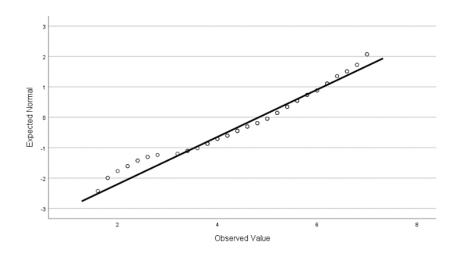


Figure 3.Normality of Well-Being



The normality of the scores of perceived support was also assessed using the Shapiro-Wilk test, which indicated that the score was normally distributed, W(131) = .981, p = .06. The homogeneity of the well-being scores was assessed using Levene's test for equality of variances which indicated equal variances F(1,127) = 1.05, p = .49. The homogeneity of scores of perceived support was assessed using Levene's test for equality of variances which indicated equal variances, F(1,127) = .68, p = .84. This led to the conclusion that homogeneity can be assumed in this sample. The homogeneity of loneliness scores was also

assessed with Levene's test for equality of variances, indicating equal variances, F(1, 127) = 1.23, p = .27. Therefore, homogeneity can be assumed for all of the aforementioned variables.

Hypotheses Tests

Well-being

To test for a possible difference in well-being between the participants and the non-participants of the "Buddy Project," we administered an independent sample t-test. Against our expectation, the well-being score of the 63 participants of the "Buddy Project" (M = 4.9, SD = 1.18) did not significantly differ from the well-being scores of the 66 non-participants (M = 4.75, SD = 1.38), t(129) = .69, p = .492. Thus, the well-being scores of participants and non-participants of the "Buddy Project" did not differ in a meaningful manner.

Perception of Support

Furthermore, we tested the hypothesis that participation in the "Buddy Project" predicts higher perceived support in participants in the "Buddy Project" compared with first-year students who did not participate in the project. To compare the two groups' perceived support scores, we administered an independent sample t-test. Contrary to our expectation, the perceived support scores of the 63 participants of the "Buddy Project" (M = 5.07, SD = .78) did not significantly differ from the perceived support scores of the 66 non-participants (M = 5.04, SD = .85), t(129) = .208, p = .836. We could not find a meaningful difference in the perceived support of participants and non-participants of the "Buddy Project."

Loneliness

To test for potential differences in loneliness scores between participants and non-participants of the "Buddy Project," we administered an independent sample t-test. We hypothesized that participants of the "Buddy Project" would score lower on loneliness than non-participants of the projects. Opposed to our expectations, the loneliness scores of

participants of the project (M =2.74, SD =1.34) and non-participants (M = 2.76, SD = 1.49) did not differ significantly, t(127) = -.045, p = .964. Thus, we could not find a substantial difference in loneliness levels in the two groups.

To conclude, the comparison of the mean scores reported by participants and non-participants of the Buddy-project analysis yields no evidence of a significant difference in well-being, perceived support, or loneliness. Accordingly, the planned mediation analysis to test hypothesis 2 could not be conducted

Additional explorative analyses

To further understand the data, we reviewed the data derived from the questions only presented to the "Buddy Project" participants, asking about their opinions about the project. The usefulness of the project was assessed as relatively high (M = 4.46, SD = 1.84). Participants were reasonably content with their contact with their buddy (M = 4.33, SD = 2.18) and were also fairly glad they participated in the project (M = 4.84, SD = 1.82). The value that the project added to the participants' student life was evaluated as slightly lower (M = 3.46, SD = 1.79).

To better understand the results, we first looked at the data obtained from "Buddy Project" participants on how they experienced this intervention. Since almost half (n = 28) of the "Buddy Project" participants never met up with their buddies, we looked into a possible difference in well-being, perceived university support, and loneliness scores in participants who had or had not met their buddies in person, one-on-one.

To analyze possible differences between participants who met their buddies and those who did not meet their buddies on the five variables (perceived support, well-being, in-group identification, loneliness, and inclusion), we administered an independent samples t-test. The descriptives of the two groups can be found in Table 2. On four of these five variables, no

differences were found with t-values ranging between -1.87 and .99 and p-values ranging between .325 and .66. The only significant difference found was between the well-being scores of participants who met their buddy (M = 4.2, SD = 1.26) and participants who did not meet their buddy (M = 5.4, SD = .88). The results of the independent-sample t-test yielded a significant difference in well-being scores of the two groups, t(61) = 3.13, p = .002. Contrary to our expectations, participants who did not meet their buddies in person scored slightly higher on the well-being scale. An overview of these comparisons can be found in Figure 4. There was no significant difference between "Buddy Project" participants and non-

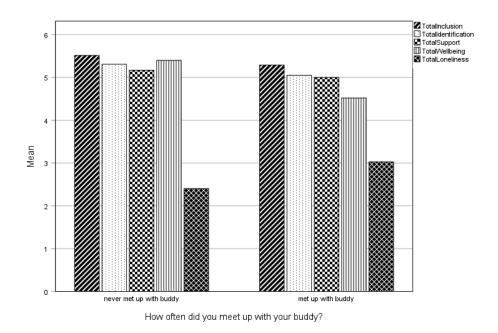
participants on any of the relevant variables. In the present data, we cannot find conclusive evidence to understand the lack of these differences better.

Table 2.

Group Statistics

	Buddy Meet	N	Mean	Std. Dev.
Identification	never met buddy	28	5.31	1.073
	met buddy	35	5.05	.984
Inclusion	never met buddy	28	5.51	1.142
	met buddy	35	5.29	.966
Support	never met buddy	28	5.17	.887
	met buddy	35	5.00	.689
Well-being	never buddy	28	5.40	.878
	met buddy	35	4.52	1.265
Loneliness	never met buddy	28	2.40	1.258
	met buddy	35	3.03	1.354

Figure 4.



Discussion

The current study investigated an intervention designed to increase international first-year psychology students' inclusion at the university of Groningen and the extent to which this program is successful in fostering international students' well-being and sense of belonging. The "Buddy Project" was first introduced in 2017 and matches a senior student at the behavioral and social sciences faculty with a first-year student to support the newcomers during their first months at the university (Ballato & Schroeder, 2021). Apart from providing the first-year student with relevant information, the "Buddy Project" can also be seen as an intervention aimed at facilitating the inclusion of students and helping them adjust to their new life abroad. The sense of belonging that could be fostered by a project like this is viewed as a crucial part of a person's integration (Vermeulen et al., 2021).

Well-being, perceived support and loneliness of international first-year students

We hypothesized that (1.1) participation in the "Buddy Project" predicts higher well-being than non-participation, (1.2) participation in the "Buddy Project" predicts higher perceived support than non-participation, and (1.3) participation in the "Buddy Project" predicts lower levels of loneliness than non-participation. Furthermore, we suspected that (2.1) the relationship between participation and well-being might be mediated by perceived inclusion or (2.2) in-group identification.

Overall, the data clearly revealed that the whole sample scored high on well-being and perceived support to a similar extent, indicating that these first-year students, independent of their participation in the project, were quite content. Contrary to our expectations, the scores on well-being, perceived support, and loneliness of participants and non-participants of the "Buddy Project" did not differ significantly. Although this finding is not in line with our hypotheses, it is a noteworthy and essential finding that first-year students at the University of Groningen are content and feel supported. Moreover, the present research raises at least two important questions: First, one could ask why for this cohort, the scores for well-being and the related variables were so positive, and second, why we found no differences between participants and non-participants of the "Buddy Project."

In contrast to reports on last year's scores of perceived social inclusion (Erasmus Student Network Nederland et al., 2021), in which one-quarter of participants reported not being content with the extent of their social inclusion, the scores of this study's sample seem to be relatively high. One possible reason for the overall high scores could be related to the end of most COVID-19 regulations in the Netherlands. The study year of 2022/2023 marks the first year since the pandemic in which close to no COVID-19 regulations were enforced in the university context in the Netherlands. Many of those regulations enforced within the last years focused on limiting social contact. Newson et al. (2021) demonstrated that face-to-face contact promotes well-being, while digital contact could not achieve these results.

Having unrestricted face-to-face contact with one's faculty members thus can be speculated to be a possible explanation for these overall high scores.

Another question that can be derived from these findings is: Why are the well-being and perceived support scores of participants of the "Buddy Project" not significantly higher than those of first-year Psychology students who did not partake in the project? A possible explanation for this could be that the University of Groningen already provides a welcoming environment supporting the adjustment of newly arrived international students, which is why the "Buddy Project" as an intervention might not necessarily have a significant additional effect on the well-being and perceived support of first-year students. This possible explanation is in line with the finding that participants of the "Buddy Project" evaluated the project as somewhat useful and that they were reasonably content with the contact with their buddy but did not experience the project as a source of added value to their student life. To explore this explanation more groundedly, asking the participants additional questions about the underlying reasons for their high scores would be necessary.

Another factor that may possibly have contributed to the lack of differences between participants and non-participants of the "Buddy Project" may be a relatively low cultural distance (Berry & Annis, 1974) between the international students and their host country, the Netherlands. More than 90% of this sample originated from a European country, with 40% of the sampled participants being German. As stated by Berry and Annis (1974), acculturation stress is more substantial when there is a greater difference between the groups or cultures encountering each other. Since many of the first-year students' countries of origin were Germany or other European countries whose cultures do not differ tremendously from the Dutch culture, there might have been a lower baseline of acculturation stress for many participants, which is a possible reason for these high scores. Future projects could further

explore the possible effects of cultural distance on acculturation stress in international firstyear students.

Another possible direction to reflect on is whether the "Buddy Project" can be further improved to result in significant, measurable benefits for the participating students. One possible factor that might increase the benefits might be a buddy-matching procedure that is based on various factors. Generally, there might be a difference in motivation and reasons for participation of the two individuals that are matched. While one person might be more interested in social activities or solely sharing study material, the other might look for a friend or someone who gives them a greater extent of support. As stated by Allport (1954), common goals are an essential component of intergroup contact. If this common goal is missing, the experience of the "Buddy Project" might not be as valuable for the participants. If all participants were asked about their motivation for participating in the project, the frustration caused by different motivations might be decreased. People with similar motivations could be matched, resulting in participants being more content with the project and reaching the goals that motivated them to participate.

Finally, there may also be a technical explanation for the lack of differences found within this study. It may be the case that the ratings of this survey did not leave room for higher ratings, thereby creating a ceiling effect. As a result of the skewness of scores, a meaningful interpretation of these scores is not possible. However, the obtained means do not even signal a difference in favor of "Buddy Project" participants, rendering this explanation less convincing.

Meeting the buddy

After realizing that nearly half of the participants of the "Buddy Project" we sampled never met up with their senior buddy, we decided to conduct an analysis comparing

participants of the "Buddy Project" who never met up with their buddy and participants who met up at least once with their buddy, on their scores on perceived support, well-being, and loneliness. A difference between those groups could indicate that in-person contact might be a crucial component of the project to foster students' well-being and perceptions of support. Contrary to what we expected, there was no difference in the perceived support scores of participants who met their buddies and those who did not. In contrast to these findings, the well-being scores of participants who met their buddies and participants who did not meet their buddies differed significantly, such that participants who met their buddies at least once.

This finding was surprising in the first instance, but when looking at it the other way around, it might not be that surprising after all. Since the "Buddy Project" acts as a source of support to students that need to acculturate, it might be the case that those who are lower in well-being during their first months of studying are more likely to seek help and be open to meeting up with a person who is offering support. Those who already have higher well-being might have already found a social support network to rely on, so the need to meet a senior buddy is lower than that of those participants who have not found that network. This could be a possible reason for these unexpected differences. Future research on the project could include questions asking about the reasons for participants not meeting their senior buddies to gain further insight into the background of these findings.

Limitations and Future Implications

One important limitation of the current study was that we did not know the baseline levels of well-being, perceived support, and loneliness of the sampled students before they started studying. Related to this, we do not know which kind of people participate in the "Buddy Project." It is possible that those who decide to join the project might be lower in

well-being and perceived support or higher in loneliness in general than those who did not participate. In that case, it is possible that their levels of well-being and perceived support increased, and their loneliness levels decreased throughout the project, while non-participants might have started at the same level they reached. Thus, with the present data, we cannot draw any firm conclusion about the project's usefulness in enhancing well-being and support. A longitudinal study design asking the students about their well-being, perceived support, and loneliness before starting their studies, after a few weeks of studying (like in the present research), and after, for example, the end of the first semester could bring more clarity to this speculation.

Since the university students who participated in this study only started studying at this university two months before we collected the data, the "Buddy Project" participants also had known their senior buddies for no more than two to three months at that point. As already stated, starting one's bachelor program in combination with moving to a different country can be a great challenge for young international students lives. Within the first months, a lot is changing, and students can be quite overwhelmed and busy with their university tasks which may be a reason for not meeting up with their buddies. At the same time, the "Buddy Project" wants to provide support, especially in this very first period. An interesting future approach could be to investigate the longer-term changes that participation may have on well-being, perceived support, and loneliness. A longitudinal design might be helpful to observe the long-term effects that the social contact at the beginning of the academic year, provided by the "Buddy Project," might have on well-being and perceived support and investigate which factors of the project led to greater well-being over the whole course of the project.

In this project's scope, we measured the perceptions of university support of the sampled first-year students. Still, learning more about other sources outside the university through which first-year students feel supported might be worthwhile. Questions about the

perceived support of friends or classmates in Groningen and social support from sources in their country of origin might give a more profound insight into their support network.

Theoretical and Practical Implications

Notwithstanding the lack of differences between participants and non-participants of the intervention, this study's findings yield important practical implications for future research on the inclusion of international students at the Psychology department of the University of Groningen. The study's findings support the idea that the constructs identification, well-being, and perceived support are closely related. These findings align with existing literature (e.g., Awang et al., 2014, Harding et al., 2019), claiming a relationship between these variables. This intercorrelation can serve as an essential theoretical base for designing interventions in the future.

Furthermore, the findings of this study generally imply high scores on perceived inclusion, university identification, university support, and well-being. This insight is valuable for the University of Groningen as it shows that their students, after the difficult COVID-19 years, are quite content and feel welcomed at the university. Future research could further investigate the factors contributing to these high scores, for example, by collecting qualitative data. This knowledge could inspire additional interventions to improve students' inclusion at universities and increase their well-being and perceived support.

Finally, it is noteworthy that, when looking at the data of the "Buddy Project" participants, they were reasonably content with the project and were relatively happy with the contact they had with their buddies. Still, participants did not see the project as adding value to their student's lives. These findings can be valuable for the project organizers and might also encourage them to find new ways in which the project might add to the value of participants' student lives.

Conclusion

The present study investigated the perceived support and well-being of first-year international university students in the Psychology department at the University of Groningen. It compared the well-being, perception of support, and loneliness of participants and non-participants of the "Buddy Project" of the university, which is aimed at facilitating students' adjustment to university life. We found overall relatively high scores but no significant difference in well-being, perception of support, and loneliness scores between participants and non-participants of the "Buddy Project." Nonetheless, the present study may give some insights into factors and processes that can be explored to develop or improve interventions aimed at inclusion, like the "Buddy Project" of the University of Groningen.

References

- Adams, B. G., Meyers, M. C., & Sekaja, L. (2020). Positive leadership: Relationships with employee inclusion, discrimination, and well-being. *Applied Psychology: An International Review*, 69(4), 1145–1173. https://doi-org.proxy-ub.rug.nl/10.1111/apps.12230
- Allport, G. W. (1954). The nature of prejudice. Reading, MA: Addison Wesley.
- Anderson, P. H., & Lawton, L. (2015). Student motivation to study abroad and their intercultural development. Frontiers: The Interdisciplinary Journal of Study Abroad.
- Awang, M. M., Kutty, F. M., & Ahmad, A. R. (2014). Perceived social support and well-being: First-year student experience in university. *International Education*Studies, 7(13), 261-270.
- Ballato, L., & Schroeder, C. V. (2021). Evaluation Report 2020–2021. BSS Buddy Project.
- Baumeister, R. F., & Leary, M. R. (1995). The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin*, *117*(3), 497–529. https://doi.org/10.1037/0033-2909.117.3.497
- Berry, J. W., & Annis, R. C. (1974). Acculturative Stress: The Role of Ecology, Culture and Differentiation. *Journal of Cross-Cultural Psychology*, *5*(4), 382–406. https://doi.org/10.1177/002202217400500402
- Bevis, T. B. (2002). At a glance: International students in the United States. *International Educator*, 11(3), 12–17.
- Bronfenbrenner, U. (1979). *The ecology of human development: Experiments by nature and design*. Harvard university press.

- Cena, E., Burns, S., & Wilson, P. (2021). Sense of belonging, intercultural and academic experiences among international students at a university in northern Ireland. *Journal of International Students*, 11(4). https://doi.org/10.32674/jis.v11i4.2541
- Cho, J., & Yu, H. (2015). Roles of university support for international students in the United States: Analysis of a systematic model of university identification, university support, and psychological well-being. *Journal of Studies in International Education*, 19(1), 11–27.
- Cohen, S., & Wills, T. A. (1985). Stress, social support, and the buffering hypothesis.

 *Psychological Bulletin, 98(2), 310–357. https://doi.org/10.1037/0033-2909.98.2.310
- Diener, E. D., Emmons, R. A., Larsen, R. J., & Griffin, S. (1985). The satisfaction with life scale. *Journal of personality assessment*, 49(1), 71-75.
- Dwyer, A. L., & Cummings, A. L. (2001). Stress, self-efficacy, social support, and coping strategies in university students. *Canadian Journal of Counselling*, *35*(3), 208–220.
- Eisenberger, R., Huntington, R., Hutchison, S., & Sowa, D. (1986). Perceived organizational support. *Journal of Applied Psychology*, 71, 500-507.
- Erasmus Student Network Nederland, Landelijke Studentenvakbond, & Interstedelijk Studenten Overleg. (2021). *Annual International Student Survey 2021*. Interstedelijk Studenten Overleg. Retrieved January 25, 2023, from https://www.iso.nl/wp-content/uploads/2021/04/AISS-2021.pdf
- Faul, F., Erdfelder, E., Lang, A.-G., & Buchner, A. (2007). G*Power 3: A flexible statistical power analysis program for the social, behavioral, and biomedical sciences. *Behavior Research Methods*, 39, 175-191.

- Friedlander, L. J., Reid, G. J., Shupak, N., & Cribbie, R. (2007). Social support, self-esteem, and stress as predictors of adjustment to university among first-year undergraduates. *Journal of College Student Development*, 48(3), 259–274.
- Harding, T., Lopez, V., & Klainin-Yobas, P. (2019). Predictors of psychological well-being among higher education students. *Psychology*, *10*(04), 578.
- Hoffman, M., Richmond, J., Morrow, J., & Salomone, K. (2002). Investigating "Sense of Belonging" in first-year college students. *Journal of College Student Retention:**Research, Theory & Practice, 4(3), 227–256. htt4v
- Jaiswal, A., & Dyaram, L. (2020). Perceived diversity and employee well-being: Mediating role of inclusion. *Personnel Review*, 49(5), 1121–1139. https://doi-org.proxy-ub.rug.nl/10.1108/PR-12-2018-0511
- Jansen, W. S., Otten, S., van der Zee, K., & Jans, L. (2014). Inclusion: Conceptualization and measurement. *European Journal of Social Psychology*, 44(4), 370–385.
- Khanal, J., & Gaulee, U. (2019). Challenges of international students from pre-departure to post-study: A literature review. *Journal of International Students*, 9(2), 560-581.
- Leach, C. W., Van Zomeren, M., Zebel, S., Vliek, M. L., Pennekamp, S. F., Doosje, B., ... & Spears, R. (2008). Group-level self-definition and self-investment: a hierarchical (multicomponent) model of in-group identification. *Journal of personality and social psychology*, 95(1), 144.
- McLachlan, D. A., & Justice, J. (2009). A grounded theory of international student well-being. *Journal of Theory Construction and Testing*, 13(1), 27–32.

- Meeussen, L., Otten, S. & Phalet, K. (2014) Managing diversity: How leaders'
 multiculturalism and colorblindness affect work group functioning. Group Processes
 & Intergroup Relations, 17, 629-644. doi:10.1177/1368430214525809
- Newson, M., Zhao, Y., Zein, M. E., Sulik, J., Dezecache, G., Deroy, O., & Tunçgenç, B. (2021). Digital contact does not promote well-being, but face-to-face contact does: A cross-national survey during the COVID-19 pandemic. *New Media &Amp; Society*, 146144482110621. https://doi.org/10.1177/14614448211062164
- Otten, S., Verbeek, P., Peters, B., Otten, S., Schaafsma, J., & Jansen, W. S. (2018). *Inclusion as a pathway to peace: The psychological experience of exclusion and inclusion in culturally diverse social settings*. Wiley-Blackwell. Retrieved April 7, 2022, from http://hdl.handle.net/11370/520a76cc-19bd-46d8-ba9f-9e8b59c27421
- Russell, D., Peplau, L. A., & Ferguson, M. L. (1978). Developing a measure of loneliness. *Journal of personality assessment*, 42(3), 290-294.
- Shore, L. M., Randel, A. E., Chung, B. G., Dean, M. A., Holcombe Ehrhart, K., & Singh, G. (2011). Inclusion and diversity in work groups: A review and model for future research. *Journal of Management*, 37(4), 1262–1289. doi: 10.1177/0149206310385943
- Smith, R. A., & Khawaja, N. G. (2011). A review of the acculturation experiences of international students. *International Journal of Intercultural Relations*, *35*(6), 699–713. https://doi.org/10.1016/j.ijintrel.2011.08.004
- Statista. (2022, May 6). *International students in the Netherlands 2006–2020*. Retrieved May 16, 2022, from https://www.statista.com/statistics/699754/international-students-in-thenetherlands/#:%7E:text=International%20students%20in%20the%20Netherlands%

- 202006%2D2020&text=In%202006%2C%20there%20were%2031.5,to%20103.7%2 0thousand%20international%20students
- Statistics Netherlands. (2022, March 28). 40 percent international first-year students at

 Dutch universities. https://www.cbs.nl/en-gb/news/2022/11/40-percent-international-first-year-students-at-dutch-universities
- Tao, S., Dong, Q., Pratt, M. W., Hunsberger, B., & Pancer, S. M. (2000). Social support:

 Relations to coping and adjustment during the transition to university in the people's republic of China. *Journal of Adolescent Research*, 15(1), 123–44.
- University of Groningen. (2022, January 5). Times Higher Education (THE).

 https://www.timeshighereducation.com/world-university-rankings/university-groningen#:%7E:text=International%20environment%3A%20Currently%20a%20qua

 <a href="https://www.timeshighereducation.com/world-university-rankings/university-groningen#:%7E:text=International%20environment%3A%20Currently%20a%20qua

 <a href="https://www.timeshighereducation.com/world-university-rankings/university-groningen#:%7E:text=International%20environment%3A%20Currently%20a%20qua

 <a href="https://www.timeshighereducation.com/world-university-rankings/university-groningen#:%7E:text=International%20environment%3A%20Currently%20a%20qua

 <a href="https://www.timeshighereducation.com/world-university-rankings/university-groningen#:%7E:text=International%20environment%3A%20Currently%20a%20qua
- Vermeulen, F., Santing, F., & van Eerten, J. (2021). Summary and conclusions. Open armen en dichte deuren, 120-129
- Wintre, M. G., & Yaffe, M. (2000). First-year students' adjustment to university life as a function of relationships with parents. *Journal of Adolescent Research*, 15(1), 9–37.
- Yao, C. W. (2015). Sense of belonging in international students: Making the case against integration to US institutions of higher education. *Faculty Publications in Educational Administration*, 45.

 https://digitalcommons.unl.edu/cgi/viewcontent.cgi?article=1047&context=cehsedadf acpub
- Ye, J. (2006). An examination of acculturative stress, interpersonal social support, and use of online ethnic social groups among Chinese international students. *Howard Journal of Communications*, 17(1), 1–20. https://doi.org/10.1080/10646170500487764

Appendix A

Questionnaire

Demographics

1.	How old are you? [Open question]
2.	What is your gender?
	Prefer not to say
	 Non-binary/third gender
	Female
	Male
3.	What is your nationality?
	Dutch
	Prefer not to say
	Other, namely:
4.	What is your current living situation?
	 Shared flat
	 Student Housing
	 Own studio/apartment
	Living with parents
	Prefer not to say
	Other, namely:
5.	Have you studied at a university before starting your Bachelor of Psychology at the
	University of Groningen?
	■ Yes
	■ No

Prefer not to say

Buddy Project

- 6. Did you participate in the Buddy Project offered by the University of Groningen?
 - Yes
 - No
 - Prefer not to say

If "Yes" is selected, participants were presented with the following questions about the Buddy project

- 7. How often did you meet up with your buddy? [Open question]
- 8. Did you participate in the offered social activities?
 - Yes
 - No
 - Prefer not to say

To what extent do you agree with the following statements?

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor Agree	Somewhat Agree	Agree	Strongly Agree
9. The project was useful	О	О	О	0	О	О	О
10. I am satisfied with the contact with my buddy	О	O	О	О	О	О	О
11. I am glad that I participated in the project	О	0	О	О	О	О	О
12. Participation in the project added value to my student life	О	О	О	О	О	О	О

Inclusion, Identification, and University Support

In the following, we will ask questions about the experiences you made during your first months in Groningen. You will be presented with questions about your feelings towards different aspects of the University of Groningen, and the psychology department, in particular. Please indicate to what extent you agree with the following statements.

Inclusion.

People in the psychology department (my fellow students, staff members, etc.)...

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor Agree	Somewhat Agree	Agree	Strongly Agree
13. Give me the feeling that I belong	О	О	0	О	0	O	О
14. Give me the feeling that I fit in	О	О	О	О	О	О	О
15. Appreciate me	О	0	О	0	О	О	О
16. Care about me	0	0	О	0	О	О	0
17. Allow me to be who I am	О	О	0	О	0	О	О
18. Allow me to present myself the way I am	О	О	0	О	0	О	О
19. Encourage me to be authentic	О	О	О	О	О	О	О
20. Encourage me to present myself the way I am	О	О	0	О	0	0	О

Identification.

Please indicate to what extent you agree with the following statements.

Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree	Somewhat Agree	Agree	Strongly Agree
			nor Agree			

21. I feel a bond with psychology students	О	О	0	0	0	0	О
22. I feel committed to psychology students	0	О	О	O	O	0	0
23. I am glad to be a psychology student	О	О	0	О	0	О	О
24. It is pleasant to be a psychology student	О	О	0	O	O	0	О
25. The fact that I am a psychology student is an important part of my identity	0	0	0	0	0	0	0
26. Being a psychology student is an important part of how I see myself	O	O	O	0	Ο	0	O
27. I have a lot in common with the average psychology student	О	О	O	0	0	0	0
28. Psychology students have a lot in common with each other	O	O	O	O	O	0	O

University Support.

Please indicate to what extent you agree with the following statements.

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor Agree	Somewhat Agree	Agree	Strongly Agree
29. The University of Groningen really cares	O	O	0	O	0	0	O

about my well-being							
30. Help is available from the University of Groningen when I have a problem	0	0	O	0	O	0	0
31. The University of Groningen fails to appreciate any extra effort from me	0	O	O	O	0	0	O
32. The University of Groningen tries to make my school life as interesting as possible	O	O	Ο	O	O	O	0

Study Goals

The following questions will ask you about your core motivations for deciding to study. Please indicate to what extent the following motives guided your decision to study at the University of Groningen.

By studying Psychology at the University of Groningen, I want to

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree	Somewhat Agree	Agree	Strongly Agree
				nor Agree			
33. Enhance my employment prospects	О	О	О	О	О	О	О
34. Gain career skills	0	0	О	0	О	О	О
35. Gain indepth knowledge	О	О	О	О	О	О	О

in my chosen field							
36. Build my career	0	0	О	0	0	О	О
37. Experience the local night life (clubs, bars, etc.)	0	O	0	0	0	0	0
38. Experience life in a typical student city in the Netherlands	0	O	0	0	0	0	O
39. Build a new social life	0	0	О	О	О	О	О
40. Interact with people from different countries	O	О	0	O	0	0	0

Well-being

For the following questions, we would like you to consider your experiences and feelings since your study started in early September. Please indicate to what extent you agree with the following statements.

When answering the following questions please only consider the time since you have started studying at the University of Groningen (early September).

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor Agree	Somewhat Agree	Agree	Strongly Agree
41. In most ways, my life is close to ideal	O	O	0	O	0	0	O
42. The conditions of my life are excellent	O	O	O	O	О	0	О
43. I am satisfied with my life	О	О	0	О	О	О	О

44. So far I have gotten the important things I want in life	0	O	O	O	O	O	O
45. If I could live my life over, I would change almost nothing	O	O	O	0	O	О	O

Loneliness

Please indicate to what extent you agree with the following statements.

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor Agree	Somewhat Agree	Agree	Strongly Agree
46. I have nobody to talk to	О	О	О	О	О	О	О
47. I feel as if nobody really understands me	O	O	0	O	0	0	O
48. I feel completely alone	О	О	О	О	О	О	О

Academic Achievement

For the following questions, we would like you to consider your experience and feelings since studying in Groningen. Please indicate to what extent you agree with the statements.

Looking back at my first couple of months in Groningen...

	Strongly Disagree	Disagree	Somewhat Disagree	Neither Disagree nor	Somewhat Agree	Agree	Strongly Agree
				Agree			
49. In most ways, my academic	О	0	0	О	0	О	О

achievement							
is close to							
my ideal							
50. I am satisfied with my academic achievement so far	0	0	0	0	0	O	0
51. So far I have gotten the important things I want to achieve academically	O	O	O	O	O	O	О
52. I have taken all of the exams so far	О	О	О	О	О	О	О
53. So far I have passed all of my exams	О	0	0	0	0	О	О
54. I am optimistic that I will finish my study successfully	O	O	0	O	O	0	0
55. So far I am satisfied with my study	0	0	О	О	О	О	О

Additional Questions

- 56. Is English your native language?
 - Yes
 - No
- 57. How difficult was it for you to do this survey in English? (only displayed if last question was answered with "No".)
 - Extremely difficult
 - Somewhat difficult
 - Neither easy nor difficult
 - Somewhat easy
 - Extremely easy

58. Is there anything else you want us to know about your study experiences so far?

[Open question]

Thank you for participating.

If you would like to receive a summary of the findings of our study please send an e-mail to a.henneke.1@student.rug.nl. Your e-mail address will not be connected to your answers in this survey. This means your answers are still anonymous.

It is important that you press the "Next page" button at the end of the page in order to receive the SONA credits.

Appendix B.

Research information and Informed Consent

Thank you for your interest in our study. You have been invited to participate in this research because you are a first-year student at the University of Groningen. This research is part of the Master theses of Marieke Goedecke and Anna Henneke, supervised by Dr. Sabine Otten.

The aim of this short study is to investigate first-year Psychology students' well-being and their sense of belonging in their new environment. Due to the increasing number of both Dutch and international students, it is important to broaden the knowledge about the relevant

factors affecting aspects of students' well-being. The findings could provide valuable implications stimulating future interventions to provide a good start for young people starting

their student life at the university.

Filling out this survey will take around 10-15 minutes and involves questions about your well-being, perceived inclusion, and your experiences at the University of Groningen.

Furthermore, you will be asked to provide some demographic information.

Participation in this study is fully voluntary. However, your consent is needed, therefore please read the information carefully and decide if you want to participate. You are not obliged to participate. Moreover, without negative consequences, you can stop at any time chose the option "prefer not to say" for questions that you do not wish to answer.

We will process your Sona ID to be able to give you Sona credits for your participation. We will remove the Sona ID from the data as soon as all participants have been compensated at the end of the study. Afterwards, the data will be anonymous and you will no longer be able to ask for access to your data or to withdraw your data from the study. Once data collection is finished and you have received your SONA credits, we will remove all personal identifiers.

After that, no personal identifiers will be accessed by any of the researchers. Anonymous data will be stored indefinitely and might be shared with other researchers.

If you have any questions regarding this study feel free to contact a.henneke.1@student.rug.nl or m.b.a.c.goedecke@student.rug.nl. Do you have questions/concerns about your rights as a research participant or about the conduct of the research? You may also contact the Ethics Committee of the Faculty of Behavioural and Social Sciences of the University of Groningen: ec-bss@rug.nl. Do you have questions or concerns regarding the handling of your personal data? You may also contact the University of Groningen Data Protection Officer: privacy@rug.nl.

I have read the information above and I consent to participate in this study.

- Yes
- No

I consent to the processing of my personal information.

- Yes
- No