Non-religious Identity in Three Western European Countries:

A Closer Look at Nonbelievers' Self-identifications and Attitudes Towards Religion

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Abstract

The growing secularism generates considerable interest in the manifestations of religious

unbelief. In this study, conducted in Finland, Denmark, and the Netherland (N = 4404), we asked

participants which of the following terms best describes their religious/spiritual identity: religious

believer, spiritual but not religious, spiritual seeker, atheist, anti-religious, agnostic, nonbeliever,

secular, or other. We also examined the participants' God beliefs and their attitudes towards

religion. While connotations of identity terms varied considerably across individuals and countries,

the nonreligious identification groups consistently differed in the strength and certainty of God

belief, and by the valence, ambivalence, importance and reflection of the attitudes towards

religion. The anti-religious had the most negative and unequivocal attitudes, and the agnostics,

seculars and spiritual seekers had the most uncertain God beliefs. By associating distinct attitude

profiles with non-religious self-identification labels, the findings improve our understanding of

why people choose a specific label in surveys on non-religiosity.

Key words: Atheism; Nonbelievers; Religious identification; Attitudes towards religion

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Religious unbelief is one of the fastest growing worldviews, especially in the West. Many people reject the existence of a god, and nonbelievers have globally become the fourth largest group after Christians, Muslims, and Hindus, probably because of the increased levels of social and individual security (Zuckerman, 2007). But how do unbelievers identify themselves in terms of (non)religiosity? What kind of attitudes towards religion characterize people who self-identify as a particular kind of non-religiosity? Do specific groups of non-religious people view religiosity as negative while others hold positive attitudes towards religion despite their own lack of belief?

Despite the rising trends of secularization and unbelief, the way non-religious people identify themselves, and how they feel about religions and religiosity, is poorly understood. In this study, we investigate how people from Denmark, Finland, and the Netherlands prefer to identify themselves as religious believer, spiritual but not religious, spiritual seeker, atheist, anti-religious, agnostic, nonbeliever, secular, or other. These categories were selected so that nonbelievers could choose their own identification from as many options as possible. The dictionary definitions of the used identification categories are given in Table 1. We also examine how the identification groups differ in God belief and in attitudes towards religiosity and religion.

Insert Table 1 here

Building on the self-categorization theory (Hornsey, 2008; Turner, Oakes, Haslam, & McGarty, 1994), we define religious identification as the sense of belonging to a social category of people who share attributes related to religion and religiosity. The category can thus be a small group of interacting persons, an organization (like the Church of England), an institution, or a

subculture consisting of people who share characteristics that are sufficiently distinguishable from others in the society (e.g., atheists). Of the several ways social categories can be assorted, the most relevant types for the present purpose are formal vs. informal categories. The Church of England is an example of a formal category: the category has an official leader, organization, doctrine, and distinct practices. Because irreligious people rarely have leaders or doctrines, and they rarely form organizations based on their shared irreligious beliefs, non-religious identifications, such as atheists and spiritual seekers, are best understood as informal categories.

Most previous studies on religious identification have focused on formal religious categories and asked participants about their religious denominations or religious affiliations. While affiliations, for example with Christians, Muslims or Orthodox, do not necessarily indicate official denominations, they imply religious identification with the values, beliefs, doctrines or practices of the formal church. Even so, knowing how to most appropriately categorize religious respondents by their denomination or affiliation has been difficult (Dougherty, Johnson, & Polson, 2007). Relatedly, because nonbelief is often highly stigmatized many people may tend to underreport their atheist worldviews, as evidenced for instance by the discrepancy between self-identification and a different procedure to assess the number of atheists, which is known as the unmatched count technique (Gervais & Najle, 2018).

The increasing number of people with no religious denomination or affiliation raises the question of how non-religious individuals identify themselves in terms of religiosity and how this is assessed in survey research. Although many studies have focused on non-religious and nonaffiliated people, their potential identity groups are not yet well-known. As Lee (2014) has highlighted, one problem is that these studies have often been religion focused, and non-religiosity has been of secondary interest compared to the primary concern, religion itself. Second,

non-religious categories are informal, and until the recent Dictionary of Atheism (Bullivant & Lee, 2016), no established terminology or definitions existed. Third, most studies have been limited to such categories as atheists, agnostics, spiritual but not religious, or 'no religion' and its equivalents. However, there has been little discussion on whether these categories are the most important ones and whether they are sufficiently detailed to extend our knowledge about nonbelievers. After all, there are hundreds of millions of non-religious individuals in the world (Zuckerman, 2007).

Finally, one important problem is that people have seldom been asked about their self-identifications. Rather, study participants have been assigned to different nonbeliever categories by the experimenter. For example, one common practice is to categorize people as atheist or agnostics based on their beliefs about God (e.g., Baker & Smith, 2009; Ecklund & Lee, 2011; Sherkat, 2008; Woodhead, 2016). Although this approach is sometimes useful, it is possible that the person has no sense of belonging to the category selected by the experimenter. By letting people choose their own identification, it is possible to broaden our understanding of how different nonbeliever types differ, for instance in their views of religion, religiosity and belief in God.

Besides the identification terms that non-religious people use to characterize themselves, little is known about the ways differently self-identified nonbelievers evaluate and think about religion and religiosity. We propose that understanding religion attitudes associated with the different self-identifications will provide us with a better understanding of why people specifically choose the labels they choose. For example, having an extremely negative attitude towards religion may be a strong motivation for self-identifying as an atheist.

Attitudes are evaluations of objects, people, or ideas, and they range in valence from positive through neutral to negative and vary in strength (Ajzen, 2001; Albarracin & Shavitt, 2018; Howe & Krosnick, 2017). Attitude strength is a complex phenomenon comprising such dimensions as importance, intensity, how much one has thought about the benefits and drawbacks of one's attitudes towards a topic (i.e., elaboration), how exciting and thought-provoking one finds the topic (i.e., interest), and how confident one is that one's attitudes towards the topic are the correct ones (i.e., correctness). Even weak attitudes can impact information processing and behavior, but strong attitudes are usually more resistant to change, more stable over time, and more influential on cognition and action than weak attitudes (Howe & Krosnick, 2017). We note that although attitude-like terms are often used in studies on (ir)religiosity, they are typically not conceptualized as attitudes and have not been based on any attitude theory, terminology or research findings. For example, countless studies have focused on the degree to which a person holds positive evaluations of religion or has a literal or a symbolic view on the interpretation of religious texts. Here we directly build on the attitude literature instead, by taking standardized attitude measures and applying them to the topic of religion.

In summary, the present study aims to examine how non-religious people, especially, identify themselves in terms of religiosity and how the identification groups differ in their belief in God, uncertainty of this belief, and attitudes towards religion. Our purpose is to find defining and prototypical attributes of the different unbeliever identity groups. We assume that these attributes can be found in attitudes towards religion and in God beliefs. Although nonbelievers' attitudes towards religion have not been systematically examined, the implicit assumption underlying many studies is that what distinguishes different nonbeliever types from each other is God beliefs and attitudes towards religion: some have extremely negative views about religion

whereas others are indifferent, some reject God absolutely whereas others are uncertain, and some have reflected on their views about religion many times whereas others have not. In addition, due to a lack of previous studies, we will examine which attitude dimensions are the most relevant for characterizing religious attitudes by reducing the several dimensions into a smaller number of factors.

Method

The present study is part of a research project with one published article focusing on latent unbeliever types, which provides a full description of methods and procedures (Lindeman, van Elk, Lipsanen, Marin, & Schjødt, 2019; see also https://osf.io/6dz3v/). The following description is a shortened version of the corresponding text in that article. The measures of belief in God, certainty of God belief, identification, and attitudes towards religion are the same as in the previous study. In contrast to the previous paper¹, the present study focuses on the identification groups and describes a factor analysis of the attitude items (see below).

Participants and Procedure

The participants were 4404 individuals from Finland, Denmark, and the Netherlands (48.2% female; age 18 - 84 years, M = 39.7). Religious affiliations were none (68.1%), Lutheranism (20.7%), Catholicism (3.2%), Orthodox (0.5%), Islam (0.7%), Hinduism (0.2%), Buddhism (0.4%), Judaism

¹ The purpose of the earlier study was to identify latent God unbeliever groups based on respondents' supernatural beliefs (e.g., belief in telepathy, angels, fate, ultimate purpose in the universe, afterlife). Only participants who strongly disagreed with the statement "I believe in God" (N = 2258) were included in the analyses. The study found three distinct God unbeliever groups, one with an overall lack of supernatural beliefs and two with different combinations of supernatural beliefs. The groups were then compared in terms of over 20 cognitive, motivational, and world view variables, including attitudes towards religion. However, the attitude dimensions used in the present study are based on factor analyses and are thus only partially the same as the original scales used in the previous study. Moreover, the earlier study did not analyse the use of the self-identification terms which is the focus of this study.

(0.2%), or other (3.9%). The study was conducted online in Finland, Denmark and the Netherlands, and in all three countries the participants were told that the study investigates how people think about religious beliefs, unbelief, science and knowledge. In Finland (N=2268) and Denmark (N=1208) the participants were recruited to the online study via several student mailing lists and web pages (e.g., the Finnish Association of Skeptics, the Danish Humanist Society). The Dutch sample (N=928) consisted of first-year psychology students (N = 293) and of a representative sample of Dutch people (N = 635). Of all the participants, 17.3% were full-time students, 60.4% were full-time employed, 20.7% were otherwise occupied, and 1.6% did not report their full-time occupation. The corresponding figures for Finland, the Netherlands, and Denmark were as follows: full-time students 19.7%, 34.2%, and 24.8%; full-time employed 56.6%, 36.7%, and 60.8%; and otherwise occupied 22.1%, 25.3%, and 14%.

Materials

Identification

The participants were asked which of the following alternatives best describes their own religious/spiritual identity: 1. atheist, 2. anti-religious (the translations corresponded to 'against religion', 3. agnostic (explained by the phrase "I believe that the existence of God cannot be proven or disproven"), 4. nonbeliever (the translations corresponded to a lack of religious belief), 5. secular, 6. religious believer, 7. spiritual but not religious, 8. spiritual seeker, and 9. Other, followed by space to name or shortly explain their identity. Note that we use here the term 'anti-religious' for the second identity group instead of the identity term 'unbeliever' used in our previous paper (Lindeman, e al., 2019), because anti-religious corresponds better to the respective Finnish, Dutch and Danish identity term, meaning against religion.

The used identity categories were rationally-derived. The term spiritual seeker was selected from the work by Lewis, Tøllefsen, and Lewis (2016), all other terms are from the Dictionary of Atheism by Bullivant and Lee (2016). The terms were chosen on the following grounds. All identity terms 1) should ideally have the same meaning in four languages: Finnish, Danish, Dutch and English (leaving out terms like humanist, naturalist, godless), 2) should not be synonymous with another identity term used in the study in any of these languages (leaving out e.g., non-religious, a-religious, irreligious), 3) should not be a specific case of another identity term used in the study (leaving out e.g., soft atheism), 4) should not refer to parodic religions (leaving out e.g., Pastafarianism), and 5) should not be tautological with any of the attitude dimensions towards religion. For example, 'indifferent' signifies an attitude which is not positive, negative or strong but weak and neutral (Petty & Krosnick, 2014; Thurstone, 1928). Indifference was therefore not used as an identity term but as the midpoint of attitude valence and attitude strength. Because the terms used should also represent a possibility for self-definition, events and experiments mentioned in the Dictionary of Atheism were left out. Within the limitations described above, all possible identification terms from the dictionary were used.

Belief in God and certainty of this belief

The participants were asked to rate their agreement (1 = strongly disagree, 5 = strongly agree) with the following statements: "I believe in God" and "How certain are you about your response" (1 = certain, 2 = somewhat uncertain, 3 = uncertain).

Attitudes towards religion

The attitudes were assessed using 21 items, three items per each of the seven attitude dimensions identified in the literature (Table 2). The wording of the items corresponds to the typical wordings used in attitude studies, and the content of the items was refined based on the

definitions of the specific attitude dimensions. For example, the participants were asked to rate the harmfulness – beneficiality of religiosity because the valence of an attitude object is "captured in such attribute dimensions as harmful-beneficial" (Ajzen, 2001, p 28). Other examples include the item "Do you have both positive and negative thoughts about religiosity?" which was based on the definition of attitude ambivalence as "the degree to which a person holds positive and negative evaluations of the attitude object simultaneously" (Howe & Krosnick, 2017, p. 330), and the item "Have you given thought to the merits and shortcomings of your religious attitudes?" was based on the definition of attitude elaboration as "the degree of thinking that one has done about an attitude object's merits and shortcomings" (Eaton & Visser, 2008, p. 1729)"

Exploratory and confirmatory factor analyses were conducted with the attitude items to reduce the number of attitude variables. First, the data were randomly split into two halves, named Sample 1 and Sample 2. Then, an exploratory factor analysis with maximum likelihood extraction and oblimin rotation was run on Sample 1, resulting in four correlated factors with eigenvalues over one. Oblimin rotation was selected because it allows associations between the factors and because attitude theories are based on the view that attitude dimensions are intercorrelated; important attitudes tend to be extreme, for example (Howe & Krosnick, 2017; Petty & Krosnick, 2014). The first factor (variance explained 23.16 %) reflected *positive valence*: the three original evaluation items had the highest loadings on the factor, followed by the question regarding intensity of positive emotions. The second factor (variance explained 17.58 %) mainly consisted of the three original *importance* items. The third factor (variance explained 6.59 %) was viewed to represent *reflection* since items related to elaboration and interest had the highest loadings on the factor. The fourth factor expressed *low ambivalence* (variance explained

2.92 %). Factor correlations greater than |.30| were between positive valence and low ambivalence (r = -.48), and between importance and reflection (r = .51).

Insert Table 2 here

Next, a confirmatory factor analysis with maximum likelihood estimation was conducted with Sample 2. This was done in R version 3.4.3 using the lavaan package. In the first tested model (Model 1), items with loadings above |.60| in the exploratory factor analysis were set to load on the factors. This model did not reach acceptable fit. The model was modified by removing the items with loadings under |.70| and considerable cross loadings in the exploratory factor analysis, i.e. item 4 from factor 1 and item 14 from Factor 2. The modified model (Model 2) had good fit, indicating that the included 11 items mainly loaded on the same factors in the other dataset as well. Fit statistics for the tested models are shown in Table 3.

Based on the results, the attitude variables of *valence*, *reflection*, *importance* and *ambivalence* were calculated as an average of the absolute values of items loading on a particular factor (Table 2). Reliabilities (α) for the attitude variables ranged between .72 and .79.

Insert Table 3 here

Results

The way the participants identified themselves is shown in Table 4. The 210 responses to the category 'other identification' were categorized by content into 13 classes and were labeled as follows: other religious (N = 51; e.g., "religious and spiritual", "Christian humanist"), other non-and unbelievers (N = 22, e.g., "humanist", "no belief"), other atheist or agnostic (N = 19, e.g., "atheist agnostic", "agnostic but also a seeker"), customized religion (N = 17, e.g., "I can't label my

religiosity", "I believe there is something and want to transmit this belief to my children"), other spiritual (N = 10, e.g., "esoteric"), pagan (N = 9), other seekers (N = 8, e.g., "buddhism oriented seeker"), animist (N = 7), cultural Christian (N = 7, e.g., "passive church belonger"), ignosticism (N = 4), satanist (N = 4), pantheist (N = 3), and miscellaneous (N = 49, e.g., "yogist", "I live in truth", "skeptic, but there may be something", "I am Wicca"). Altogether, 29 participants combined the given non-religious identification labels with other identity term(s) using the other-option. The most common combinations, with slightly differing wordings, were atheist and agnostic (N=11), and atheist and anti-religious (N=5).

Insert Table 4 here

All subsequent analyses were conducted without participants whose identity was 'other'.

First, the residuals with all variables (belief in God, uncertainty of this belief, and attitude valence, importance, reflection and ambivalence) were plotted to assess their distribution and they seemed normally distributed. In addition, the responses ranged from the lowest to the highest value on each variable, also among the participants who did not choose 'religious' as their identity group. To guard against the inflated probability of type 1 error, all analyses were conducted using Bonferroni correction.

A multivariate analysis of variance (MANOVA) was conducted with belief in God and certainty of the belief as dependent variables, and identification group and country as independent variables (Table 5). As it has been shown that standard estimates of effect size such as partial eta squared show a positive bias (Mordkoff, 2019), here we report omega squared as an additional unbiased estimate of the effect size.

For belief in God, the main effects of identification, F(7,4084) = 729.40, p < .001, $\eta_p^2 = .56$,; $\omega^2 = .53$; country, F(2,4084) = 38.67, p < .001, $\eta_p^2 = .019$, $\omega^2 = .008$; and their interaction F(14,8166) = 21.32, p < .001, $\eta_p^2 = .07$, $\omega^2 = .03$, were significant. The results showed that the atheists, anti-religious, and non-believers reported the lowest God belief, followed by agnostics and seculars (not in the Netherlands), and then by the spiritual but not religious and the spiritual seekers. Those who identified as religious reported, quite naturally, the highest God belief.

As for the uncertainty of this belief, the main effects of identification, F(7,4084) = 23.22, p < .001, $\eta_p^2 = .038$, $\omega^2 = .036$; country, F(2,4084) = 13.29, p < .001, $\eta_p^2 = .006$, $\omega^2 = .006$; and their interaction F(14,8166) = 2.53, p < .001, $\eta_p^2 = .01$,, $\omega^2 = .005$, were significant. The means in Table 5 imply that most certain of their (un)belief were the atheists and anti-religious and most uncertain were the agnostics. Uncertainty was typical also to the Finnish and Dutch seculars, and to the Finnish spiritual seekers.

Insert Table 5 here

Next, a MANOVA was conducted with the four attitude variables as dependent variables, and identification group and country as independent variables. All effects were significant at the p < .001 level: The eight identity groups differed on attitude valence, F(7,3992) = 314.11, $\eta_p^2 = .36$, $\omega^2 = .34$; reflection, F(7,3992) = 29.77, $\eta_p^2 = .05$, $\omega^2 = .04$; importance, F(7,3992) = 55.78, $\eta_p^2 = .09$, $\omega^2 = .08$; and ambivalence, F(7,3992) = 57.47, $\eta_p^2 = .09$, $\omega^2 = .09$.

Similarly, the three countries differed (p < .001) in attitude valence, F(2,3992) = 45.99 η_p^2 = .02, ω^2 = .01; reflection, F(2,3992) = 232.53, η_p^2 = .11, ω^2 = .096; importance, F(2,3992) = 51.56, η_p^2 = .03, ω^2 = .022; and ambivalence, F(2,3992) = 13.53, η_p^2 = .01, ω^2 = .005.

Also the interaction between identification and country was significant (p < .001) for attitude valence, F(2,3992) = 10.37, $\eta_p^2 = .04$, $\omega^2 = .02$; reflection, F(2,3992) = 8.67, $\eta_p^2 = .03$, $\omega^2 = .02$; importance, F(2,3992) = 6.82, $\eta_p^2 = .02$, $\omega^2 = .02$; and ambivalence, F(2,3992) = 7.18, $\eta_p^2 = .03$, $\omega^2 = .02$. The means of attitudes and the results for pairwise comparisons among all identification groups, overall and separately in each country, are set out in Table 6. These results are addressed in the Discussion (excluding the country-specific results which are for information only).

Insert Table 6 here

The above analyses were run with all participants, including those who identified as religious. In order to establish the robustness of our findings with respect to the in- or exclusion of religious participants, the above analyses were conducted also without participants who chose 'religious' as their identity group. The effect was largest for belief in God, F = 239.53, $\eta_p^2 = .28$, $\omega^2 = .26$, and attitude valence, F = 154.73, $\eta_p^2 = .20$, $\omega^2 = .19$, medium for attitude ambivalence, F = 63.51, $\eta_p^2 = .10$, $\omega^2 = .09$; and small for attitude reflection, F = 21.67, $\eta_p^2 = .04$, $\omega^2 = .03$; uncertainty of God belief, F = 27.31, $\eta_p^2 = .04$, $\omega^2 = .04$, and attitude importance, F = 13.34, $\eta_p^2 = .02$. All p-values were < .001.

Regarding the differences in the three countries, the effect was large only for attitude reflection (η_p^2 =.10, ω^2 = .093). As can be seen in Table 6, all Dutch identity groups had reflected their religious attitudes less than the identity groups in Finland or in Denmark. All other effects were small (η_p^2 < .03, ω^2 < .02).

The last analysis was a linear discriminant analysis and it was conducted only with participants who did not identify as religious. We were interested in knowing how accurately the identification group could be predicted by (un)belief in God, certainty of this belief, and the four

attitude dimensions of valence, reflection, importance, and ambivalence. The results showed that the identification group was correctly predicted for 35.9% of the participants (Table 7). The results also indicated that the anti-religious and spiritual seekers were the most correctly classified groups whereas agnostics was the least successfully predicted category.

Insert Table 7 here

Discussion

We asked over 4000 participants, most of whom were not religious, how they would identify in terms of religiosity. Many participants (30%) chose the label atheist, other terms were less popular. In rough percentages, the order of preference for the identity terms was the following: nonbeliever (18%), agnostic (12%), anti-religious (10%), religious (9%), spiritual but not religious (8%), spiritual seeker (5%), secular (4%), and other (5%). Comparisons with earlier prevalence findings are not warranted because, unlike much of the existing research, this study was targeted at non-religious people, and because studies that have examined non-religious people have typically varied highly in the way non-religious identifications have been assessed. Nevertheless, the diversity of self-categorizations and the low proportion of identifications that have received much attention, namely agnostics and spiritual but not religious, maybe noteworthy. Instead of focusing on prevalences alone, the way the identity groups differed in God beliefs, certainty of these beliefs, and attitudes towards religion may be more informative.

The religious and not religious groups

We begin by describing the differences between individuals who identified as religious and those who did not. Expectedly, people who chose religious as their identity had highest God belief, they had the most positive attitudes towards religion, they had reflected on the merits and

shortcomings of their attitudes a lot, and these attitudes were the most important to them.

Closest to the religious group in terms of belief in God and positive attitudes were the spiritual seekers, the spiritual but not religious, and the seculars. The seekers were like the religious also in that their attitudes were important to their identity, and they had also reflected on their attitudes more than the other groups.

Furthest from the religious group were the anti-religious and the atheists who had low God belief and negative attitudes towards religion. In addition, the nonbelievers and the seculars were opposite to the religious group in the sense that they had given the least thought to the merits and shortcomings of their attitudes.

The atheists and the anti-religious

The most negative group in their attitudes towards religion was not atheists but the anti-religious. Those who chose anti-religious as their identity, were not only more negative but their attitudes were also less ambivalent than those of any other identity group in this study. While the atheists' attitudes were not as extremely negative and unambiguous as those of the anti-religious, the atheists resembled the anti-religious in many respects: both groups had a similarly low belief in God, and they were equally certain about their unbelief. When a discriminant analysis was used to analyze how well God beliefs and attitudes towards religion predict which identity group the participants had chosen, those who had chosen the term atheist were often misclassified as anti-religious whereas those who had chosen the term anti-religious were mostly correctly classified. This implies that people who identified as atheists differed more from one another in attitudes and beliefs than people who identified as anti-religious.

Atheists are easily regarded as having the most negative attitude towards religion and as the most common unbeliever group, both in scientific discourse, in the media and in everyday

contexts. There is also a wealth of research on anti-atheist prejudice, showing for instance that globally atheists are perceived to be more immoral and less trustworthy compared to people who believe in God – which in turn may make people more reluctant to self-identify as atheist (Gervais, 2013; Gervais et al., 2017). We, too, would probably have obtained an utmost negative atheist group if the possibility to identify as anti-religious had not been included. Because a similar, dogmatic and extreme anti-theist group has been also recognized previously (Silver, Coleman III, Hood Jr, & Holcombe, 2014), and because this kind of identification is not routinely included, some kind of extreme identification possibility (e.g., anti-religious, against religions) could, when appropriate, be incorporated in future studies.

Agnostics

Those who identified as agnostics were, among seculars and spiritual seekers, most uncertain about their belief in God. They were also more ambivalent in their attitudes towards religion than the anti-religious, atheists, or nonbelievers, having thus more conflicting emotions and cognitions about religious issues. In addition, agnostics appeared to be the most incorrectly and diffusely classified group in the discriminant analysis, indicating that self-identified agnostics were more heterogeneous than participants in the other groups. Although the results seem plausible, they raise questions about how agnosticism should be operationalized.

The definition of agnosticism usually includes two parallel but dissimilar descriptions. It can refer to personal uncertainty about whether God exists and to a view that God is unknowable to everybody (e.g., Table 1). However, these two views, personal hesitation and collective epistemological uncertainty differ substantially. Unlike agnostics who are not certain about their personal view of God, agnostics who think that God is unknowable can be convinced that their view is correct, valid, and justified. Because certain attitudes last longer over time, are more

resistant to persuasion, and have a greater impact on judgments and behavior (Petrocelli, Tormala, & Rucker, 2007; Tormala & Petty, 2002), it might be good to distinguish these two forms of agnosticism, private and universal, from each other in future.

The nonbelievers and the seculars

Those who identified as nonbeliever or secular might, at first sight, be considered rather similar. This was not the case here, however. Nonbelievers were among the three biggest groups in each country, and their most salient characteristics were that they had not reflected on their attitudes towards religion, but their God belief was nevertheless low, just following that of the anti-religious and atheists. The nonbelievers may resemble the group Norenzayan and Gervais (2013) have called apatheists, that is, people who are indifferent to religious agents and practices and who come from cultures, that are characterized by physical and social safety and stability.

The seculars, in contrast, was the smallest group in each country and their God belief and attitudes varied widely depending on the country. For example, the seculars' belief in God was relatively high in the Netherlands and low in Denmark, and they regarded their attitudes as important in Denmark but not in Finland. These results are in good agreement with Zuckerman and Shook's (2017) argument that secularism is multipronged and multifaceted, but the small group size also raises the possibility that the concept secular may be more important and stimulating to researchers than it is to the general public. Because both those who identified themselves as nonbelievers and as seculars had the most indifferent (i.e., neutral by valence and weakly important) attitudes towards religion it might, despite the differences found, be possible to use only the term nonbeliever in future studies.

The spiritual but not religious and the spiritual seekers

Those who identified as spiritual but not religious were not so unreligious as the identification term suggests. The SBNR group belonged to the three most God believing identification groups and their religious attitudes were more positive than those of atheists, anti-religious or agnostics. Similar findings have also been obtained earlier (Ammerman, 2013; Johnson, Sharp, Okun, Shariff, & Cohen, 2018; Saucier & Skrzypińska, 2006; Willard & Norenzayan, 2017) supporting a large overlap of religiosity and spirituality. The high attitude ambivalence among the SBNR group implies that they have conflicting thoughts and emotions about religiosity which widens our knowledge about this non-religious group.

The SBNR group was in many respects similar to the spiritual seekers, and actually the discriminant analysis classified the SBNR people often as spiritual seekers. The two groups differed only in one respect: the seekers demonstrated more reflected attitudes towards religion than the SBNR group. Because both groups reported a similarly high belief in God and positive but ambivalent attitudes towards religion, our findings may support previous suggestions that seekers distinguish themselves from SBNR by pursuing self-actualization and asking existential questions (Cusack, 2016; Graham, McDonald, & Klaassen, 2008).

Country differences and limitations

Even though Finland, Denmark and the Netherlands have similar cultures in many ways, variation in the identification terms' popularity was observed, likely reflecting the different cultural connotations of the terms even in these countries. For example, the neutral identity term 'nonbeliever' was more popular in the Netherlands than in Denmark or Finland. Furthermore, all Dutch groups had reflected on their religious attitudes less than the groups in Finland or Denmark. Especially young people's reluctance to reflect on religious issues in the Netherlands has been

observed earlier as well (Vermeer, 2013). The results may indicate the lower social significance of religion in the Netherlands. The rate of religious non-affiliation is much higher in the Netherlands than in Finland or Denmark (Pew Research Center, 2018), and it has been argued that low social significance of religion explains why people are not critical but uninterested in religion (Klug, 2017). This view fits well with cultural learning accounts, according to which credible cultural models and displays (i.e., one's parents, teachers etc.) have a strong impact on the transmission of religious beliefs or unbeliefs (Gervais & Najle, 2015). In a culture in which religion is the exception rather than the rule and in which prevalent displays signal that unbelief (rather than belief) is the social norm, children may be more likely to adopt a non-religious worldview.

In turn, atheist and antireligious were more popular identifications in Denmark than in Finland or in the Netherlands. Whereas the above cultural factors may partly explain this finding, a more plausible explanation is that a large portion of the respondents in Denmark were recruited from an atheist Facebook page. Other country differences were small, and on the whole, differences in sampling methods could have influenced the differences across the three countries.

A more general limitation of the study is that the results are overall culture bound. In Finland, Denmark and the Netherlands being non-religious is a socially accepted worldview (Zuckerman, 2012). In line with this, a comparison of 13 countries showed that moral distrust of atheists was lowest in Finland and on the low end in the Netherlands (Gervais et al., 2017). Based on these findings, and the fact that the survey was anonymous, the obtained self-identifications likely reflect participants' valid self-perceptions as people had little reason to not be honest. However, the results may not generalize to more religious European countries or to the U.S.

Another major limitation is that nothing can be said about how central the religious identifications were to the participants' self-concepts. If people do not feel that, say, being an

atheist is part of their self-concept and indicates belonging to a specific ingroup, the identification does not necessarily affect their perceptions, feelings, or behavior (Tropp & Wright, 2001). This limitation could be validly overcome by only one question in future studies, namely "I identify with my group (or category)" followed by a seven-point scale (Postmes, Haslam, & Jans, 2013).

Finally, it would be useful in future studies to let people concurrently choose multiple non-religious identity labels in order to assess the compatibility of the different identifications.

Restricting the choice of identities to only one in the present study can be viewed as a limitation since some people likely identify with multiple categories (for instance a spiritual seeker as SBNR or as a religious believer). While only 0.7 % of those not identifying as a religious believer added other identity term(s) to their non-religious identity using the other-category, an easier choice-option would have likely led to a higher amount of non-religious identity combinations.

Conclusions

The results highlight that by studying attitudes towards religion systematically we can obtain useful information about the diverse ways non-religious people think and feel about religion and religiosity. In the present study, the four attitude dimensions of negative – positive valence, ambivalence of the attitudes, the amount of reflection, and personal importance of the attitudes best captured participants' views. We also found that different kinds of non-religious self-identification can in part be predicted by specific beliefs and attitudes towards religion. As such, our findings contribute to the growing understanding of non-religiosity.

Our findings further contribute insights on specific self-identification labels, which may be of practical relevance to future research on non-religiosity. First, we find that self-identified atheists are not necessarily the most hostile non-religious self-identification. Adding 'anti-religious' in surveys may separate more extreme versions of atheism. Second, self-identifying as agnostic

appears to cover too much variation, suggesting that future research should stop using one label and instead distinguish between agnostics who are uncertain about God's existence and agnostics who believe that nobody can know whether God exists or not. Third, using 'secular' may be too technical for survey research outside of the academic debate, since very few chose this category. 'Nonbeliever' appears to be a better alternative.

Nonetheless, the results also imply that information obtained from religious self-identifications is necessarily limited. Although all four aspects of the non-religious participants' attitudes towards religion ranged from one extreme to the other, the attitudes did not distinguish the groups from each other very efficiently. This was also reflected by the fact that only roughly a third of the non-religious participants were classified correctly, even when the attitudes were used as predictors together with belief in God and certainty of this belief. Such a low classification accuracy means that the groups were not homogeneous (Bücker, Szepannek, & Weihs, 2010) but heterogenous in terms of their attitudes and God beliefs. However, the results demonstrate that attitudes and God beliefs predict preference for some nonreligious identities better than others. Such factors as values (e.g., conservative vs. liberal) and cognitive dispositions (e.g., analytic vs. intuitive) could well be other meaningful elements in distinguishing between the groups.

These results illustrate the observation (Bullivant, 2013; Lehman & Sherkat, 2018) that the non-religious category terms are used and understood in a wide variety of ways and they carry a considerable number of positive and negative overtones and connotations, which vary between individuals as well as between different languages and cultures. It is easy to understand that non-religious categories are overall not "groupy" enough, because they don't have clear boundaries, internal homogeneity, social interaction, or clear internal structure (cf., Hogg, Sherman, Dierselhuis, Maitner, & Moffitt, 2007). The non-religious identity terms can thus be better

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understood as fuzzy categories, with category membership being a matter of degree and a matter of semantics. While category labels are needed for communication, we conclude that non-religiosity is probably too complex to be theoretically captured by identification terms. Aiming to understand portions of that complexity appears to be the only viable way forward.

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Table 7

Classification Results (%) of the Discrimination Analysis

	Identification group according to the analysis						
Self- identification	Atheist	Anti- religious	Agnostic	Non- believer	Secular	Spiritual but not religious	Spiritual seeker
Atheist	33.6	36.8	2.8	23.5	1.4	1.6	0.4
Antireligious	19.5	66.7	1.6	9.9	0.9	1.2	0.2
Agnostic	10.9	9.9	15.3	17.7	17.7	16.9	11.5
Nonbeliever	20.9	14.5	7.1	38.2	12.0	5.1	2.3
Secular	7.1	7.7	8.4	18.1	31.0	12.3	15.5
Spiritual but not religious	9.4	5.6	6.7	17.0	6.5	21.1	33.7
Spiritual seeker	9.3	4.9	5.9	6.3	6.8	10.2	56.6

Note. The table represents the percentages of correct and incorrect classifications of participants. Correct classifications are bolded. The classification was conducted based on the participants' belief in God, certainty of the belief, and the four attitude dimensions of valence, importance, reflection and elaboration.

Table 6
Means and Standard Deviations (in Parentheses) for Attitudes Towards Religion in Different Identification Groups

				Religious/spiritual	Identification group	0		
Attitude dimension	1. Atheists	2. Anti-religious	3. Agnostics	4. Nonbelievers	5. Seculars	6. Believers	7. Spiritual but not religious	8. Spiritual seekers
ALL								
Valence	1.98 (0.72)	1.47 (0.54)	2.60 (0.73) 45	2.43 (0.71) ³	2.88 (0.83) ³⁷⁸	3.97 (0.87)	2.82 (0.77) 58	3.17 (1.03) ⁵⁷
Reflection	3.22 (1.03) ²³⁵	3.23 (1.15) ¹³⁵	3.12 (0.94) ¹²⁵⁷	2.68 (1.10) 5	2.84 (0.93) 12347	3.47 (0.98) 8	3.31 (0.96) ³⁵	3.82 (0.87) ⁶
Importance	2.62 (1.12) ²³⁵⁷	2.84 (1.19) ¹³⁵⁷⁸	2.26 (1.06) 12457	2.15 (1.02) 35	1.95 (0.95) ¹²³⁴⁷	3.56 (0.94)	2.56 (1.12) ¹²³⁵⁸	3.01 (1.10) ²⁷
Ambivalence	2.31 (1.03)	1.91 (0.99)	3.01 (1.02) ⁵⁶⁷⁸	2.55 (1.06) ⁵⁶	2.89 (0.95) ³⁴⁶⁷⁸	2.82 (1.06) 3458	3.21 (1.04) ³⁵⁸	3.28 (1.19) ³⁵⁶⁷
FINLAND								
Valence	2.02 (0.72)	1.43 (0.47)	2.59 (0.72)	2.21 (0.67)	2.90 (0.76) ⁷	4.16 (0.74)	2.83 (0.76) 5	3.35 (0.97)
Reflection	3.23 (0.96) ²³⁴	3.36 (1.02) ¹³⁴⁷	3.19 (0.89) ¹²⁴	3.14 (0.95) ¹²³	2.82 (0.84)	3.94 (0.81) 8	3.51 (0.86) ²	3.93 (0.79) ⁶
Importance	2.51 (1.09) ²⁴⁷	2.71 (1.15) ¹⁷⁸	2.16 (1.03) 4	2.36 (1.06) ¹³⁷	1.81 (0.80)	3.71 (0.79)	2.48 (1.13) ¹²⁴	3.08 (1.06) ²
Ambivalence	2.27 (0.95) 4	1.92 (0.88)	3.01 (0.99) ⁵⁶⁷	2.45 (0.99) ¹	2.96 (0.91) ³⁶⁷	3.02 (0.95) ³⁵⁷	3.18 (0.99) ³⁵⁶⁸	3.47 (1.08) ⁷
DENMARK								
Valence	1.79 (0.62) ⁵	1.40 (0.47)	2.38 (0.81) 458	2.48 (0.66) ³⁵⁷⁸	2.33 (0.91) 13478	3.80 (0.88)	2.72 (0.80) ⁴⁵⁸	2.49 (1.02) ³⁴⁵⁷
Reflection	3.55 (0.91) ²³⁵⁶⁷⁸	3.63 (0.86) ¹³⁵⁶⁷⁸	3.42 (0.88) ¹²⁴⁵⁶⁷	3.20 (0.95) ³⁵⁶⁷	3.57 (1.14) ¹²³⁴⁶⁷⁸	3.46 (0.81) ¹²³⁴⁵⁷⁸	3.37 (0.94) 123456	3.96 (0.79) ¹²⁵⁶
Importance	2.97 (1.07) ²³⁵⁷⁸	3.24 (1.05) ¹³⁵⁶⁷⁸	2.81 (1.10) ¹²⁴⁵⁷⁸	2.45 (1.02) ³⁵⁷⁸	3.07 (1.34) ¹²³⁴⁶⁷⁸	3.51 (0.94) ²⁵⁸	2.83 (1.10) ¹²³⁴⁵⁸	2.98 (1.11) ¹²³⁴⁵⁶⁷
Ambivalence	2.32 (1.10) 5	1.90 (1.02)	3.12 (1.21) ⁴⁵⁶⁷⁸	3.21 (1.10) ³⁵⁶⁷⁸	2.93 (1.11) ¹³⁴⁶⁷⁸	3.18 (1.09) ³⁴⁵⁷⁸	3.48 (1.10) ³⁴⁵⁶⁸	2.92 (1.34) 34567
NETHERLANDS								
Valence	2.48 (0.79) 4	1.77 (0.74)	2.87 (0.63) ⁴⁵⁷⁸	2.71 (0.67) ¹³⁵⁷	3.19 (1.04) ³⁴⁷⁸	3.83 (0.97) 8	2.97 (0.75) 3458	3.36 (0.88) ³⁵⁶⁷
Reflection	2.02 (0.87) ²⁴⁵	1.74 (0.92) ¹⁴⁵	2.53 (0.94) ⁵⁷⁸	1.80 (0.75) ¹²⁵	2.42 (1.02) ¹²³⁴⁶⁷⁸	2.92 (0.95) ⁵⁷⁸	2.56 (0.91) ³⁵⁶⁸	3.01 (1.05) ³⁵⁶⁷
Importance	1.84 (0.95) ²³⁴⁵	1.88 (1.04) ¹³⁴⁵⁷	2.15 (0.98) ¹²⁵⁷⁸	1.72 (0.80) ¹²⁵	2.05 (1.04) 123478	3.39 (1.07)	2.40 (1.07) 2358	2.67 (1.26) ³⁵⁷
Ambivalence	2.49 (1.05) ³⁴⁵⁶⁷⁸	1.92 (1.13) ⁵	2.88 (0.97) ¹⁵⁶⁷⁸	2.37 (1.03) 1568	2.39 (0.99) 1234678	2.43 (1.06) 134578	2.93 (1.01) ¹³⁵⁶⁸	2.88 (1.29) ¹³⁴⁵⁶⁷

Note. Only non-significant differences are marked in the table: The superscripts indicate the identification group(s) with similar values on the variable. All other differences were significant after Bonferroni correction. All attitude variables could range between 1 (lowest score) to 5 (highest score). The secular groups were small in Denmark (n = 14) and in the Netherlands (n = 19). Other groups included more than 20 participants.

Table 5

Means and Standard Deviations (in Parentheses) for Belief fn God and Uncertainty of the Belief in Different Identification Groups

Identification group								
Belief variables	1. Atheists	2. Anti- religious	3. Agnostics	4. Non- believers	5. Seculars	6. Religious	7. Spiritual but not religious	8. Spiritual seekers
All								
Belief in	1.09 (0.41)2	1.10 (0.40) ¹	2.12 (1.00)5	1.49 (0.84)	2.44 (1.24) ³⁷⁸	4.59 (0.80)	2.64 (1.38) ⁵⁸	3.18 (1.42)57
God								
Un-	1.05 (0.23) ²	1.03 (0.19) ¹	1.32 (0.54) ⁵⁸	1.15 (0.40) ⁵⁶⁷	1.35 (0.55) ³⁴⁶⁷⁸	1.14 (0.39) ⁴⁵⁷⁸	1.18 (0.41) ⁴⁵⁶⁸	1.29 (0.56) ³⁵⁶⁷
certainty								
Belief by								
country								
FIN	1.05 (0.25) ²	1.13 (0.47) ¹⁴	2.04 (0.89)	1.23 (0.54) ²	2.35 (1.17) ⁷	4.77 (0.64)	2.50 (1.30) ⁵	3.61 (1.16)
DK	1.04 (0.30)2	1.03 (0.22) ¹	2.05 (1.22) ⁵⁸	1.31 (0.70)5	1.71 (1.07) ³⁴⁸	4.54 (0.80)	2.89 (1.54)	2.09 (1.57)35
NL	1.45 (0.88) ²	1.24 (0.57) ¹	2.57 (1.08) ⁷⁸	1.93 (1.04)	3.53 (1.26) ⁸	4.42 (0.91)	2.68 (1.32) ³⁸	2.69 (1.32) ³⁵⁷
Un-								
certainty								
by country								
FIN	1.05 (0.22) ²⁴⁶	1.02 (0.14) ¹⁴⁶	1.32 (0.52) ⁵⁸	1.10 (0.30) ¹²⁶⁷	1.38 (0.56) ³⁸	1.11 (0.31)1247	1.20 (0.44) ⁴⁶	1.34 (0.59) ³⁵
DK	1.01 (0.099)245	1.01 (0.12)145	1.28 (0.55) ⁵⁶⁸	1.06 (0.27)12578	1.07 (0.27)1234678	1.19 (0.47) ³⁵⁷⁸	1.12 (0.33) ⁴⁵⁶⁸	1.15 (0.42) ³⁴⁵⁶
NL	1.15 (0.43)245678	1.12 (0.37) ¹⁴⁵⁶⁷⁸	1.42 (0.61)4578	1.26 (0.52)1235678	1.37 (0.60)1234678	1.16 (0.43)124578	1.18 (0.43)1234568	1.27 (0.53)1234

Note. FIN = Finland, DK = Denmark, NL = the Netherlands. Only non-significant differences are marked in the table: The superscripts indicate the identification group(s) with similar values on the variable. All other differences were significant after Bonferroni correction. Belief in God could range between 1 (strongly disagree) to 5 (strongly agree), uncertainty of this response could range from 1 (= certain) to 3 (uncertain). The secular groups were small in Denmark (n = 14) and in the Netherlands (n = 19). Other groups included more than 20 participants.

Table 4

Percentages and Frequencies for Different Identifications

	All	Finland	Netherlands	Denmark
	(N = 4324)	(n = 2259)	(n = 857)	(n = 1208)
Self-identification	% (n)	% (n)	% (n)	% (n)
Atheist	29.5 (1276)	27.8 (627)	16.7 (143)	41.9 (506)
Anti-religious	10.2 (441)	6.3 (142)	8.6 (74)	18.6 (225)
Agnostic	11.8 (512)	15.5 (350)	9.2 (79)	6.9 (83)
Nonbeliever	17.9 (772)	16.4 (370)	31.7 (272)	10.8 (130)
Secular	3.7 (160)	5.6 (127)	2.2 (19)	1.2 (14)
Religious	8.7 (376)	7.3 (166)	17.2 (147)	5.2 (63)
Spiritual but not	8.2 (356)	8.5 (193)	7.2 (62)	8.4 (101)
religious				
Spiritual seeker	5.1 (221)	6.6 (148)	3.0 (26)	3.9 (47)
Other	4.9 (210)	6.0 (136)	4.1 (35)	3.2 (39)

Table 3.

Goodness-of-fit Summaries for and Sample Sizes of Two Confirmatory Factor Analyses

	χ²	df	р	RMSEA	SRMR	CFI	TLI	AIC	BIC	N
Model 1	876.91	59	<.001	0.082	0.057	0.94	0.92	75483.44	75663.95	2082
Model 2	212.45	38	<.001	0.047	0.032	0.98	0.98	64213.41	64371.41	2086

Note. RMSEA = root mean square error of approximation, SRMR = Standardized Root Mean Square Residual, CFI = comparative fit index, TLI = Tucker Lewis index, AIC = Akaike Information Criterion, BIC = Bayesian information criterion

Table 2

Factor Analysis with Oblimin Rotation of the Attitude Items

	Factors					
Attitude items	1	2	3	4		
1. Undesirability - desirability of religiosity	.86	02	.11	42		
2. Foolishness - wiseness of religiosity	.85	.01	.11	43		
3. Harmfulness – beneficiality of religiosity	.81	.02	.10	42		
4. How strong positive emotions do religions provoke in you?	.66	.19	.30	51		
5. Do you think other people should have similar religious attitudes as you?	44	.36	.24	.26		
6. How easy is it for you to explain your religious attitudes to other people?	41	.13	.08	.38		
7. How certain are you that your religious attitudes reflect the right way to think about religious issues?	40	.31	.20	.39		
8. Compared to how strongly you feel about other issues, how important are your religious attitudes to you?	.02	.89	.43	03		
9. How important are your religious attitudes to your identity?	02	.81	.40	.01		
1. Compared to how strongly other people feel about their own						
religious attitudes, how important are your religious attitudes to you?	07	.80	.43	.01		
11. Have you reflected on your religious attitudes?	06	.41	.76	17		
12. How interested are you in discussing issues related to religiosity?	.02	.45	.74	19		
13. Have you given thought to merits and shortcomings of your religious attitudes?	01	.39	.72	21		
14. How interested are you in books or tv programs about religiosity?	.14	.43	.65	25		
15. Does people's religiosity activate emotions in you?	09	.41	.45	18		
16. How strong negative emotions do religions provoke in you?	36	.39	.42	.01		
17. Could you consider changing your religious attitudes?	.19	.04	.38	36		
18. Do you have conflicting thoughts about religiosity?	.23	.08	.32	73		
19. Do you have both positive and negative thoughts about religiosity?	.43	03	.34	71		
2. Have you noticed a disagreement between your head and heart over your attitudes towards religiosity?	.39	.08	.26	54		
21. Do you consider religious issues thought provoking?	.47	.19	.50	51		

Note. Factor 1 = Valence, Factor 2 = Importance, Factor 3 = Reflection, Factor 4 = Ambivalence. Items included in the final sum variables are bolded. Original items per construct: Evaluation (items 1-3); Intensity of emotions (4,15,16); Perceived correctness (5,7,17); Elaboration (6,11,13); Importance (8-10); Interest (12,14,21); Ambivalence (18-20).

Table 1

Dictionary Definitions of the Identity Categories Used in the Study

Identity category	A person who
Atheist	does not believe in the existence of a God or gods
Anti-religious	opposes or rejects religion
Agnostic	espouses beliefs that nothing can be known of immaterial things (e.g. God), or a person who is undecided or uncommitted to any theory or belief pertaining to God(s) or higher powers
Nonbeliever	lacks religious faith or belief
Secular	is not religious and prioritizes the secular (this age, this world) as contrasted with eternal or spiritual time and/or space
Spiritual but not religious	is nonreligious but who believes in some form of alternative spirituality
Spiritual seeker	who sees religious life as being a quest, doubts religious tenets, rejects constant answers provided by established religions, and is ready to change one's own beliefs when warranted
Other	(to be named by the participants)

Note. The definition of spiritual seeker is based on the work of Batson and Schoenrade (1991), the other definitions are from the Dictionary of Atheism by Bullivant and Lee (2016). All definitions are here freely abbreviated.