Children's and Adolescents' Conceptions of Happiness

Belen Lopez-Perez[1], Janice Sanchez[2], & Michaela Gummerum[1]

[1]School of Psychology, Plymouth University, UK

[2]School of Management, University College of London, UK

Abstract

Previous research on children's and adolescents' happiness has mainly focused on the different variables that may contribute to it. However, very few studies have investigated the beliefs that children and adolescents hold about happiness. It is important to study developmental differences in the conceptions of happiness as beliefs affect people's emotions and behaviors, and they may help explain how children and adolescents strive for their own (and potentially others') happiness. To that aim, we asked 162 children and adolescents to define - in their own words - what happiness meant for them. Their responses were coded according to two different systems derived from previous finding with adults and children. Overall, results showed that hedonic conceptualization of happiness were mainly present in late childhood; whereas eudaimonic conceptualizations were mainly present in adolescence.

Keywords: happiness; children; adolescents; lay-theories.

Children's and Adolescents' Conceptions of Happiness

Children's and adolescents' happiness is an important topic that concerns families, educators, policy makers, and researchers alike. In fact, some organizations such as the United Nations Children's Fund (UNICEF) frequently conduct large-scale surveys that discuss children's wellbeing and strive to compare children's happiness and its determinants across different countries around the world (e.g., UNICEF, 2007, 2011). These studies have focused on *what makes children happy*, that is, the determinants of their subjective and psychological well-being. Although these reports have revealed interesting results, they have not yet considered *what children understand by the term "happiness"*. While the determinants and definitions of happiness are often treated as synonymous, they are completely different phenomena (Lu & Gilmour, 2004). This study focused on developmental differences in children's and adolescents' definitions of happiness to address this gap.

Scientific definitions of happiness

The concepts of well-being and happiness have been used interchangeably in various literatures (see Oishi, Graham, Kesebir, & Galinha, 2013 for a discussion on the topic). This led some researchers, such as Diener (1984), to advocate for the use of subjective well-being (SWB) to avoid the possible ambiguities of the term "happiness". However, even conceptualizing happiness as SWB may be limited as it only accounts for one possible definition of happiness (e.g., Ryan & Deci, 2001). Happiness has been primarily investigated through two different approaches. The first approach includes SWB and is considered a hedonic conceptualization; happiness is understood as the presence of positive emotions and life satisfaction (Diener, 1994, 2000). The second approach includes psychological well-being (PWB), having its roots in Aristotle's

concept of *eudaimonia*, and defines happiness as comprising meaning, self-actualization, and personal growth (Deci & Ryan, 2008; Ryff, 1989). Some authors have tried to reconcile both traditions. For example, Seligman (2011) has proposed five different elements to explain happiness: pleasure (i.e., the frequent experience of positive emotions), engagement (i.e., to get involved in absorbing tasks that make them enjoyable), relationships (i.e., to connect with others), meaning (i.e., to find purpose in one's own life), and accomplishment (i.e., to pursue and strive towards goals).

Research on lay theories of happiness

The manner in which people conceptualize or define happiness itself is a critical aspect in any investigation of happiness. Individuals' theories of happiness may influence people's own behavior and their behavior towards others aimed at striving for happiness (Diener, 2009; Furnham & Cheng, 2000). However, as Lu and Gilmour (2004) noted, the conceptions or "lay theories" people hold about happiness are often a neglected area of investigation in psychology. Research from other fields such as history, philosophy, and linguistics has widely documented variations in the conceptions of people's happiness across time and cultures (e.g., McMahon, 2006; Oishi et al., 2013; Wierzbicka, 2004). For instance, in ancient Greece happiness was seen as something beyond human control that depended on luck and attitudes and the actions of the gods (McMahon, 2006). Conversely, contemporary Americans view happiness as something that each individual can actively pursue and strive for (Kesebir & Diener, 2008).

Recent psychological research on people's conceptions of happiness has particularly focused on culture differences. One of the first studies on lay conceptions of happiness showed that Taiwanese adults emphasized harmony in their social relationships or being praised and respected by others more than their achievement at

work (Lu & Shih, 1997). Another study showed that participants from the USA and Canada, compared to those from El Salvador, placed more emphasis on pleasure and sources of power (Chiasson, Dubé, & Blondin, 1996). Although these two studies highlighted significant cultural differences, the results were difficult to generalize due to small samples.

Subsequent studies on cultural differences in happiness conceptions were conducted with larger samples. Lu and Gilmour (2004) compared American and Chinese undergraduate students' beliefs about happiness (n = 202) and found that American undergraduates emphasized enjoying life and living in the present moment while Chinese undergraduates highlighted the importance of a balanced life (harmonious homeostasis). From their findings, Lu and Gilmour (2004) proposed seven possible conceptual definitions of happiness (see Table 1). Another study by Pflug (2009) compared German and South African undergraduate students, identifying seven categories related to lay definitions of happiness. Results showed that German undergraduates placed emphasis on freedom and autonomy, whereas South African students emphasized social harmony. Delle Fave, Brdar, Freire, Vella-Brodrick, and Wissing (2011) noted that although these studies were conducted with bigger sample sizes, they were still comprised of undergraduate students making it difficult to generalize the obtained results. These authors conducted a study with a more demographically representative sample from Australia, Croatia, Germany, Italy, Portugal, Spain, and South Africa, finding twenty different categories comprising happiness (see Table 1). Across the different countries happiness as harmony/balance was the most mentioned category (Delle Fave et al., 2011).

Throughout these key studies, lay people's conceptualizations of happiness seem to overlap. For example, the presence of positive feelings, autonomy or freedom, and

(positive) relationships with others were consistently mentioned in almost all the studies presented. They can therefore be seen as robust dimensions of adults' lay theories of happiness across cultures. These overlapping categories have been classified as "Shared categories" in Table 1.

Children's and adolescents' lay theories of happiness

The main goal of the present study was to assess developmental differences in children's and adolescents' lay theories of happiness. So far, children's and adolescents' lay theories have largely been investigated in areas such as intelligence (Dweck & Master, 2008), personality (Levy, Karafantis, & Ramirez, 2009), peer relationships (Rudolph, 2010), and motivation (Gurland & Glowacky, 2011). Importantly, children's and adolescents' lay beliefs about a specific area (e.g., intelligence) affect their behavior, judgments, and emotions in that domain (Dweck, 1999). Therefore, investigating children's and adolescents' lay theories of happiness may provide further insight into their emotions and behaviors.

Research into children's and adolescents' lay theories of happiness is scarce. Previous work has mainly focused on children's indicators of their own well-being (e.g., Ben-Arieh, 2008; Crivello, Camfield, & Woodhead, 2009; Fattore, Mason, & Watson, 2007) rather than children's own conceptions of happiness itself. One exception is Giacomoni, Souza, and Hutz's (2014) study which investigated conceptions of happiness in Brazilian children aged 5 to 12. Participants mentioned eight different definitions of happiness (see Table 1). Definitions of happiness as "positive feelings", "no violence", and "being with friends" were mostly mentioned by older children. Defining happiness as "leisure" (i.e., engaging in fun activities) was mostly stated by younger children. Interestingly, girls highlighted positive feelings in their definitions,

whereas boys referred more to leisure or fun activities. Concerning adolescents' lay theories, a study by Freire, Zenhas, Tavares, and Iglésias (2013) with 15-year-old Portuguese adolescents showed that participants mentioned twenty-two different definitions of happiness (Table 1). Definitions of happiness as "emotions", "satisfaction", "relationships" and "harmony" were the most frequently mentioned while definitions related to "self-actualization", "leisure", and "purpose" were the least mentioned. Although this study was a first step in examining adolescents' happiness conceptualizations, it only considered a single age group (15-year-olds) and did not compare developmental differences in conceptualizations of happiness in children and adolescents.

Age and gender differences in the conceptualizations of happiness

Comparing children's and adolescents' conceptions of happiness seems particularly important because of the major cognitive, social, and psycho-social changes occurring throughout childhood and adolescence (see Adams & Berzonsky, 2003). In general, adolescents are more adept at abstract thinking (e.g., Gelman, 1969; Sternberg & Nigro, 1980). Children (9-11 years) are still considered to be at the concrete operational stage with reasoning limited to concrete examples rather than abstract or hypothetical concepts. Adolescents, on the other hand, can reason about abstract concepts without needing concrete examples (i.e., formal operational stage; Piaget, 1952). This ability to think abstractly is also reflected in developmental changes in social cognition, that is, differences in children's and adolescents' thinking about interpersonal relationships, politics, morality, and social institutions. For example, research on the development of friendship conceptions (Berndt, 1982; Berndt & Savin-Williams, 1993) found that children tended to focus on concrete aspects of their interactions with friends, such as playing, common activities, helping and sharing,

physical attributes, and global qualities of being nice and good. From preadolescence onward, friendship was conceptualized using more abstract characteristics, such as intimacy, loyalty, authenticity, and trust. Similarly, studies on the development of moral conceptions have shown that children tend to regard morality in terms of obedience to authority and concrete hedonistic and needs-oriented reasons. Concerns with society and defining morality in terms of abstract rights and justice start to emerge in adolescence (e.g., Eisenberg, 1986; Kohlberg, 1984). Given this research, there is likely to be a similar developmental shift in how happiness is conceptualized at different ages. Thus, children should be more likely to conceptualize happiness in concrete terms compared to adolescents, and should also focus more on the hedonistic and globally positive emotional qualities of happiness. In contrast, adolescents should define happiness in more abstract terms.

Positive relationships with significant others feature prominently in adults', adolescents', and children's conceptions of happiness (see Table 1). While people strive to create meaningful and intimate relationships with others throughout their lives, the "targets" of intimacy change between childhood and adolescence. Sullivan (1953) proposed that children tend to have their closest and most intimate relationships with their parents. From late childhood onwards, children describe their relationships with their peers and their friends as the closest, whereas from mid-adolescence, adolescents start to create intimate relationships with romantic partners. Indeed, much empirical research has confirmed that the parent-child relationship is the key social relationship in childhood, while close friendship becomes most important to adolescents (e.g., Hunter & Youniss, 1982; Youniss, 1980; Youniss & Smollar, 1985). Accordingly, we might expect that children mainly define happiness on the basis of their relationships with

their parents, and that adolescents conceptualize happiness in terms of close relationships with peers and friends.

Autonomy/freedom and competence/achievement are also elements in people's conceptions of happiness (see Table 1). According to self-determination theory (SDT; e.g., Deci & Ryan, 2013; Ryan, 1995), along with relatedness, people have fundamental needs for autonomy and competence, and people's well-being is based on the fulfillment of these needs. Autonomy "describes the natural inclination of human beings to be regulated by the self" (Deci & Ryan, 2013, p. 23). As per this view, autonomy (or self-regulation) is an integral part of human development, and research has identified major developments in terms of cognitive, behavioral, and emotional self-regulations in childhood (Denham, 1998; Eisenberg, 2000). However, much of the developmental literature defines "autonomy" as behavioral or emotional independence or freedom (Deci & Vansteenkiste, 2004; Grouzet, Sokol, & Müller, 2013). From this perspective, adolescence is regarded as an important phase in the development of autonomy (Zimmer-Gembeck & Collins, 2003). Specifically, adolescents develop emotional autonomy from their parents (e.g., Steinberg & Silverberg, 1986), they strive to and become increasingly competent at making independent decisions (Lewis, 1981), and they develop autonomous values and beliefs (Daniel et al., 2012; Eisenberg & Morris, 2004; Krettenauer, 2013). Changes in social status during adolescence (e.g., Zimmer-Gembeck & Collins, 2003) reflect this shift towards greater autonomy. Based on this research and as we are focusing on child-lay theories, we use the developmental definition of autonomy and predicted that adolescents are more likely than children to define happiness in terms of autonomy, self-determination, or freedom.

According to Ryan and Deci (2013, p. 194), competence "refers to the experience of effectiveness or capability in action or people's desire to be effective in

dealing with the environment and its outcomes". SDT proposes that the satisfaction of the psychological needs for relatedness, autonomy, and competence leads to intrinsic motivation and well-being (Ryan & Deci, 2013). Studies with young children have shown how they enjoy their actions and their effects on the environment, these being the first displays of competence (Ryan & Deci, 2013). Children's play constitutes one of the best examples of intrinsic motivation, as they engage in those actions in the absence of any incentive (Deci & Ryan, 2013). Although empirical studies (e.g., Gottfried, Fleming, & Gottfried, 2001; Harter, 1981; Lepper, Corpus, & Iyengar, 2005) have shown how intrinsic (academic) motivation remained stable until mid-adolescence, a decline in academic motivation is possible as a consequence of its evaluation methods (Lepper et al., 2005; Gillet, Vallerand, & Lafrenière, 2012). Therefore, we would expect externally motivated competence to increase with age.

Some theoretical accounts define happiness as *eudaimonia*, or flourishing, which alludes to finding purpose in one's life, self-actualization, freedom to be oneself, and personal growth (Deci & Ryan, 2008; Ryff, 1989). This conception of happiness seems to be closely related to identity processes. Elementary school children have some basic levels of self-awareness and they can describe themselves in concrete, behavior-oriented ways (e.g., "I am a girl; I have two brothers"). Yet adolescence is regarded as the time when people have the cognitive and emotional capacities to reorganize their self-conceptions and to imagine alternative and future selves in order to develop a coherent sense of self (see Kroger, 2005; Schwartz, Donnellan, Ravert, Luyckx, & Zamboanga, 2013, for overviews). Because the development of a sense of self and identity are central to adolescents' psycho-social development, we expect that aspects of happiness referring to *eudaimonia* will only be mentioned by adolescents, not by children (see Freire et al., 2013; Giacomoni et al., 2014).

The question of whether males and females conceptualize happiness differently has received mixed results so far. Chaplin (2009) found gender differences when children elaborated on the causes of happiness. Giacomoni et al. (2014) also found differences between girls' and boys' conceptualizations of happiness. Yet, previous research on adults' conceptions of happiness did not find gender differences (Lu & Gilmour, 2004). Therefore, we have included gender in our analyses for exploratory purposes.

Spanish children's and adolescents' happiness

The current study draws on a sample of Spanish children and adolescents. Spain was ranked 5th amongst 21 countries in the world with the highest child happiness ratings (UNICEF's Report Card 7, 2007). In the last ten years, Spain has gone from being a relatively poor European country to seeing considerable economic growth (UNICEF, 2011). However, at the same time, it has been affected by the latest economic recession and poverty appears to be increasing (UNICEF, 2009). In fact, a recent report ranked Spain as the 2nd highest European country in childhood poverty, with 30% of children being at risk of poverty (Caritas Europa, 2014).

Two different investigations are available specifically on Spanish children's and adolescents' determinants of happiness; UNICEF's report (2011) showed that being surrounded by family and friends and having leisure activities to take part in are key components of children's happiness (from 8 to 13-years-old). Similar results were found in a study conducted with children aged 6-12 by Thoilliez (2011). Children additionally highlighted celebrating special occasions, high academic achievements, and behaving morally (e.g., helping others) as the main determinants of their happiness (Thoilliez, 2011).

The present research

In the present study we aimed to analyze Spanish children's and adolescents' conceptions about happiness. In particular, we investigated how children and adolescents define happiness and study differences in these lay theories across age groups and gender. To our knowledge only two studies have focused on happiness conceptions in children and adolescents (Freire et al., 2013; Giacomoni et al., 2014). However, neither study investigated both age groups and the possible changes in conceptualizations throughout. As discussed above, it is important to investigate what comprises happiness for children and adolescents in order to better understand their behavior and emotions. To achieve these aims we asked children and adolescents to define happiness in their own words. Before analyzing the children's and adolescents' conceptions, we developed two coding systems based on the content categories identified in previous research with children and adults. This was done in order to categorize the responses and to determine the reliability of our findings compared to the previous studies conducted with Portuguese and Brazilian children and adolescents. Given that it was an exploratory study we did not pose any hypotheses but explored the possible categories that emerged.

Study 1: Creation of the Coding Systems

Given that different studies devised (slightly) different category systems for capturing people's definitions of happiness, we decided to conduct a study on the different definitions of happiness in order to create a new coding system that may capture all the significant categories in these studies.

Method

Participants. Twenty external lay judges (8 females and 12 males; age range from 22 to 37, M_{age} = 25.31 and SD_{age} = 3.57) completed a card-sort procedure. These judges had no previous knowledge about happiness theory. The sample size was determined according to the criteria established by Tullis and Wood (2004) who found no substantial reliability increase when the sample sizes exceeded 20.

Procedure. First, we reviewed all the previous qualitative work on adults' lay theories of happiness conducted with representative sample sizes and created cards with each category and their corresponding definitions (see Table 1). After that, we asked 20 external lay judges to complete a card-sort procedure. Participants were given separate cards with each of the 26 distinct categories printed on them and asked to sort the categories into mutually exclusive groups that reflected their own perceptions of similarities and differences. They were instructed to form as many categories as they felt appropriate, each containing as many or as few definitions of happiness as they wished. We ran a hierarchical cluster analysis as this analysis organizes entities (in this case, content categories) into relatively homogeneous groups (Aldenderfer & Blashfield, 1984). An agglomerative clustering method was chosen, whereby the most similar content categories were merged to produce non-overlapping hierarchically nested clusters of increasing inclusiveness. The average linkage rule (Sokal & Michener, 1958) was then applied. This rule joins the two most similar cases together in a cluster and then calculates the average similarity of a case with all other cases within and outside the cluster. After that, participants completed the same task for the categories identified in previous studies with children and adolescents (see Table 1). Participants were given separate cards with each of the 21 distinct categories printed on them and were asked to complete the same procedure described above.

Results and Discussion

The main output from this clustering process for coding system 1 (based on the categories identified in adults) was a dendrogram which grouped the 26 content categories into eight different clusters (see Figure 1): positive feelings, well-being, self-autonomy, achievement, relating to people, opposite of happiness, leisure, and ultimate value. The category "well-being" included categories that previous research has classified as independent constructs, namely, "feelings of contentment", which is a hedonic component of well-being, and "harmony" or "balance" which are considered eudemonic components (Dambrun et al., 2012; Huta & Waterman, 2014). Furthermore, "health" was also included in this category. However, previous research has shown that health may not be related to an individual's level of well-being (Chaves, Hervás, García, & Vázquez, 2015). Therefore, we decided to separate those components into different categories ("well-being" was relabelled "harmony/balance" here and in the other coding systems for clarity, as it finally only included the eudamonic components of harmony and balance). Participants also considered "freedom from being ill", which previous literature defined as the absence of physical illness or injury (e.g., Lu, 2001), as part of self-autonomy. Given that these two content categories are not related in the literature we kept them separate. Therefore, the final categories were: positive feelings, harmony/balance, self-autonomy, health, achievement, relating to people, opposite of happiness, leisure, and ultimate value.

The results from coding system 2 (based on the categories previously identified in children and adolescents) showed that the 21 categories were grouped into eleven different clusters (see Figure 2): positive feelings, harmony/balance, leisure, family, friends, autonomy, school, moral actions, basic needs, society, and purpose. Again, the category harmony/balance comprised a hedonic component of well-being (i.e., satisfaction) and health. Therefore, we grouped 'satisfaction' with the category positive

feelings, as both are related to hedonic components of well-being, and added 'health' as an independent content category (see Figure 2).

As we anticipated, although some of the categories received different names across research studies (e.g., 'harmonious homeostasis' in Lu, 2001, and 'harmony' in Delle Fave et al., 2011), they were often grouped under the same category. Therefore, the obtained categorisation system in this study is simpler but at the same time comprehensive as it contains all the possible definitions previously identified in research on the topic.

Study 2: Children's and adolescents' conception of happiness

The aim of Study 2 was to examine children's and adolescents' lay theories using our two different research-informed coding systems created in Study 1 comparing all the possible categories previously identified in research with adults (coding system 1) and children and adolescents (coding system 2).

For coding system 1, we expected children to rely on more concrete definitions of happiness, whereas adolescents on more abstract ones (e.g., Gelman, 1969; Sternberg & Nigro, 1980). Thus, we expected children to define happiness in terms of 'positive feelings', whereas adolescents were expected to define it in terms of 'self-autonomy', 'external-oriented achievement', and 'ultimate value of life'. We expected the conceptualization of happiness as 'harmony/balance', (i.e., satisfaction and balance) to be more often mentioned by the eldest age group as previous literature has suggested that children have not yet developed the cognitive abilities to make life satisfaction assessments (Coffey, Warren, & Gottfried, 2014). Regarding the conceptualization of happiness as positive relationships, we expected that children would mainly define it on the basis of their relationships with their parents, and that adolescents would

conceptualize happiness in terms of close relationships with peers and friends (e.g., Hunter & Youniss, 1982; Youniss, 1980; Youniss & Smollar, 1985). We did not propose any specific hypothesis about the content category 'opposite of happiness'. We explored whether this category was present in children and adolescents' definitions to a similar degree as in adults' definitions, in which 19% of participants defined happiness in terms of this content category (Pflug, 2009).

Next, using coding system 2, we explored to what extent our findings compare to previous results obtained in the literature with children and adolescents (Freire et al., 2013; Giacomoini et al., 2014), namely, to what extent 'positive feelings' would be the most mentioned category, followed by 'family and friends'[1]. As it is not clear whether males and females conceptualize happiness differently (e.g., Chaplin, 2009; Lu & Gilmour, 2004), we entered gender as a control variable in our analyses for exploratory purposes.

Method

Participants. One-hundred and sixty-two children and adolescents from two different public schools in a large urban city of Spain participated in this study. The first age group consisted of 5th and 6th graders (N = 56; aged between 9 and 11 years-old; $M = 10.93$; $SD = 0.66$; 28 females). The second age group was comprised by 7th and 8th graders (N = 56; aged between 12 and 13 years-old; $M = 12.73$; $SD = 0.66$; 29 females). Finally, the third age group contained 9th and 10th graders (N = 54; aged between 14 and 16 years-old; $M = 14.67$; $SD = 0.79$; 21 females). All participants were from middle-class socio-economic backgrounds (see Table 2). The division of the sample into these

---

[1] We also developed our own coding system based on previous research categories, as suggested by a reviewer, and explored the obtained pattern (i.e., coding system 3; please see Appendices B and C).

specific age groups was done because the Spanish school system is organized in this manner; grade 5 and 6 constitute the final cycle of primary education, 7th and 8th grades constitute the first cycle of secondary education, and 9th and 10th grades constitute the second cycle of secondary education. The results are presented according to the ages comprised within each grade group, as grade groups may not be equivalent in different countries.

Procedure. Participants were given a consent form to be signed by them and their parents prior to participating. Once consent was obtained, participants were taken to the schools' computer room by their teachers and a research assistant. They were told that the aim of the study was to know their opinion about happiness and were asked to define happiness in their own words. They were given 10 minutes to answer this question on a computer, without any character or word limit. Once this question was answered participants were thanked and debriefed.

Coding. Participants' answers were coded into two coding systems. For each coding system participants' responses could be coded as belonging to any of the content categories (see Appendix A and B).

Two independent coders coded all the responses. Overall, inter-rater agreement was high with Cohen's $\kappa = .85$ for coding system 1, $\kappa = .87$ and for coding system 2[2]. Disagreements were discussed and consequently resolved between the two coders.

Statistical Analyses. To investigate whether participants showed differences in their frequencies of opting for particular content categories of happiness depending on age and gender we computed a set of log-linear analyses (see Wickens, 1989). First, the automatic model search of the Statistical Package for the Social Sciences (SPSS 21.0)

---

[2] Inter-rater agreement was also high for coding system 3, $\kappa = .86$.

saturated hierarchical log-linear (hi-log-linear) procedure was run to find the most parsimonious final model. A final model having a value greater than $p = .05$ is considered to be fitting. The model fit (χ^2) of the hi-log-linear procedure is presented in the text. To estimate single parameters (z values), a log-linear model was computed.

Results and Discussion

      Results based on coding system 1. Only 17 (7%) participants used two different concept categories in their definitions of happiness. We analyzed whether the number of content or concept categories differed by age but found no differences, $F (2, 158) = 1.80$, $p = .17$, $\eta^2_p = .02$. Table 3 displays the frequency of happiness concept categories by age[3].

      The conceptions 'autonomy', 'health', and 'opposite of happiness' did not appear in any of the participants' definitions (see Table 3). 'Leisure' appeared in only one definition provided by a 9 year-old. Therefore, we could not analyze those categories. For the remaining categories, if not otherwise indicated, we ran hi-log-linear and log-linear analyses independent for each happiness conception including the variables Content category [not mentioned (r), mentioned], Age group [9-11-year-olds (r), 12-13-year-olds, and 14-16 year-olds], and Gender [female (r), male] with (r) indicating the reference category of each factor for the z value. Significant effects (partial chi-squares) and corresponding parameter estimations (z values) are reported in Table 4.

      For the concept category 'positive feelings', the hi-log-linear analyses produced the final model of positive feelings $\times$ age, $\chi^2 = 4.39$, $df = 6$, $p = .62$. The log-linear

---

[3] Given that our research design was based on one open-ended question without a word limit, we calculated whether the length of responses (number of characters) may differ by age as suggested by a reviewer. Results showed that the number of characters did not differ by age, $F (2, 159) = .95$, $p = .40$, $\eta^2_p = .01$.

analysis showed significant differences between the age groups (see Table 4), with participants in the younger age group mentioning this conception significantly more often than participants in the respective older age groups. There was no significant interaction of gender with content category ($\chi^2 = 1.70$, $df = 1$, $p = .19$) or age ($\chi^2 = 2.04$, $df = 2$, $p = .36$). The model of positive feelings x gender x age was not significant ($\chi^2 = .79$, $df = 2$, $p = .68$).

For the concept category 'harmony/balance', the hi-log-linear analyses produced the final model of harmony/balance $\times$ age, $\chi^2 = 4.03$, $df = 6$, $p = .67$. The log-linear analysis showed significant differences between the age groups (see Table 4), with participants in the younger age group mentioning this conception significantly less often than participants in the respective older age groups. Gender did not significantly interact with content category ($\chi^2 = .01$, $df = 1$, $p = .92$) or age ($\chi^2 = 1.88$, $df = 2$, $p = .39$). The model of harmony/balance x gender x age was not significant ($\chi^2 = 2.11$, $df = 2$, $p = .35$).

For 'achievement', the hi-log-linear analyses produced the final model of achievement $\times$ age, $\chi^2 = 4.21$, $df = 6$, $p = .64$. The log-linear analysis showed significant differences between the age groups, with participants in the younger age group mentioning this conception significantly less often than participants in the respective older age groups. Concerning gender, there were no significant interactions with content category ($\chi^2 = 1.91$, $df = 1$, $p = .39$) or age ($\chi^2 = .02$, $df = 2$, $p = .86$). The model of achievement x gender x age was not significant ($\chi^2 = 1.91$, $df = 2$, $p = .38$).

The hi-log-linear analyses for happiness as 'relating to people' did not produce a significant model for any interaction, only the main effect of the category was significant, $\chi^2 = 6.30$, $df = 10$, $p = .77$. The log-linear analysis showed that none of the groups differed significantly from each other, being one of the most mentioned

categories in all of the age groups. Gender did not have a significant interaction with content category ($\chi^2 = .98$, $df = 1$, $p = .32$) or age ($\chi^2 = 1.66$, $df = 2$, $p = .44$). The model of relating to people x gender x age was not significant ($\chi^2 = .28$, $df = 2$, $p = .87$).

Finally, the category 'happiness as the ultimate value in life' could not be tested through these analyses as the cell frequency for the two youngest age groups was lower than 5. However, 15 percent of the oldest participants referred to this category in their responses.

Results based on coding system 2. Similar to the results using coding system 1, few participants ($n = 14$; 6%) used two different content categories in their definitions of happiness. Furthermore, there was not an effect of age in the number of content categories mentioned (F (2, 158) $= .05$, $p = .96$, $\eta^2_p = .001$). The content categories 'moral actions', 'health', 'non-violence', 'society', and 'autonomy' did not appear in children's and adolescents' definitions. 'Leisure' appeared in only one definition provided by a 9 year-old. The content category "basic needs" was only provided twice by 12-13-year-olds (see Table 3). Therefore we did not run any analyses for these categories.

For the remaining categories, if not otherwise indicated, we ran hi-log-linear and log-linear analyses independent for each happiness conception including the variables Content category [not mentioned (r), mentioned], Age group [9-11-year-olds (r), 12-13-year-olds, and 14-16 year-olds] and Gender [female (r), male] with (r) indicating the reference category of each factor for the z value. Significant effects (partial chi-squares) and corresponding parameter estimations (z values) are reported in Table 4.

The categories 'positive feelings' and 'harmony/balance' captured the same number of definitions as coding system 1, obtaining the same results. Thus, 'positive

feelings' was mentioned more frequently by the youngest age group compared to the other two age groups, whereas 'harmony/balance' was mentioned most by the eldest age group compared to the other two age groups.

The hi-log-linear analyses for happiness as 'family' did not produce a significant model for any interaction, only the main effect of the category was significant, $\chi^2 = 7.76$, $df = 10$, $p = .65$. The log-linear analysis showed that none of the age and gender groups differed significantly from each other (see Table 4). This category was moderately mentioned by participants (18%). With regards to gender, the interaction with content category ($\chi^2 = .38$, $df = 1$, $p = .53$) and age ($\chi^2 = 1.63$, $df = 2$, $p = .44$) were not significant. The model of family x gender x age was not significant ($\chi^2 = 2.40$, $df = 2$, $p = .30$).

The hi-log-linear analyses for happiness as 'friends' did not produce a significant model for any interaction, only the main effect of the category was significant, $\chi^2 = 9.65$, $df = 10$, $p = .47$. The log-linear analysis showed that none of the age and gender groups differed significantly from each other (see Table 4). This category was moderately mentioned by participants (14%). There were no significant interactions of gender and content category ($\chi^2 = 2.51$, $df = 1$, $p = .12$) or gender and age ($\chi^2 = 2.06$, $df = 2$, $p = .36$). The model of friends x gender x age was not significant ($\chi^2 = 2.83$, $df = 2$, $p = .24$).

The category 'school' captured the same number of definitions as that of 'achievement' in coding system 1, thus it was less mentioned by the youngest age group compared to the two older age groups. Similarly, the category 'purpose' captured the same number as 'ultimate value in life' in coding system 1; it was hardly mentioned by the two youngest age groups and mentioned only by 15% of 14-16-year-olds.

General Discussion

The present study sought to address a gap in the literature concerning the study of children's and adolescents' lay theories of happiness. To that aim, we asked children and adolescents to define in their own words what they understood by happiness. The obtained results from the two coding systems used provided novel insights into children's and adolescents' lay theories of happiness as well as additional support for and some deviations from previous studies' findings.

Children's and adolescents' conceptions from the categories identified in adults' happiness research

The results obtained with the coding derived in Study 1 (coding system 1) revealed an interesting pattern. First, the conception of happiness as 'positive feelings' (i.e., feeling joy, smiling, laughing, etc.) was mentioned the most by children (9-11 years-old) and the least by the oldest age group (14-16-year-olds). We expected this result given that this is the most concrete and least abstract conception of happiness, and therefore, more likely to be present in children (Gelman, 1969; Sternberg & Nigro, 1980). Considering the overall content frequencies (without splitting by age), this category was the most mentioned supporting Giacomoni et al.'s study (2014) with younger children.

The conception of happiness as 'harmony/balance' (i.e., harmony and balance) was mainly present in adolescents' definitions and least in the youngest age group. This result is in line with previous work which showed that cognitive evaluations of well-being seem not to be as common in childhood (Coffey et al., 2014).

The definition of happiness as 'achievement' was most mentioned by the eldest age group, followed by the middle group, and least by the youngest age group. A brief review of the responses showed that all of the participants defined achievement in terms of getting good grades and 80% (25 participants out of 36) as being praised for good

grades. A possible reason for this effect could be due to the increase in extrinsic motivation and decrease in intrinsic motivation which has been found in adolescence (Gillet et al., 2012; Lepper et al., 2005).

Happiness as 'related to people' did not differ across the three age groups studied. There were also no significant differences amongst age groups using coding system 2 which splits this category into family and friends. This is surprising given that adolescents compared to children tend to give more importance to relationships with peers rather than family (e.g., Fuligni & Eccles, 1993; Greenberg, Siegel, & Leitch, 1983). The obtained results are in line with the study by Giacomoni et al. (2014), as children aged 11-12 mentioned family and peers to same extent. From a cultural psychological perspective, this effect might be due to collectivism which may override the developmental effect. Spain has been defined as a horizontal collectivistic society (Gouveia, Clemente, & Espinosa, 2010) meaning that Spanish society values a respect for others and the maintenance of harmonious relationships, particularly with family and friends. Previous developmental research has found an effect of horizontal collectivism in Spanish children's and adolescents' sociomoral reasoning that overrode the established developmental effect (López-Pérez, Gummerum, Keller, Filippova, & Gordillo, 2015). Thus, in contrast to children and adolescents in more 'individualistic' societies, family relations might remain a source of happiness for Spanish adolescents.

Finally, definitions of happiness 'as the ultimate value' hardly appeared in children's and adolescents' definitions, being mostly mentioned by the eldest age group. This supports previous results, as in the study conducted by Freire et al. (2013) in which it was also one of the concept categories mentioned less frequently. It is possible that this conception may be more philosophical and thus beyond children's common vernacular. Furthermore, in terms of developmental differences, this conceptualization

is more related to identity and a coherent sense of self, which is one of the major developmental tasks in adolescents (Kroger, 2005).

Children's and adolescents' conceptions from the categories identified in children's and adolescents' happiness research

In line with the findings from coding system 1 on achievement, the results using coding system 2 found that the category 'school' was mentioned more by the eldest age group, followed by the middle age group and the youngest age group. Unlike the study by Giacomoni et al. (2014), participants in the present study only described situations which involved recognition, that is, extrinsic motivation (i.e., being congratulated for getting good grades) rather than intrinsic motivation (i.e., learning new things).

Focusing on coding system 2, overall our results did not replicate those obtained by Giacomoni et al. (2014) when comparing equivalent age groups. Our results are only similar for the category of 'positive feelings' which was the most mentioned by the overlapping age groups in both studies. None of the other content frequencies correspond to the frequencies obtained in the present study. The categories 'leisure', 'basic needs', and 'moral actions' were not prominent in our sample; some of them were either hardly mentioned (1 or 2 participants) or not mentioned at all. When comparing our results with those obtained by Freire et al. (2013) with Portuguese adolescents, we observed similarities as 'positive emotions' and 'relationships' were popular content categories in our overall sample as well. However, there were differences when considering the age group that overlaps with Freire et al. (2013)'s study (i.e., 15-year-olds). In our sample, 14-16-year-olds mentioned the content categories 'harmony/balance' and 'achievement' more frequently compared to the same age group in Freire et al.'s study. Therefore, our results highlight the importance of

studying cultural differences in lay theories of happiness in children and adolescents as content categories may vary from one culture to another.

Finally, children and adolescents in our study did not mention the categories 'opposite of happiness', 'health', 'autonomy', 'leisure', 'society', and 'moral actions'. The first three categories were captured in the research conducted with adults, and therefore the obtained results highlight some of the differences in categories between children and adolescents and adults. Alternatively, 'opposite of happiness' may be mainly relevant to children experiencing a large amount of adversity (e.g., Coffey, Wray-Lake, Mashek & Branand, 2015). Children in experiencing such difficulties may be more likely to define happiness as not experiencing the source of adversity (i.e., negative emotions, negative experiences, or psychopathology) rather than using the other content categories mentioned by our sample. The three other categories (leisure, society, and moral actions) were identified by previous research with children and adolescents (Freire et al., 2013; Giacomoni et al., 2014) so future research may need to investigate possible cultural or other differences in children's and adolescents' lay theories with regards to these categories.

Overall, our results showed that a hedonic conceptualization of happiness as 'positive feelings' was mainly present in the youngest age group (late childhood); whereas eudemonic conceptions (e.g., 'ultimate value') were mainly present in the eldest age groups. These results seem to be in line with the findings reported by Delle Fave et al. (2011) in which eudemonic conceptions accounted for more variance than hedonic conceptions in adults' definitions of happiness.

We did not find a significant effect regarding gender using any of our coding systems. Although a previous study conducted with children (Giacomoni et al., 2014) found differences between boys and girls in reported conceptualizations of happiness,

studies conducted with adults did not find such differences (e.g., Delle Fave et al., 2011; Lu & Gilmour, 2004). It is possible that as children get older the gender effect may attenuate. Therefore, future research would need to investigate whether and why gender differences exist in early and middle childhood.

It is important to note that across ages very few participants (less than 10%) mentioned two different content categories within their definitions. Previous research has found that happiness is domain specific (van de Wetering, van Exel, & Brouwer, 2010), and, therefore, more complex definitions may emerge if asking about concrete or different domains (e.g., general happiness, happiness at school, happiness at home, etc.). Nevertheless, adults usually provided longer definitions even without domain-specific questions so future research can explore the age at which more complex definitions begin to emerge as there were no differences in mentioning more categories in the age range we investigated.

Limitations, future research, and implications

Our study has some limitations due to our reliance on one open-ended question. Although previous research has used the same methodology (e.g., Giacomoni et al., 2014; Lu & Gilmour, 2004), the length of responses obtained in studies conducted with adults was longer. It would be interesting to investigate when this increase in content occurs as we did not find that the length of response differed by age in the present study. As mentioned above, future work would benefit from including more questions which can further explore children's and adolescent's conceptions of happiness. For instance, asking children and adolescents whether they believe happiness is modifiable, as previous literature on lay-theories about intelligence has shown this belief to be relevant (Dweck & Masters, 2008). Future research can also focus on the relationship between parents' and children's beliefs about happiness to study the possible influence

of proximal context (i.e., family) in a child's formation of their conceptions about happiness. We believe that such influence may exist given that previous research has shown that parents, peers, and other caregivers are highly influential in children's developing appraisals (Denham, 1998; Eisenberg, Cumberland, & Spinrad, 1998; Thompson, 1994). Additionally, the coding systems used in Study 1, could be modified using expert rather than lay-judges to determine the categories. This would possibly provide slightly different, though similar categories. Finally, in some of the categories the number of participants was low limiting the scope of the present findings. Thus, future research may be conducted with a greater sample size.

At the theoretical level this study highlights the importance of studying happiness and its different components, considering the different content categories identified in previous research and taking into account cultural background. At the practical level this study sheds more light into the developmental trajectory of lay definitions of "happiness" in contemporary Spanish children and adolescents revealing the dimensions that are becoming important and those that are decreasing in relevance.

References

Adams, G. R., & Berzonsky, M. (2003). *Blackwell handbook of adolescence*. Malden,

    MA: Blackwell.

Aldenderfer, M. S., & Blashfield, R. K. (1984). *Cluster analysis.* Newbury Park, CA:

    Sage.

Ben-Arieh, A. (2008). The Child Indicators Movement: Past, Present, and Future. *Child*

    Indicators Research, 1, 3-16. http://dx.doi.org/10.1007/s12187-007-9003-1

Berndt, T. (1982). The features and effects of friendship in early adolescence. *Child*

    *Development, 53,*1447-1460. http://dx.doi.org/10.2307/1130071

Berndt, T. J., & Savin-Williams, R. C. (1993). Peer relations and friendships. In P. H. Tolan

    & B. Cohler (Eds.), *Handbook of clinical research and practice with adolescents* (pp.

    203-219). New York: John Wiley.

Caritas Europa (2014). The European Crisis and its Human Cost. Crisis Monitoring

    Report. Retrieved from:

    http://www.caritas.eu/sites/default/files/caritascrisisreport_2014_en.pdf

Chaplin, L. (2009). Please may I have a bike? Better yet, may I have a hug? An

    examination of children's and adolescents' happiness. *Journal of Happiness*

    Studies, 10, 541–562. http://dx.doi.org/10.1007/s10902-008-9108-3

Chaves, C., Hervas, G., García, F., & Vazquez, C. (2015). Building life satisfaction

    through well-being dimensions: A longitudinal study in children with a life-

    threatening   illness. *Journal   of   Happiness   Studies.*

    http://dx.doi.org/10.1007/s10902-015-9631y

Chiasson, N., Dubé L., & Blondin, J.. (1996). Happiness: A look into the folk
psychology of four cultural groups. *Journal of Cross-Cultural Psychology, 27*,
673-691. http://dx.doi.org/10.1177/0022022196276002

Coffey, J. K., Warren, M., & Gottfried, A. (2014). Does infant happiness forecast
adult life satisfaction? Examining subjective well-being in the first quarter century
of life. *Journal of Happiness Studies*. http://dx.doi.org/10.1007/s10902-014-9556-
x

Coffey, J. K., Wray-Lake, L. Mashek, D., & Branand, B. (2014). A longitudinal
examination of a multidimensional well-being model in college and community
samples. *Journal of Happiness Studies*. http://dx.doi.org/10.1007/s10902-014-
9590-8

Crivello, G., Camfield, L., & Woodhead, M. (2008). How can children tell us about
their wellbeing? Exploring the potential of participatory approaches within the
Young Lives Project. *Social Indicators Research*, *90*, 51-72.
http://dx.doi.org/10.1007/s11205-008-9312-x

Dambrun, M., Ricard, M., Després, G., Drelon, E., Gibelin, E., Gibelin, M., Loubeyre,
M., Delpy, A., Garibbo, C., Bray, E., Lac, G., & Michaux, O. (2012). Measuring
happiness: From fluctuating happiness to authentic-durable happiness. *Frontiers
in Psychology, 3*, 16. http://dx.doi.org/ 0.3389/fpsyg.2012.00016

Daniel, E., Schiefer, D., Möllering, A., Benish-Weisman, M., Boehnke, K., & Knafo, A.
(2012). Value differentiation in adolescence: the role of age and cultural
complexity. *Child Development, 83*, 322-336. http://dx.doi.org/10.1111/j.1467-
8624.2011.01694.x

Deci, E. L., & Ryan, R. M. (2008). Hedonia, eudaimonia, and well-being: An

introduction. *Journal of Happiness Studies*, *9*, 1-11.

http://dx.doi.org/10.1007/s10902-006-9018-1

Deci, E. L., & Ryan, R. M. (2013). The importance of autonomy for development and

well-being. In B. W. Sokol, F. M. E. Grouzet, U. Muller (Eds.), *Self-regulation*

and autonomy: Social and developmental dimensions of human conduct (pp. 19-

46).   New   York: Cambridge   University   Press.

http://dx.doi.org/10.1017/CBO9781139152198.005

Deci, E. L., & Vansteenkiste, M. (2004). Self-determination theory and basic need

satisfaction: Understanding human development in positive psychology. *Ricerche*

di Psicologia, *27*, 17-34.

Delle Fave, A., Brdar, I., Freire, T., Vella-Brodrick, D., & Wissing, M. P. (2011). The

eudaimonic and hedonic components of happiness: Qualitative and quantitative

findings. *Social Indicators Research, 100*, 158–207.

http://dx.doi.org/10.1007/s11205-010-9632-5

Denham, S. A. (1998). *Emotional development in young children*. New York. NY:

Guilford.

Diener, E. (1984). Subjective well-being. *Psychological Bulletin*, *95*, 542-575.

http://dx.doi.org/10.1037/0033-2909.95.3.542

Diener, E. (1994). Assessing subjective well-being: Progress and opportunities. *Social*

Indicators Research, 31, 103–157. http://dx.doi.org/10.1007/BF01207052

Diener, E. (2000). Subjective well-being: The science of well-being and a proposal for a

national index. *American Psychologist, 55*, 34–43.

http://dx.doi.org/10.1037/0003-066X.55.1.34

Diener, E. (Ed.). (2009). *The science of well-being: The collected works of Ed Diener* (Vol. 1). New York: Springer Science & Business Media. http://dx.doi.org/10.1007/978-90-481-2350-6

Dweck, C. S. (1999). *Self-theories: Their role in motivation, personality, and development*. New York: Psychology Press.

Dweck, C. S., & Master, A. (2008). Self-theories motivate self-regulated learning. In D. H. Schunk & B. J. Zimmerman (Eds.), Motivation and self-regulated learning: Theory, research, and applications (pp. 31–51). New York: Taylor & Francis.

Eisenberg, N. (1986). *Altruistic emotion, cognition and behavior.* Hillsdale, NJ: Erlbaum.

Eisenberg, N. (2000). Emotion, regulation, and moral development. *Annual Review of Psychology, 51*, 665-697. http://dx.doi.org/10.1146/annurev.psych.51.1.665

Eisenberg, N., Cumberland, A., & Spinrad, T. L. (1998). Parental socialization of emotion. *Psychological Inquiry, 9,* 241-273. http://dx.doi.org/10.1207/s15327965pli0904_1

Eisenberg, N., & Morris, A. S. (2004). Moral cognitions and prosocial responding in adolescence. In R. Lerner & L. Steinberg (Eds.) *Handbook of Adolescent Psychology, second edition* (pp. 155-188). New York: Wiley & Sons. http://dx.doi.org/10.1002/9780471726746.ch6

Erikson, E. H. (1968). *Identity: Youth and crisis.* New York: Norton.

Fattore, T., Mason, J., & Watson, W. (2007). Children's conceptualisation(s) of their well-being. *Social Indicators Research, 80*, 5–29. http://dx.doi.org/10.1007/s11205-006-9019-9

Freire, T., Zenhas, F., Tavares, D., & Iglésias, C. (2013). Felicidade hedónica e

eudaimónica: um estudo com adolescents portugueses. *Análise Psicológica, 4*,

329-342.

Fuligni, A. J. & Eccles, J. S. (1993). Perceived parent child relationships and early

adolescents' orientation toward peers. *Developmental Psychology, 29*, 622– 632.

http://dx.doi.org/10.1037/0012-1649.29.4.622

Furnham, A. & Cheng, H. (2000). Lay theories of happiness. *Journal of Happiness

Studies, 1*, 227-246. http://dx.doi.org/10.1023/A:1010027611587

Gelman, R. S. (1969). Conservation acquisition: A problem of learning to attend to

relevant attributes. *Journal of Experimental Child Psychology*, *7,* 167-187.

http://dx.doi.org/10.1016/0022-0965(69)90041-1

Giacomoni, C. H., Souza, L. K., & Hutz, C. S. (2014). O conceito de felicidad en

crianças (The concept of happiness in children). *Psico-USF, Bragrança Paulista,

19*, 143-153. http://dx.doi.org/10.1590/S1413-82712014000100014

Gillet, N., Vallerand, R. J., & Lafrenière, M. A. K. (2012). Intrinsic and extrinsic school

motivation as a function of age: the mediating role of autonomy support. *Social

Psychology of Education, 15*, 77–95. http://dx.doi.org/10.1007/s11218-011-9170-
2

Gottfried, A. E., Fleming, J. S., & Gottfried, A. W. (2001). Continuity of academic

intrinsic motivation from childhood through late adolescence: A longitudinal

study. *Journal   of   Educational   Psychology,   93,*   3–13.

http://dx.doi.org/10.1037/0022-0663.93.1.3

Gouveia, V. V., Clemente, M., & Espinosa, P. (2003). The horizontal and vertical

attributes of individualism and collectivism in a Spanish population. *Journal of

Social Psychology, 143*, 43-63. http://dx.doi.org/10.1080/00224540309598430

Greenberg, M. T., Siegel, J. M., & Leitch, C. J. (1983). The nature and importance of

attachment relationships to parents and peers during adolescence. *Journal of*

Youth and Adolescence, 12, 373-386. http://dx.doi.org/10.1007/BF02088721

Grouzet, F.M.E., Sokol, B.W., & Müller, U. (2013). Self-regulation and autonomy: An

introduction. In B.W. Sokol, F.M.E. Grouzet & U. Müller (Eds.), *Self-regulation*

*and autonomy: Social and developmental dimensions of human condu*ct (pp. 1-

16). New York: Cambridge University Press.

Gurland, S.**,** & Glowacky, V. (2011). Children's theories of motivation. *Journal of*

Experimental Child Psychology, 110, 1-19.

http://dx.doi.org/10.1016/j.jecp.2011.03.013

Harter, S. (1981). A new self-report scale of intrinsic versus extrinsic orientation in the

classroom: Motivational   and   informational   components.   *Developmental*

Psychology, 17, 300–312. http://dx.doi.org/10.1037/0012-1649.17.3.300

Hunter, F. T., & Youniss, J. (1982). Changes in the functions of three relations during

adolescence. *Developmental Psychology,* 18, 806-811.

http://dx.doi.org/10.1037/0012-1649.18.6.806

Huta, V. & Waterman, A.S. (2014). Eudaimonia and its distinction from hedonia:

developing a classification and terminology for understanding conceptual and

operational definitions. *Journal of Happiness Studies, 15*, 1425-1456.

http://dx.doi.org/10.1007/s10902-013-9485-0

Kesebir, P., & Diener, E. (2008). In pursuit of happiness: Empirical answers to

philosophical questions. *Perspectives on Psychological Science, 3,* 117–125.

http://dx.doi.org/10.1111/j.1745-6916.2008.00069.x

Kohlberg, L. (1984). *Essays on moral development: Vol. 2. The psychology of moral development: The nature and validity of moral stages.* San Francisco: Harper & Row.

Krettenauer, T. (2013). Revisiting the moral self-construct: Developmental perspectives on moral selfhood. In B. Sokol, U., F. Grouzet, & U. Müller (Eds.). Self-regulation and autonomy. Cambridge: Cambridge University Press.

Kroger, J. (2005). Identity development during adolescence. In G. Adams & M. Berzonsky (Eds.), *Blackwell handbook of adolescence* (pp. 227-246). Malden, MA: Blackwell. http://dx.doi.org/10.1207/s1532706xid0501_6

Lepper, M. R., Corpus, J. H., & Iyengar, S. S. (2005). Intrinsic and extrinsic motivational orientations in the classroom: Age differences and academic correlates. *Journal of Educational Psychology, 97,* 184–196. http://dx.doi.org/10.1037/0022-0663.97.2.184

Levy, S. R., Karafantis, D. M., & Ramirez, L. (2009). A social–developmental perspective on lay theories and intergroup relations. In S. R. Levy & M. Killen (Eds.), Intergroup attitudes and relations in childhood through adulthood (pp. 146–156). New York: Oxford University Press.

Lewis, C.C. (1981). How adolescents approach decisions: changes over grades seven to twelve and policy implications. *Child Development, 52*, 538-544. http://dx.doi.org/10.2307/1129172

López-Pérez, B., Gummerum, M., Keller, M., Filippova, E., & Gordillo, M.V. (2015). Sociomoral reasoning in children and adolescents from two collectivistic cultures. *European Journal of Developmental Psychology, 12*, 204-219. http://dx.doi.org/10.1080/17405629.2014.989985

Lu, L. (2001). Understanding happiness: A look into the Chinese folk psychology. *Journal of Happiness Studies, 2*, 407–432. http://dx.doi.org/ 10.1023/A:1013944228205

Lu, L., & Gilmour, R. (2004). Culture and conceptions of happiness: Individual oriented and social oriented SWB. *Journal of Happiness Studies, 5,* 269–291. http://dx.doi.org/10.1007/s10902-004-8789-5

Lu, L. & Shih, J.B. (1997). Sources of happiness: A qualitative approach. *Journal of Social Psychology, 137*, 181–187. http://dx.doi.org/10.1080/00224549709595429

Markus, H. R., & Kitayama, S. (1991). Culture and the self: Implications for cognition, emotion, and motivation. *Psychological Review, 98,* 224-253. http://dx.doi.org/10.1037/0033-295X.98.2.224

McMahon, D. M. (2006). *Happiness: A history*. New York, NY: Atlantic Monthly Press.

Oishi, S., Graham, J., Kesebir, S., & Galinha, I. (2013). Concepts of happiness across time and cultures. *Personality and Social Psychology Bulletin, 39*, 559-577. http://dx.doi.org/10.1177/0146167213480042

Pflug, J. (2009). Folk theories of happiness: A cross-cultural comparison of conceptions of happiness in Germany and South Africa. *Social Indicators Research, 92*, 551– 563. http://dx.doi.org/10.1007/s11205-008-9306-8

Piaget, J. P. (1952). *The origins of intelligence in children*. International Universities Press, New York. http://dx.doi.org/10.1037/11494-000

Rudolph, K. (2010). Implicit theories of peer relationships. *Social Development, 19*, 113–129. http://dx.doi.org/10.1111/j.1467-9507.2008.00534.x

Ryan, R. M. (1995). Psychological needs and the facilitation of integrative processes. *Journal of Personality*, *63*, 397–427. http://dx.doi.org/10.1111/j.1467-6494.1995.tb00501.x

Ryan, R. M., & Deci, E. L. (2001). On happiness and human potentials: A review of research on hedonic and eudaimonic well-being. *Annual Review of Psychology, 52*, 141–166. http://dx.doi.org/10.1146/annurev.psych.52.1.141

Ryan, R. M., & Deci, E. L. (2013). Toward a social psychology of assimilation: Self-determination theory in cognitive development and education. In B. W. Sokol, F. M. E. Grouzet, U. Muller (Eds.), *Self-regulation and autonomy: Social and developmental dimensions of human conduct* (pp. 191-207). http://dx.doi.org/10.1017/CBO9781139152198.014

Ryff, C. D. (1989). Happiness is everything, or is it? Explorations on the meaning of psychological wellbeing. *Journal of Personality and Social Psychology, 57*, 1069–1081. http://dx.doi.org/10.1037/0022-3514.57.6.1069

Schwartz, S. J., Donnellan, M. B., Ravert. R. D., Luyckx, K., & Zamboanga, B. L. (2013). Identity development, personality, and well-being in adolescence and emerging adulthood: Theory, research, and recent advances. In I. B. Weiner (Series Ed.), and R. M. Lerner, A. Easterbrooks, & J. Mistry (Vol. Eds.), *Handbook of psychology, vol. 6: Developmental psychology* (pp. 339-364). New York: John Wiley and Sons.

Seligman, M. (2011). *Flourish: A visionary new understanding of happiness and well-being*. New York: Free Press.

Sokal, R. R., & Michener, C. D. (1958). A statistical method for evaluating systematic relationships. *University of Kansas Scientific Bulletin, 38,* 1409–1438.

Steinberg, L., & Silverberg, S. B. (1986). The vicissitudes of autonomy in early

adolescence. *Child development*, 57, 841-851. http://dx.doi.org/10.2307/1130361

Sternberg, R. J., & Nigro, G. (1980). Developmental patterns in the solution of verbal

analogies. *Child Development*, *51*, 27-38. http://dx.doi.org/10.2307/1129586

Sullivan, H. S. (1953). *The Interpersonal Theory of Psychiatry*. New York: W. W.

Norton.

Thoilliez, B. (2011). How to grow up happy: an exploratory study on the meaning of

happiness from children's voices. *Child Indicators Research, 4*, 323–351.

http://dx.doi.org/10.1007/s12187-011-9107-5

Thompson, R. A. (1994). Emotion regulation: A theme in search of definition. In N. A.

Fox (Ed.), *The development of emotion regulation: Biological and behavioural*

considerations (Monographs of the Society for Research in Child Development)

(Vol. 59, pp. 25-52). http://dx.doi.org/10.2307/1166137

Tullis, T., & Wood, L. (2004). How many users are enough for a card sorting study? In

Proceedings University Press of America 2004, Minneapolis, June 7–11, 2004.

UNICEF (2007). *An overview of child well-being in rich countries*. Report Card 7.

Retrieved from: http://www.unicef-irc.org/publications/pdf/rc7_eng.pdf.

UNICEF (2009). *Calidad de vida y bienestar subjetivo en España* (Quality of life and

subjective well-being in Spain). Universitat de Girona. Retrieved from:

http://www.unicef.es/sites/www.unicef.es/files/Bienestar_infantil_subjetivo_en_E

spakua.pdf.

UNICEF (2011). *Children's well-being in UK, Sweden and Spain: the role of inequality*

and materialism. Ipsos Institute. Retrieved from:

https://www.unicef.org.uk/Documents/Publications/IPSOS_UNICEF_ChildWellB

eingreport.pdf

van de Wetering, E. J., van Exel, N. J. A., & Brouwer, W. B. (2010). Piecing the jigsaw

puzzle of adolescents' happiness. *Journal of Economic Psychology, 31*, 923-935.

http://dx.doi.org/10.1016/j.joep.2010.08.004

Wickens, T. D. (1989). *Multiway contingency tables analysis for the social sciences.*

Hillsdale, NJ: Erlbaum.

Wierzbicka, A. (2004). 'Happiness' in cross-linguistic and cross-cultural perspective.

Daedalus, *133*, 34-43.   http://dx.doi.org/10.1162/001152604323049370

Youniss, J. (1980). *Parents and peers in social development: A Sullivan-Piaget

perspective*. Chicago: University of Chicago Press.

Youniss, J., & Smollar, J. (1985). *Adolescent relations with mothers, fathers, and

friends.* Chicago: University of Chicago Press.

Zimmer-Gembeck, M. J., & Collins, W. A. (2003). Autonomy development during

adolescence. In G. R. Adams & M. Berzonsky (Eds.), Blackwell handbook of

adolescence (pp. 175–204). Oxford: Blackwell Publishers.

Table 1

Different Categories Identified in Previous Qualitative Research on Lay Theories of Happiness

Study	Lu (2001)	Lu & Gilmour (2004)	Pflug (2009)	Delle Fave et al. (2011)	Giacomoni et al. (2014)	Freire et al. (2013)
Shared categories	1. Mental state of satisfaction and contentment 2. Positive emotions 3. Harmonious homeostasis 4. Achievement and hope 5. Freedom from being ill	1. Mental state of satisfaction and contentment 2. Positive emotions 3. Self-autonomy 4. Achievement and control 5. Freedom from being ill 6. Relating to people 7. Ultimate value in life	1. Satisfaction 2. Contentment 3. Positive affect 4. Social relationships 5. Freedom	1. Harmony 2. Emotions 3. Well-being 4. Achievement 5. Satisfaction 6. Freedom 7. Relationships 8. Leisure 9. Family	1. Positive feelings 2. Leisure 3. Family 4. Friends	1. Feelings 2. Satisfaction 3. Harmony 4. Well-being 5. Autonomy 6. Competence 7. Purpose 8. Self-actualization 9. Relationships 10. Family 11. Leisure
Non-shared categories			6. The opposite of happiness 7. Surprising events	10. Optimism 11. Fulfilment 12. Engagement 13. Awareness 14. Meaning 15. Health 16. Daily life 17. Standard of living 18. Work 19. Spirituality 20. Society	5. Basic needs 6. School 7. Non violence 8. Moral actions	12. Awareness 13. Meaning 14. Lack of negative feelings 15. Personal growth 16. Optimism 17. Daily life 18. Health 19. Standard of life 20. School 21. Spirituality 22. Society
Countries	China	China	Germany	Australia	Brazil	Portugal

	Taiwan	USA	South Africa	Croatia Germany Italy Portugal Spain South Africa		
Type of Sample	Undergraduate students	Undergraduate students	Undergraduate students	Adults	Children 5 - 12 years	Adolescents

Table 2

Sample Composition

	School 1			School 2		
	Boys	Girls	Total	Boys	Girls	Total
9-11-year-olds	15	14	29	13	14	27
12-13 year-olds	14	12	26	13	17	30
14-16 year-olds	16	12	28	17	9	26

Table 3

Frequencies of the Number of Mentions of each Happiness Conception per Age Group

	9-11-year-olds			12-13 year-olds			14-16 year-olds			Male	Female
	Male	Female	Total	Male	Female	Total	Male	Female	Total		
Coding System 1											
Positive feelings	19 (54%)	16 (46%)	35 (63%)	7 (58%)	5 (42%)	12 (21%)	3 (60%)	2 (40%)	5 (9%)	29 (55%)	23 (45%)
Harmony/Balance	2 (40%)	3 (60%)	5 (9%)	7 (43%)	9 (57%)	16 (29%)	10 (55%)	8 (45%)	18 (34%)	19 (49%)	20 (51%)
Health	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Leisure	1 (100%)	0 (0%)	1 (100%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	1 (100%)	0 (0%)
Autonomy	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)

Achievement	3 (60%)	2 (40%)	5 (9%)	5 (62%)	3 (38%)	8 (19%)	10 (53%)	9 (47%)	19 (35%)	18 (56%)	14 (44%)
Related to people	6 (46%)	7 (54%)	13 (23%)	8 (40%)	12 (60%)	20 (36%)	9 (56%)	7 (44%)	16 (30%)	23 (47%)	26 (53%)
Opposite of happiness	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Ultimate value	0 (0%)	0 (0%)	0 (0%)	1 (50%)	1 (50%)	2 (20%)	3 (37%)	5 (63%)	8 (80%)	4 (40%)	6 (60%)

Coding System 2

Positive feelings	19 (54%)	16 (46%)	35 (63%)	7 (58%)	5 (42%)	12 (21%)	3 (60%)	2 (40%)	5 (9%)	29 (55%)	23 (45%)
Leisure	1 (100%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	1 (100%)	0 (0%)
Health	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Non-violence	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Family	4 (50%)	4 (50%)	8 (28%)	5 (42%)	7 (58%)	12 (44%)	5 (62%)	3 (38%)	8 (28%)	14 (50%)	14 (50%)
Friends	2 (40%)	3 (60%)	5 (24%)	3 (38%)	5 (62%)	8 (38%)	4 (50%)	4 (50%)	8 (38%)	9 (43%)	12 (57%)
Basic needs	0 (0%)	0 (0%)	0 (0%)	2 (100%)	0 (0%)	2 (100%)	0 (0%)	0 (0%)	0 (0%)	2 (100%)	0 (0%)
School	3 (60%)	2 (40%)	5 (16%)	5 (62%)	3 (38%)	8 (25%)	10 (52%)	9 (48%)	19 (59%)	18 (52%)	14 (48%)

Harmony/Balance	2 (40%)	3 (60%)	5 (9%)	7 (44%)	9 (56%)	16 (29%)	10 (55%)	8 (45%)	18 (34%)	20 (51%)	19 (49%)
Moral actions	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Society	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Autonomy	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)	0 (0%)
Purpose	0 (0%)	0 (0%)	0 (0%)	1 (50%)	1 (50%)	2 (20%)	3 (38%)	5 (62%)	8 (80%)	4 (40%)	6 (60%)

Table 4

Results of Log-Linear Analyses for each Happiness Content Category

Effects and interactions	*Df*	Partial χ^2	*p*	*z* value (9-11-year-olds (r) 12-13-year-olds)	*z* value (9-11-year-olds (r) 14-16-year-olds)	*z* value (12-13-year-olds (r) 14-16-year-olds)
Coding system 1						
Positive feelings × Age	2	39.92	.001	-3.96	-5.11	-1.90
Harmony/Balance × Age	2	9.09	.010	2.71	2.94	.24
Achievement × Age	2	12.65	.002	1.04	3.14	2.25
Related to people × Age	2	2.77	.250	1.73	.76	-.98
Coding system 2						
Positive feelings × Age	2	39.92	.001	-3.96	-5.11	-1.90
Harmony/Balance × Age	2	9.09	.010	2.71	2.94	.24
Family × Age	2	2.69	.256	1.23	-.46	-1.62
Friends × Age	2	2.45	.289	.98	1.35	.35
School × Age	2	12.65	.002	1.04	3.14	2.25

Note: Note that the number of *z* values corresponds to the degrees of freedom of the tested effects; *z* values with absolute values greater than 1.96 are significant ($p < .05$); (*r*) indicates the reference category of each factor for the *z* value.

Table 5

Frequencies of the Content Categories Identified based on Content Analysis

	9-11 year-olds	12-13 year-olds	14-16 year-olds	Male	Female
Life domains					
Friends	5 (24%)	8 (38%)	8 (38%)	9 (43%)	12 (57%)
Family	5 (24%)	8 (38%)	8 (38%)	9 (43%)	12 (57%)
Standard of life	3 (8%)	17 (47%)	16 (45%)	16 (45%)	20 (55%)
School	5 (16%)	8 (25%)	19 (59%)	18 (52%)	14 (48%)
Leisure	1 (0%)	0 (0%)	0 (0%)	1 (100%)	0 (0%)
Psychological domains					
Positive feelings	35 (63%)	12 (21%)	5 (9%)	29 (55%)	23 (45%)
Harmony	12 (0%)	20 (0%)	16 (0%)	26 (10%)	22 (0%)
Lack of negative feelings	2 (9%)	3 (19%)	5 (15%)	6 (43%)	4 (57%)
Purpose	0 (0%)	2 (4%)	8 (15%)	4 (40%)	6 (60%)

1. Positive feelings
- Positive feelings
- Surprising events
- Optimism
- Satisfaction
- Mental state of contentment (classified in cluster 2 by lay judges)

2. Harmony/Balance
- Harmony
- Well-being

3. Health
- Health (classified in cluster 2 by lay judges)
- Freedom from being ill (classified in cluster 4 by lay judges)

4. Self-autonomy
- Self-autonomy
- Freedom

5. Leisure

6. Achievement
- Achievement
- Standard of living
- Work

7. People
- Related to people
- Social relationships
- Family
- Society

8. Ultimate value
- Ultimate value
- Fulfillment
- Engagement
- Awareness
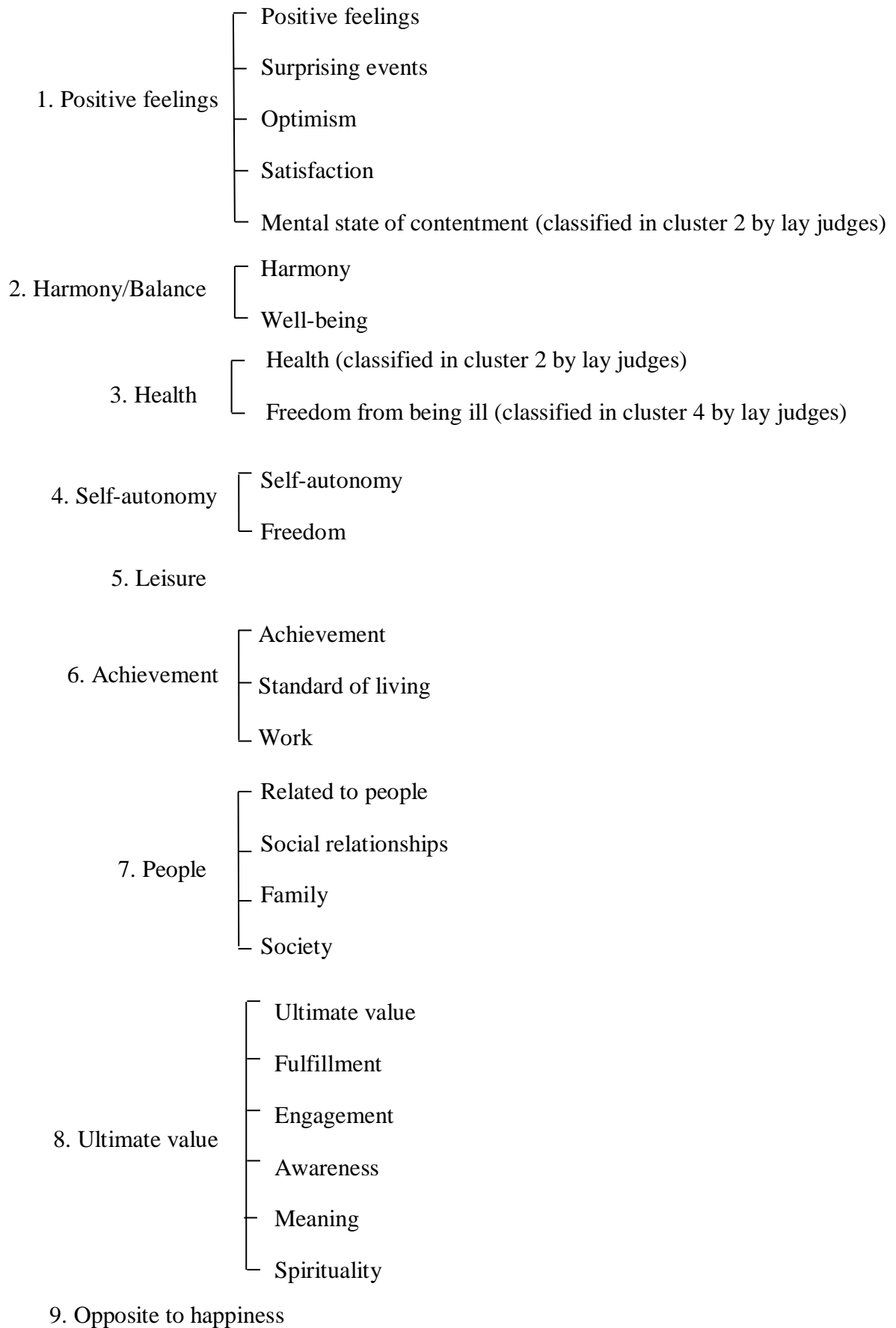- Meaning
- Spirituality

9. Opposite to happiness

Figure 1. Content Categories Identified from the Hierarchical Cluster Analysis Based on the Literature with Adults

1. Positive Feelings ⌐ Satisfaction (classified in cluster 2 by lay judges)
                    └ Positive feelings

2. Harmony/Balance ⌐ Harmony
                   └ Well-being

3. Health (classified in cluster 2 by lay judges)

4. Non-violence (classified in cluster 2 by lay judges)

5. Family

6. Friends

7. Autonomy

8. School ⌐ School
          └ Competence

9. Leisure

10. Moral

11. Purpose ⌐ Purpose
            ├ Self-actualization
            ├ Personal-growth
            └ Spirituality

12. Basic needs ⌐ Standard of life
                ├ Daily life
                └ Basic needs

13. Society

Figure 2. Content Categories Identified from the Hierarchical Cluster Analysis Based on the Literature with Children and Adolescents

Appendix A

Coding Systems

Coding system 1 developed from the literature with adults (Delle Fave et al., 2011; Lu, 2001; Lu & Gilmour, 2004; Plfug, 2009)	Coding system 2 developed from the literature with children and adolescents (Freire et al., 2013; Giacomoni et al., 2014)
-Positive feelings: happiness as the experience of joy or contentment	*-Positive feelings*: see coding system 1
-Harmony/Balance: happiness as being tuned with the world, inner peace	*-Harmony/Balance:* see coding system 1
-Health: happiness as not suffering from an illness	*-Health*: see coding system 1
-Leisure: happiness as taking part in fun activities such as sports, dancing, traveling, etc.	*-Leisure*: see coding system 1
-Self-autonomy: happiness as the freedom to be oneself	*-Family:* happiness as familial meetings or having a positive family life
-Achievement: happiness as the attainment of goals and rewards	*-Friends*: happiness as making, being with or visiting friends.
-Related to people: happiness as being around family and friends	*-Basic needs*: happiness as having basic needs covered (e.g., food, housing, etc.)
-Opposite of happiness: happiness as the lack of positive emotions or well-being or balance.	*-School*: happiness as succeeding in school
	- Non-violence: happiness as the lack of quarrels and living in peace
	- Moral actions: social desirable actions such as helping, respecting others, etc.
	-Purpose: happiness as the higher purpose or the supreme goal in life.

-*Ultimate value*: happiness as the higher purpose or the supreme goal

in life.

Appendix B

Examples Coded within each Category and Coding System

Coding system 1 developed from the literature with adults (Delle Fave et al., 2011; Lu, 2001; Lu & Gilmour, 2004; Plfug, 2009)	Coding system 2 developed from the literature with children and adolescents (Freire et al., 2013; Giacomoni et al., 2014)	Coding system 3 developed for Study 2 using content analysis
-Positive feelings: "Happiness is feeling joy" (male, 10 years-old) "Happiness is a positive feeling" (female, 11 years-old)	*-Positive feelings*: (see first column) *-Harmony/Balance*: (see first column) *-Leisure*: (see first column) *-Family:*	*-Positive feelings*: (see first column) *-Leisure*: (see first column) *-Family:* (see first column) *-Friends*: (see first column)
-Harmony/Balance: "Happiness is satisfaction because everything is balanced" (female, 14 years-old) "Happiness is when everything is in harmony, when everything goes alright" (male, 15 years-old)	"Happiness is when I meet with my cousins who live far from me" (female, 10 years-old) "Happiness is when I meet with my family, when we celebrate something all together" (male, 11 years-old) *-Friends*: "Happiness is meeting with my friends"	*-School*: (see first column) *-Purpose*: (see ultimate value) *-Standard of life*: "Happiness is when everybody is feeling good because they go to school or work" (male, 14 years-old)

Leisure:

"Happiness is when you go to the fun fair or to the chocolate museum" (male, 9 years-old)

-*Achievement*:

"Happiness is the feeling you have when you achieved something and you are congratulated for that" (female, 11 years-old)
"Happiness is when you get good grades"

(male, 14 years-old)

-*Related to people*:

"Happiness is having friends to share secrets with, and spend time with them" (male, 13 years-old)
"Happiness is being with the people I love" (female, 14 years-old)
-*Ultimate value*:

"Happiness is a way of life, it's about valuing the small things that happen in

(male, 10 years-old)

"Happiness is being with my friends" (female, 12 years-old"

-*Basic needs*:

"Happiness is when everybody has food to eat and money" (female, 12 years-old"
"Happiness is having money to live" (male, 12 years-old)

-*School*:

"Happiness is getting good grades in an exam" (male, 14 years-old)
"Happiness is when the teacher congratulates me for doing something well (female, 13 years-old)

-*Lack of negative feelings*:

"Happiness is when you are not feeling bad" (male, 13 years-old)

-*Harmony*:

"Happiness is when everything in your life is balanced and in harmony" (female, 15 years-old)

life" (female, 15 years-old"
"Happiness is something you strive for
every day, doing small actions to make
this world better" (male, 15 years-old)

Appendix C

Results of Coding System 3 (own coding system based on participants' responses) and

Discussion

Apart from the analyses conducted with coding systems 1 and 2, participants'

responses were categorized according to the subcategories and macrocategories of

content previously identified in research (Delle Fave et al., 2011; Freire et al., 2013):

life domain (45.70% of responses) and psychological domain (54.3% of responses). The

following content categories emerged for life domain: 'friends', 'family', 'standard of

life', 'school' and 'leisure' (see Table 5). Given that 'friends', 'family', 'school' and

'leisure' were identified in coding systems 1 and 2, we did not run further analyses on

these. The hi-log-linear analyses for happiness as 'standard of life' did not produce a

significant model for any interaction, only the main effect of the category was

significant, $\chi^2 = 4.98$, $df = 6$, $p = .55$. The log-linear analysis showed that none of the

age and gender groups differed significantly from each other (see Table 5). There was

no interaction of gender with content category ($\chi^2 = 1.30$, $df = 1$, $p = .26$) or age ($\chi^2 =$

1.85, $df = 1$, $p = .17$).

For the psychological domain, the following categories were identified: 'positive

feelings', 'harmony', 'lack of negative feelings' and 'purpose' (see Table 5). Given that

'positive feelings', 'harmony', and 'purpose' were identified in coding systems 1 and 2,

we did not run further analyses on these. For 'lack of negative feelings', the cell

frequencies were below five so we could not analyze this category. This category was

mentioned by relatively few participants (6.2%).

Overall, using the macrocategories we obtained similar categories to those

identified in coding systems 1 and 2. Only two additional analyzable categories

emerged from this alternate coding system: 'standard of life', and 'lack of negative

feelings'. However, no age or gender differences were found. 'Lack of negative feelings' was hardly mentioned by participants in our study. Finally, 'standard of life' was mentioned frequently by the two eldest age groups unlike Freire et al.'s (2013).