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FLOWER MEANINGS: ARE THEY RELEVANT TODAY?

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FLOWER MEANINGS: ARE THEY RELEVANT TODAY?

A Thesis
Presented to
the Faculty of the Hutson School of Agriculture
Murray State University
Murray, Kentucky

In Partial Fulfillment
of the Requirements for the Degree
of Master of Science in Agriculture

by Dakota Ray Moore
November 2018

FLOWER MEANINGS: ARE THEY RELEVANT TODAY?

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ABSTRACT

This qualitative study sought to describe contemporary views of ten selected flower specimens regarding the feelings they evoke in thirty participants divided evenly across three generations: Baby Boomers, Generation X, and Millennial. Little research exists in the scholarly body of knowledge regarding definitions of flowers; however, industry publications have captured some traditionally held definitions of some flowers. This phenomenological study utilized participants in the three generations of interest by showing each participant photos of ten selected cut flower specimens and asking them five questions about the emotions evoked by each flower, how they would feel if they received each flower, perceived symbolism and representation of each flower, and their own assigned meaning for each flower. After reduction and structural syntheses were conducted, definitions for nine flowers were derived. One flower had inconsistent definitions; however, literature shows some inconsistency throughout history as well. Recommendations for future studies include larger sample sizes to better understand the generations, larger areas or locations of sampling to show a wider sample, and a compatible questionnaire to determine usage of flower meanings when purchasing and gifting flowers. There is also a need for more related research regarding flower meanings, the purchasing tendencies of generations, reasons for purchasing specific flowers, and money spent on specific flowers.

CHAPTER I

Introduction

Flowers have been widely utilized throughout time in landscapes, homes, and arrangements. For centuries, people have assigned meanings and symbolism to flowers (Greenaway, 1978). These meanings and symbolism have been used as a form of communication through flowers in bouquets, planters, and paintings (1978). This practice of communicating through flowers is not specific to any country or time period and is diverse across borders and time.

For instance, consider the iris, which, to the ancient Japanese, symbolized bravery (Kandeler & Ullrich, 2009a). To the ancient Egyptians, the iris was symbolic of “victory, rule, and power” (2009a, p. 1067). To the ancient Greeks, the iris meant “rainbow” (2009a, p. 1067) and gave its name to the messenger goddess Iris. To many ancient civilizations, irises were the favored flower for graves. However, to the French, it represented faith, hope, wisdom, and heroism, and was an inspiration for the fleur-de-lis, a royal symbol (Kandeler & Ullrich, 2009a). This variance between cultures is similar for most other flowers. In some cultures, flowers held religious meanings. Columbine, for example, resembles the wings of doves and represents the Holy Spirit to Christians (Greenaway, 1978). Other flowers represented virtues and characteristics based on the beauty and rarity of the flowers themselves. The rose is an example of this. In many cultures, the rose represents love, beauty, and nobility because of its superiority over other flowers (Kandeler & Ullrich, 2009b). In Europe in the 1800s, it became popular to express thoughts and feelings through intricate bouquets (Greenaway, 1978).

In a time when respectable individuals were taught to not act on passions and remain reserved, people began to express their desires and true feelings through flowers (Greenaway, 1978). However, with all of these various meanings and symbolism from different cultures and times, many people had trouble deciphering the meanings of the flowers in their bouquets. In the nineteenth century, several flower language dictionaries became popular tools in bringing a new language to the lives of the general public (Greenaway, 1978).

In Europe in the early 1800s, several companies published flower language dictionaries that allowed more people to understand the meanings of flowers and bouquets (Greenaway, 1978). This trend spread to the Americas and became very popular. This boost in popularity of the use of flowers as a form of communication and the increased publication of flower dictionaries began to cause problems. With more than 150 different dictionaries on the market, and each trying to appeal more to the public than the others, consistency became an issue. Each dictionary had different meanings for the same flowers and no dictionary gave any justification or reason for the meanings, and only symbolic meanings remained consistent. Many books offered several meanings for the same flower, and some meanings contradicted others in the same book (Greenaway, 1978). However, some flowers, like those discussed and used in this study, have common and widely agreed upon meanings.

There is also evidence to support that flower meanings have changed over time. Traditionally, yellow roses were signs of a “decrease of love” (Greenaway, 1978, p. 50) or “jealousy” (Iowa State University, 2005, p. 1). Popular culture would seem to suggest that yellow roses have a different meaning. In the second episode of the first season of

Riverdale, a popular American teen television drama, Veronica sends Betty a bouquet of yellow roses to apologize and restart their new friendship by stating “The yellow’s for friendship” (Aguirre-Sacasa & Krieger, 2017). The potential for change in meaning over time shows more confusion in meanings.

Statement of the Problem

Therefore, with such variance in definitions and potential misinterpretation, along with changing generational experience, the problem remains: are flower meanings interpreted in a consistent manner today, and are those interpretations the same across the three predominant generations alive today?

Purpose of the Study

This study is a continuation of a previous study by the researcher (Moore, 2016). This study sought to determine if contemporary flower definitions are similar to flower definitions at the height of popularity of flower dictionaries. This study also strives to elicit new definitions of ten flowers from three generations of study. The study was designed to determine whether or not the three generations of study place different or similar meanings on the ten flowers.

Research Question

To address the purpose of this study, and to describe the phenomenon of interest, the researcher raised the following question:

1. What are contemporary definitions of the ten flowers used in this study across the three generations of study?
2. Do the definitions the three generations of study assign to these ten flowers match the traditional definitions in flower dictionaries?

Definitions of Terms

For the purpose of this study, the following terms and definitions were used.

Phenomenology –the study of lived experiences and the ways we understand to those experiences to develop a worldview (Marshall & Rossman, 2006, p. 104).

Qualitative Coding – segregating data into like categories to discern themes, patterns, and processes and to make comparisons and build theoretical explanations (Glesne, 2011, p. 283).

Structural Synthesis – involves the imaginative exploration of all possible meanings and divergent perspectives and culminates in a description of the essence of the phenomenon and its deep structure (Marshall & Rossman, 2006, p. 105).

Limitations of the Study

The limitations of the study include the lack of generalizability of qualitative research (Marshall & Rossman, 2006). Since qualitative research can only account for the meanings and definitions of the participants of the study, a larger number of participants would be needed to get a clearer picture of the actual definitions and meanings (Marshall & Rossman, 2006). The shorter answers of the participants and any confusion with the flowers may also limit the accuracy of the interpretation of the participant's perceived meaning and definition (Marshall & Rossman, 2006).

Basic Assumptions of the Study

It is assumed that the participants answered honestly during the interviews and had no reason to answer untruthfully. It is also assumed that the participants are familiar with flowers and flower arrangements.

Significance of the Study

This study has the potential to provide insight into the purchasing reasons and habits of people who purchase flower arrangements. The definitions and meanings people associate with these flowers could be utilized in the marketing of flowers and flower arrangements including but not limited to specialized message arrangements and special occasion arrangements.

Chapter Summary

Chapter I introduced flowers and their use in arrangements as a form of communication. Flower dictionaries and their shortcomings were also discussed. The purpose of the study and objectives of the study were presented as well. In Chapter II, relevant literature regarding flower dictionaries, the ten flowers used in this study, and characteristics of the three generations of study will be reviewed. Chapter III will establish the methodology used in this study. The qualitative methods to define contemporary flower meanings and the data analysis process will be discussed. In Chapter IV, the data collected from interviews with members of the three generations of study will be presented.

CHAPTER II

Review of Relevant Literature

Chapter I sought to introduce flower meanings as the topic of study and explored the issues regarding the lack of universally agreed upon flower meaning definitions. The purpose and objectives were also discussed.

In Chapter II, a review of the literature will be provided regarding flower dictionaries, the ten flowers that will be used in this study, and the characteristics of the three generations of study.

Modern Flower Dictionaries and Reasons for Purchasing

Flower dictionaries were once useful in deciphering the meanings behind flower arrangements (Greenaway, 1978). These dictionaries described hundreds of flowers through meanings, symbolization, and representation. Hundreds of flower meanings were impossible to remember, and each dictionary often listed different and opposing meanings for most flowers (Greenaway, 1978). However, the ten flowers used in this study have similar meanings. This study focused on the ten following flowers: solid carnation, striped carnation, red rose, yellow rose, white chrysanthemum, calla lily, daisy, iris, daffodil, and red tulip. Each of these flowers has been given several meanings throughout time and various cultures, but the following meanings are from recent publications and studies.

Carnations

Carnations, solid colored or striped, are traditional cut flowers and are popularly purchased today to express thanks, convey best wishes during an illness, congratulate someone on an achievement, and decorate the graves of loved ones (Chengyan & Hall,

2010). Solid carnations have typically been used to mean “yes” (Iowa State University, 2005, p. 2) or to express acceptance of an offer or proposal. Striped carnations are used to express the opposite. Striped carnations mean “no” (Greenaway, 1978, p. 24) or the refusal of a proposition.

In the previous study by the researcher on flower meanings of which this study is a continuation, it was determined that the definition of solid carnations for the participants in the study was happiness and friendship (Moore, 2016). The participants associated happiness and friendship with striped carnations as well (Moore, 2016).

Roses

Roses are another traditional cut flower (Chengyan & Hall, 2010). Today, people purchase and give red roses for anniversaries, birthdays, weddings, and new births; people often express their romantic love through red roses as well (Chengyan & Hall, 2010). Across multiple eras and cultures, red roses represent love (Greenaway, 1978). Yellow roses are used on similar occasions and to express similar feelings as red roses including birthdays (Chengyan & Hall, 2010). Yellow roses are also popular as signs of friendship (Aguirre-Sacasa & Krieger, 2017). However, many sources agree that traditionally yellow roses communicate a “decrease of love” (Greenaway, 1978, p. 50) and “jealousy” (Iowa State University, 2005, p. 1).

In the previous study on flower meanings by the researcher, the red roses represented love and memories while yellow roses represented friendship and love (Moore, 2016).

Chrysanthemums, Calla Lilies, and Daisies

Chrysanthemums are the last of the traditional cut flowers used in this study (Chengyan & Hall, 2010). Many sources agree that white chrysanthemums are symbolic of truth (Greenaway, 1978; Iowa State University, 2005). Like white chrysanthemums, calla lilies and daisies appear to have universal meanings. Calla lilies represent beauty, and daisies represent innocence and purity (Iowa State University, 2005).

To the participants in the previous study by the researcher, white chrysanthemums represented funerals, sadness, and condolences, but also homecoming and celebration (Moore, 2016). Daisies were found to evoke feelings of happiness, cheer, and memories of childhood (Moore, 2016). Calla lilies represented weddings, love, prettiness, and beauty to the participants (Moore, 2016).

Irises, Daffodils, and Tulips

Irises mean hope and faith (Iowa State University, 2005). France formerly used the iris as one of its royal symbols because it stood for faith, hope, wisdom, and heroism (Kandeler & Ullrich, 2009a). Daffodils represent regard, meaning they are sent to let someone know that the sender is thinking of them (Greenaway, 1978). Finally, red tulips are meant to be a “declaration of love” (Greenaway, 1978, p. 54) when given as a gift. When some of these popular uses of flowers are compared to traditional meanings, the results seem to suggest that meanings are either unknown or not important to purchasers.

In the previous study by the researcher, there were several inconsistencies among the definitions given by the participants for irises (Moore, 2016). The participants listed happiness, short-lived, spring, prettiness, friendship, mothers, and maternal as some of the meanings of irises. Red tulips and daffodils both represented spring, happiness, and

Easter to the participants. The participants also included beauty, celebration, and new beginnings to represent red tulips. Daffodils also evoked feelings of childhood, renewal, and new starts in the participants (Moore, 2016).

Reasons for Purchasing Across Generations

A study by Chengyan and Hall (2010) examined consumer purchasing preferences and found that many people purchase particular flowers as gifts for similar occasions and to convey similar messages. They found that roses were the first choice for anniversaries, birthdays, and weddings. Consumers used roses to congratulate, express apology, and show friendship. Daffodils, tulips, and irises were used most often for birthdays, second to roses. For housewarming gifts, lilies, including Calla lilies, were the number one choice. For funerals and to express gratitude, customers preferred to give carnations. The study also found that people tend to buy irises for birthdays. The study also found that age was another contributing factor in the purchasing tendencies of cut flowers (2010).

Baby Boomer Generation

The Baby Boomer generation consists of people born between 1946 and 1964, and members of the generation are typically *competitive*, *driven*, and desire *face-to-face* communication (Top 10, 2012). Boomers, a shortened name for Baby Boomers, are hard workers and are sometimes likely to work overtime or put work before family (Wiedmer, 2015). Members of the Baby Boomer generation are often motivated by “money, power, and recognition” (Wiedmer, 2015, p. 53). A study on the cut flower purchasing tendencies of people in the United States found that Baby Boomers are more likely to

purchase carnations, chrysanthemums, and daisies than other generations (Chengyan & Hall, 2010).

Generation X

Members of Generation X, or Gen X, were born between 1965 and 1984 (Top 10, 2012). Gen X-ers characteristically strive to maintain a healthy balance between family and work, and they take more caution when starting a family (Wiedmer, 2015). They are *self-reliant, independent, and prefer to communicate through email* (Top 10, 2012). The same study found that people in Generation X were likely to purchase tulips, daffodils, irises, and roses (Chengyan & Hall, 2010).

Millennial Generation

The generation born to and raised by people in Gen X is in the millennial generation. The Millennial generation includes people born between 1985 and 2005 (Top 10, 2012). Millennials are practical, “optimistic about the future” (Top 10, 2012, p. 143), and expect feedback from management. They favor instant messaging and text messaging as forms of communication and multitask with the help of technology (Top 10, 2012). Millennials are more community oriented and socially connected, but less independent than the other generations (Wiedmer, 2015). Millennials were found to have the same purchasing tendencies as Gen X and purchase tulips, daffodils, irises, and roses (Chengyan & Hall, 2010).

Generational Differences

In the previous study by the researcher on flower meanings of which this study is a continuation, the three generations of study agreed on definitions for most of the flowers (Moore, 2016). For a few flowers, one or two generations included an extra

meaning. For example, all three generations associated friendship with the yellow rose, but the participants in the Baby Boomer generation and Generation X associated love with the yellow rose as well. Rarely did the generations provide contradictory definitions. The biggest example for the difference between the generations found in the previous study is the white chrysanthemum. The white chrysanthemum represented Homecoming and celebration to participants in the millennial generation, Homecoming and condolences to participants in Generation X, and funerals and sadness to participants in the Baby Boomer generation. With interpretation, this could be explained by the fact that Millennials are younger and have most recently left high school and Homecoming and Baby Boomers are older and likely attend many more funerals. Gen X-ers are in the intermediate and would identify with the experiences of the other generations (Moore, 2016).

Chapter Summary

Chapter II reviewed relevant literature on meanings the meanings and symbolism of the ten flowers used in this study and characteristics of the three generations of study. The available literature revealed the confusing nature of flower meanings and that meanings have changed over time. As a result of this incongruence, there is a need to establish new, contemporary definitions. The lack of modern studies on flower meanings creates a need for more research on the topic. The three generations of study are the generations who are buying flowers in the market today and, therefore, have the greatest potential to use flower meanings in their day-to-day lives. Since older generations may have some knowledge of flower meanings, it is important to determine if the meanings

are passed down through generations or if generations assimilate their own meanings and symbolism for flowers.

Chapter III establishes the methodology used in this study. The qualitative methods to define contemporary flower meanings are also discussed. The data analysis process will also be defined.

CHAPTER III

Methodology

Chapter I introduced flowers and their use in arrangements as a form of communication. Flower dictionaries and their shortcomings were also discussed. The purpose of the study and objectives of the study were presented as well.

Chapter II reviewed relevant literature on the meanings and symbolism of the ten flowers used in this study and characteristics of the three generations of study. The lack of research on flower meanings was also noted.

In Chapter III, the methodology that was used in the study will be established. The interview process that was decided upon in order to define contemporary flower meanings will be discussed. The data analysis process will also be defined.

Rationale and Research Questions

The data collection for this study utilizes the same data collection methods used in a previous study by the researcher (Moore, 2016). Some of the interview questions were changed, and new participants were recruited (Moore, 2016).

This study utilized phenomenological interviewing in order to identify shared concepts and experiences in regard to flower meanings (Marshall & Rossman, 2006). Phenomenology, the “study of lived experiences and the ways we understand to those experiences to develop a worldview” (Marshall & Rossman, 2006, p. 104), is key in determining what emotions and definitions are evoked by cut flowers. To get to the phenomenon of interest, assigning common meanings to flowers across multiple generations, a semi-structured interview process was utilized. The interview process was chosen to allow more open-ended and descriptive responses. Ten flowers commonly sold

in florists were selected and color photographs were printed (Appendix A-J). Five questions were developed so participants could convey any emotions, symbols, or meanings associated with the flowers. The five questions asked of participants included:

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Data Source

This study utilized three generations as the population of interest for a comparison of the importance and knowledge of flower meanings. The three most populous generations at the time of this study were the Baby Boomer generation, people born between 1946 and 1964; Generation X, born between 1965 and 1984; and the Millennial generation, people born between 1985 and 2005 (Top 10, 2012). The researcher approached and asked potential participants about engaging in an interview for this study. If they agreed, the researcher asked their age for placement in the correct generation, and then the interview process began and lasted approximately ten to fifteen minutes.

Context of Study

For all generations of study, recruitment and interviews were performed in Murray, Kentucky. The researcher asked the ages of the participants. If they were between the ages of 54 and 72, they were placed in the Baby Boomer generation. If they

were between the ages of 34 and 53, they were placed in the Gen X grouping. If they were between the ages of 18 and 33, they were placed in the Millennial generation.

Data Collection Methods

Before the interviews could begin, approval from the Murray State University Institutional Review Board, was obtained. With the Institutional Review Board Application, a copy of interview question sheet, informed consent documents, and recruitment materials were sent to the Murray State University IRB for approval. Once approval was given, the interview process began.

Pictures of ten flowers with generally agreed upon meanings were shown to the participants as they were asked the five questions for each flower. The ten flower types used were solid carnation, striped carnation, yellow rose, red rose, white chrysanthemum, daisy, iris, calla lily, red tulip, and daffodil. The participants' responses to each question for each flower were recorded for later analyses.

Data Analysis

Initial analysis utilized a phenomenological approach to reveal repeating themes within and across generations regarding contemporary definitions of the ten selected flowers. After the participants' responses were entered into a Word document, first-level coding by the researcher was conducted to seek key words and phrases across each flower as a means of a phenomenological reduction of repeating themes (Marshall & Rossman, 2006). In order to limit bias and ensure the confirmability and trustworthiness of the results, a "cross-checking" (2006, p. 203) process involving a research advisor was used. The advisor conducted first-level coding separate from the researcher, and their first-level coding was compared to ensure the correct key words and phrases were found.

The final level of analyses regarding the flower specimens was the structural synthesis across the generations to seek contemporary definitions for each flower (2006). This synthesis culminated “in a description of the essence of the phenomenon and its deep structure” (Marshall & Rossman, 2006, p. 105).

Researcher Subjectivity

Growing up with parents that spent the majority of their weekends outside taking care of our landscaping and gardening and spending my childhood summers at my grandparents’ homes helping in their gardens, I have long had a love for the plants. However, not until my senior year in high school, did I begin to consider horticulture as more than a hobby. I learned I could turn my passion into a career. In December 2016, I received my Bachelors of Science degree in Agricultural Science with an emphasis in horticulture. While my main study and work involves greenhouse production, I have developed an interest in the cut flower industry and floral design. Little is taught about the floral industry other than the design process, and this does not even include learning about what the flowers mean and why they are used in designs. Since little research is available regarding flower meanings, reasons for purchasing, and flower preferences, I believe there is a need for more research into the floral industry within the United States. It is important to understand more facets of this industry other than the design process.

Chapter Summary

Chapter III established the methodology that was used in the study. The interview process that was used in order to define contemporary flower meanings across generations was discussed. The phenomenological reduction process for data analysis was also defined.

In Chapter IV, the data collected from interviews with ten members of the three generations of study will be presented.

CHAPTER IV

Findings

Chapter I introduced flowers and their use in arrangements as a form of communication. Flower dictionaries and their shortcomings were also discussed. The purpose of the study and objectives of the study were presented as well.

Chapter II reviewed relevant literature regarding the meanings and symbolism of the ten flowers used in this study and characteristics of the three generations of study. The lack of research on flower meanings was also noted.

In Chapter III the methodology used in the study was established. Chapter III also discussed the interview process used in order to define contemporary flower meanings across generations. The phenomenological reduction process for data analysis was also defined.

In Chapter IV, the data collected from interviews with ten members of the three generations of study will be presented. The interview transcripts and first-level coding will be examined. The results of the final step in the process, the structural synthesis, are presented.

Interview Transcripts and First-level Coding

After the researcher conducted interviews with ten members in each of the three generations of study (N=30), the interview transcripts were entered into a Word document. The researcher then used these transcripts for the first-level coding process. Both the interview transcripts and first-level coding were combined into Tables (see Table 4.1, 4.2, & 4.3 & Appendix O-RR). Below is an example of each generation's transcripts and first level coding for Flower 3, the yellow rose (Table 4.1, 4.2, & 4.3).

The full listings of the transcripts and first-level coding of all flowers across all generations are available (Appendix O-RR).

For the yellow rose, members of the Baby Boomer Generation said the flower made them feel *happy*, would *cheer a friend up*, and show *sympathy* (Table 4.1).

Table 4.1 - Baby Boomer Generation Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. A little sad	Sadness
	2. Sympathy	Sympathy
	3. Family or friend	Family, friendship
	4. Sadness	Sadness
	5. Show of sympathy	Sympathy
Participant 2	1. Different	Difference
	2. Happy	Happiness
	3. Not a loved one so a friend	Friendship
	4. Friend	Friendship
	5. Friend	Friendship
Participant 3	1. Happy, loved, special	Happiness, love
	2. You truly care about this person	Caring
	3. Strong friendship	Friendship
	4. Happy birthday, anniversary, special occasion for a great friend or family member	Friendship, family
	5. Love, but not girl or boyfriend or spouse, love to a friend	Love, friendship
Participant 4	1. Funeral	Condolences
	2. Sorry empathy	Sympathy
	3. Remembrance	Remembrance
	4. Condolences to a friend	Condolences, friendship
	5. Friend	Friendship
Participant 5	1. This one is another one for friends	Friendship
	2. Happy and bright to cheer a friend up	Friendship, happiness, cheer, bright
	3. To honor our friendship	Friendship, honor
	4. Spring	Spring
	5. Old friends	Friendship
Participant 6	1. Feeling beautiful and cherished.	Beauty, cherish
	2. That I adore the person, and deeply treasure the relationship.	Friendship
	3. This is someone that I have developed a more spiritual, deeply cherished relationship with. There is a richness of sacred love and gratitude towards the person.	Love, gratitude, love
	4. Sacred love, royal character.	Love, royalty

Participant 7	5. Heavenly beauty and connection.	Beauty
	1. Love but also bright	Love, bright
	2. Expensive so giving roses usually carries significance	Expense, significance
	3. I would give these flowers to someone I care for	Care
	4. Love	Love
Participant 8	5. Significant love	Love
	1. I am a native Texan. I cannot look a Yellow Rose without thinking of Texas	Texas, memories
	2. Roses mean love but a yellow rose can be love for friends and family without a romantic connotation	Love, friendship, family
	3. Love and concern but not necessarily romantic love so friendly love	Love, friendship
	4. Friends	Friendship
Participant 9	5. Friendly love	Love, friendship
	1. Love. This was my mother-in-law's favorite flower	Love, family, memories
	2. In memory of my Mother-in-law	Family
	3. Love	Love
	4. Honor in memory	Honor, memory
Participant 10	5. Honor in memory	Honor, memory
	1. Bright	Bright
	2. Sending a friend happiness	Happiness
	3. A friend	Friendship
	4. I've heard yellow rose is for friendship	Friendship
	5. Friendship	Friendship

Boomer Participant 6 said that the yellow rose represented *love, but not girl or boyfriend or spouse, love to a friend* while Participant 4 indicated the yellow rose to be a flower you give as *condolences to a friend*. First-level coding revealed common words and phrases such as *friendship, happiness, love, sympathy, and memories*.

During their interviews, several members of Generation X said they would give a yellow rose a *friend* and it would make them feel *happy* (Table 4.2).

Table 4.2 - Generation X Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. I think of friendship or the song Yellow Rose of Texas.	Friendship, Texas
	2. Friendship or maybe get well or cheer up.	Friendship, cheer,

	Yellow typically evokes happiness or warmth.	warmth, happiness
	3. Friendship. Maybe a close friend or even partner who is trying to convey their friendship to you in addition to their love.	Friendship, love
	4. Friendship	Friendship
	5. Friendship	Friendship
Participant 2	1. Happy	Happiness
	2. Appreciation, kindness	Appreciation, kindness
	3. Friendship, close relationship	Friendship
	4. Friendship	Friendship
	5. Friendship	Friendship
Participant 3	1. Intrigued	Intrigued
	2. That I wanted to make them happy	Happiness
	3. I'd send these to someone who I was dating when I didn't want to seem too overbearing	Dating
	4. Romance without being as formal or splashy as red roses	Romance
	5. Spontaneity	Spontaneity
Participant 4	1. Not too pretty, but it's different	Difference
	2. To a friend	Friendship
	3. These are flowers for friends	Friendship
	4. Girls give these to their bridesmaids	Bridesmaids, wedding
	5. Friendliness	Friendship
Participant 5	1. Gratitude	Gratitude
	2. Sympathy for a friend's situation, friendship	Friendship, sympathy
	3. Friends, co-worker	Friendship
	4. Friendship	Friendship
	5. Friendship	Friendship
Participant 6	1. Tradition, beauty	Tradition, beauty
	2. Friendship or caring. I once gave these to a girlfriend once. She politely informed me that yellow roses are for friends	Friendship, care
	3. Close friend that needs to know that I care, and that I'm thinking of her	Friendship, care
	4. Compassion, taking an interest in someone platonically like a new friend	Compassion, interest, friendship
	5. Caring, consideration	Caring, consideration
Participant 7	1. I think of seeing this at my mom or grandmother's house. I think of Mother's Day.	Mother, family, memories
	2. Appreciation and love of someone. For example, mother, grandmother or even wife.	Appreciation, love, family, mother
	3. Close relationship. A relationship of admiration and love.	Relationship, admiration, love
	4. Appreciation, love	Appreciation, love
	5. I would say this flower represents a special occasion.	Special, occasion

Participant 8	1. Yellow Rose of Texas	Texas
	2. I hope you like yellow. It's a happy color	Happiness
	3. I am not a huge fan, but this might be a more formal occasion for a friend or family member	Family, friendship
	4. Happiness	Happiness
	5. Friendship	Friendship
Participant 9	1. Condolences	Condolences
	2. I'm sorry	Condolences, apology
	3. Friend or acquaintance. I'm sorry for your loss	Condolences, friendship
	4. Apology for your pain	Apology
	5. Hope after grief	Hope, condolences
Participant 10	1. This flower makes me feel that I can persevere.	Perseverance
	2. That I know that they have been through a tough ordeal and that I'm proud of how they handled it.	Pride
	3. I would give this flower to someone whose perseverance I respected.	Perseverance, respect
	4. The yellow rose has always represented quite strength to me. The kind of strength you need to persevere through tough times.	Strength, perseverance
	5. Perseverance	Perseverance

Other words used by participants to describe the flower and the feelings it evokes are *perseverance*, *condolence*, and *tradition*. Gen X Participant 6 stated they *once gave these to a girlfriend and she politely informed me that yellow roses are for friends*. Yellow Roses reminded Participant 2 of seeing the flowers at their *mom and grandmother's house*. First-level coding revealed common words *happiness*, *appreciation*, *friendship*, *memories*, and *condolences*.

For the yellow rose, members of the Millennial Generation said the flower is a *friendship flower*, would make someone *happy*, and act as *an expression of platonic love* (Table 4.3).

Table 4.3 - Millennial Generation Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Very uncomfortable	Uncomfortable
	2. I don't care for them much and our	Impersonal

	relationship isn't very personal	
	3. Idk probably as a housewarming gift for someone I know has a yellow kitchen or someone I don't like but have to pretend to	Housewarming, fake
	4. A beacon of apathy and impersonal relationships	Apathy, impersonal
	5. Dislike	Dislike
Participant 2	1. Not as pretty as red roses but still pretty	Pretty
	2. I would probably give this flower to someone I was meeting for the first time or didn't have a strong connection with	Newness
	3. Someone with whom I didn't have a strong connection, maybe an acquaintance or a friend	Friendship, acquaintance
	4. Indifference	Indifference
	5. Potential	Potential
Participant 3	1. This is another friendship flower	Friendship
	2. Represents our friendship	Friendship
	3. These are for someone you have a deep bond of friendship with	Friendship, bond
	4. Friends	Friendship
	5. Friends	Friendship
Participant 4	1. Contentment, appreciation	Contentment, appreciation
	2. That I'm glad they're in my life or that I appreciate something specific they did	Appreciation
	3. I think this would be for like a good friend	Friendship
	4. Friendship	Friendship
	5. Close friendship, appreciation	Friendship, appreciation
Participant 5	1. Happiness, love, admiration	Happiness, love, admiration
	2. Intimacy, roses feel serious to me, but like red roses feel more love oriented, so this one is not as serious a love	Intimacy, love
	3. Blossoming love	Love
	4. An ongoing relationship	Relationship
	5. I care about you, but don't love you yet	Love
Participant 6	1. Very happy, but somewhat solemn and sad. Like a memory of happiness.	Happiness, memory, sadness
	2. I've actually given this to someone before as a token of best-friendship	Friendship
	3. It would mean that they were my best friend	Friendship
	4. Friendship, or a memory of friendship	Friendship, memories
	5. Friendship	Friendship

Participant 7	1. Joy, yellow flowers feel particularly happy to me	Joy, happiness
	2. I'd give this to someone to make them happy	Happiness
	3. A good friend	Friendship
	4. An expression of platonic love which is friendship	Friendship, love
	5. Love and friendship	Love, friendship
Participant 8	1. Like it's a regular plant	Regular
	2. It's like "hey friend, you seem to be having a bad day so take this"	Friendship
	3. Friends	Friendship
	4. Cheering up a friend	Friendship, cheer
	5. Friendship flower	Friendship
Participant 9	1. It is horrendous.	Horrendous
	2. Friendship	Friendship
	3. Close Friend	Friendship
	4. Friendship	Friendship
	5. Friendship	Friendship
Participant 10	1. Curiosity, comfort, openness, friendship	Curiosity, comfort, friendship
	2. Warmth and happiness	Warmth, happiness
	3. Friends, family, platonic loved ones	Friendship, family
	4. Brightness and warmth	Bright, warmth
	5. Friendliness, good cheer, warmth or coziness	Friendship, cheer, warmth

Millennial Participant 5 said that *roses feel serious to me, but like red roses feel more love oriented, so this one is not as serious a love* while Participant 2 said the yellow rose was *a beacon of apathy and impersonal relationships*. First-level coding revealed common words and phrases such as *friendship, impersonal, love, happiness, and curiosity*.

Structural Synthesis

The final level of analysis was the structural synthesis across the generations in order to seek a contemporary definition for each flower. The results of the structural synthesis revealed the definitions that were derived from the interview transcripts and first-level coding (Table 4.4).

Table 4.4 - Results of Structural Synthesis Across all Three Generations of Study

	Baby Boomers	Gen X	Millennial
Solid Carnation	Happiness, cheer, friendship	Friendship, happiness, love	Happiness, love, courtship, friendship
Striped Carnation	Happiness, friendship, appreciation, uniqueness	Uniqueness, happiness, appreciation	Happiness, friendship, uniqueness, obligation
Yellow Rose	Friendship, love, sympathy	Friendship, happiness, condolences	Friendship, love, happiness
Red Rose	Love, romance	Love, romance	Love, romance, cliché
White Chrysanthemum	Condolences, peace, sympathy	Uniqueness, beauty, condolences	Uniqueness, condolences, purity
Daisy	Happiness, childhood, nostalgia, Spring	Cheer, happiness, youth	Cheer, youth, innocence, friendship
Iris	Spring, wisdom, beauty	Nostalgia, sophistication, respect	Respect, cheer, intrigue
Calla Lily	Weddings, beauty, elegance	Condolences, beauty, elegance	Beauty, elegance, sophistication, housewarming
Red Tulip	Spring, happiness, youth	Spring, love, newness, happiness	Easter, Spring, happiness, friendship
Daffodil	Spring, happiness, childhood	Spring, happiness, friendship, newness	Happiness, friendship, Spring

Solid Carnation

The solid carnation, across all generations, evoked a general sense of *happiness* and *friendship*. For members of Generation X and Millennial generations, the solid carnation also represented *love*. To Boomers, the solid carnation represented *cheer*, and to the Millennials, it represented *courtship*.

Striped Carnation

The striped carnation evoked a general sense of *happiness* and *uniqueness* across all generations. For members of Baby Boomers and Millennials, the striped carnation also represented *friendship*. To Millennials, the solid carnation represented *obligation*. For members of Baby Boomers and Generation X, the striped carnation also represented *appreciation*.

Yellow Rose

To all three generations of study, the yellow rose represented *friendship*. Members of the Baby Boomer generation and Generation X also associated *sympathy* and *condolences*, respectively, with the yellow rose. For Boomers and Millennials, the yellow rose also represents *love*. *Happiness* was also evoked in the Gen X-ers and Millennials.

Red Rose

All generations of study used the words *love* and *romance* to describe their feelings toward red roses, what red roses red represent, and the reasons behind giving red roses as gifts. Members of the Millennial generation also considered red roses cliché.

White Chrysanthemum

To all three generations of study, the white chrysanthemum means *condolences*. For the members of Generation X and the Millennials, the white chrysanthemum also represented *uniqueness*. To Boomers, the white chrysanthemum represented *peace* and *sympathy*, and to the Millennials, it represented *purity*. Members from Generation X *beauty* with white chrysanthemums as well.

Daisy

While there are some inconsistencies amongst the definitions provided for the daisy by the three generations, many definitions were agreed upon by two generations. Members from Generation X and the Millennials both associate *cheer* and *youth* with daisies; Millennials also said that the flower also represents *innocence* and *friendship*. However, other members of Generation X agreed with the Baby Boomers that the daisy represents *happiness*. The Baby Boomers felt the daisy represented *Spring* and *childhood* and evoked feelings of *nostalgia*.

Iris

There were many inconsistencies amongst the definitions provided for the iris by the three generations. The Baby Boomers felt the iris represented *Spring*, *wisdom*, and *beauty*. To members of Generation X, the iris represented *nostalgia* and *sophistication*. Millennials agreed that irises represent *respect* with members of Generation X. Irises also represented *cheer* and *intrigue* to the Millennials.

Calla Lily

The calla lily represented *elegance* and *beauty* to the three generations of study. Baby Boomers were reminded of *weddings* by the calla lilies, and calla lilies represented *sophistication* and feelings of *housewarming* to Millennials. Calla lilies also were a way to show *condolences* to members of Generation X.

Red Tulip

Red tulips represented *Spring* and *happiness* to the three generations of study. The red tulips also evoked a feeling of *youth* in the Baby Boomers. Members of Generation X

felt red tulips represent *love* and *newness* as well. Red tulips represented *Easter* and *friendship* to the Millennials.

Daffodil

The daffodil represented *Spring* and *happiness* to the three generations of study. Baby Boomers were reminded of *childhood* as well. Members of Generation X and the Millennial Generation said daffodils represented *friendship*. Daffodils also represented newness to Gen X-ers.

Chapter Summary

Chapter IV presented the data collected from interviews with ten members of the three generations of study. The interview transcripts and first-level coding for the first flower for each generation were also examined. The researcher presented and described in detail the results of the final step in the process, the structural synthesis.

Chapter V will show the analysis of the results presented in Chapter IV. Comparisons between the contemporary definitions synthesized from the interviews in this study and the traditional definitions discussed in Chapter II will be made. The researcher will also state recommendations for future research.

CHAPTER V

Conclusions

Chapter I introduced flowers and their use in arrangements as a form of communication. Flower dictionaries and their shortcomings were also discussed. The purpose of the study and objectives of the study were presented as well.

Chapter II reviewed relevant literature regarding the meanings and symbolism of the ten flowers used in this study and characteristics of the three generations of study. The lack of research on flower meanings was also noted.

In Chapter III the methodology used in the study was established and the interview process used in order to define contemporary flower meanings across generations was discussed. The phenomenological reduction process for data analysis was defined.

Chapter IV presented the data collected from interviews with ten members of the three generations of study. The interview transcripts, first-level coding for the first flower for each generation, and the results of the structural synthesis were examined.

Chapter V will provide the analysis of the results presented in Chapter IV. The researcher will make comparisons between the contemporary definitions synthesized from the interviews in this study and the traditional definitions discussed in Chapter II. Recommendations for future research will be stated.

Key Findings

Overall, the three generations of study held some similar definitions for nine of the ten flowers used in the study. However, the three generations only had similar definitions to those of traditional flower meanings for two of the ten flowers. The

comparisons between the flower definitions provided by the three generations of study and the traditional flower definitions follow.

Solid Carnation

The definition of the solid carnation in this study was happiness and friendship. Love was also a definition to some generations. Traditionally, solid carnations were used to express acceptance of an offer or proposal (Iowa State University, 2005). The results also support the findings in the previous study by the researcher (Moore, 2016). In that study, it was determined that the definition of solid carnations for the participants in the study was happiness and love (Moore, 2016). The results seem to suggest that the traditional meaning is no longer applicable, and a new definition has developed. This new definition is supported by research that found that solid carnations are used today to congratulate a friend on an achievement (Chengyan & Hall, 2010).

Striped Carnation

The striped carnation evoked a definition of happiness and uniqueness to the three generations in this study with some generations adding friendship and appreciation. In the previous study, it was determined that the definition of striped carnations for the participants in the study was happiness and friendship (Moore, 2016). These definitions are supported by research that found that striped carnations are purchased to express thanks and congratulate someone on an achievement (Chengyan & Hall, 2010). However, this is not the traditional meaning of the striped carnation. Striped carnations have represented the refusal of a proposition in the past (Greenaway, 1978). This all suggests that the contemporary definition provided by the three generations of study is more applicable today than traditional definitions.

Yellow Rose

Just like in the previous study, the three generations of study indicated friendship and love as the definition of the yellow rose, but with some generations in this study adding condolences and happiness (Moore, 2016). This is supported by research that found that yellow roses are given for anniversaries, birthdays, weddings, new births, and to show friendship (Chengyan & Hall, 2010). Despite almost all participants of all three generations indicating some meaning of friendship or love for this flower, traditional flower dictionaries suggest the opposite meaning. Many sources agree that yellow roses communicate a “decrease of love” (Greenaway, 1978, p. 50) and “jealousy” (Iowa State University, 2005, p. 1). The results of this study suggest that the people now have a new definition for the yellow rose and do not use past definitions.

Red Rose

The three generations indicated love and romance as the definition of the red rose. This definition agrees with traditional flower dictionaries that state that red roses represent love and the findings of the previous study (Greenaway, 1978; Moore, 2016). This definition does not appear to change across multiple eras and cultures (Greenaway, 1978). The results of this study show no need for a new, contemporary definition for red roses.

White Chrysanthemum

The definition for white chrysanthemum in this study was condolences and uniqueness. In the previous study there were several inconsistencies between generations with some of the definitions including funerals, sadness, and condolences, but also homecoming and celebration (Moore, 2016). None of these definitions matches the

tradition definition, loyalty (Greenaway, 1978). The results suggest that more research is needed before a contemporary definition is provided and the traditional definition is deemed inapplicable.

Daisy

There were many inconsistencies amongst the definitions provided for the daisy by the three generations. Members from Generation X and the Millennials both associate cheer and youth with daisies. However, other members of Generation X agreed with the Baby Boomers that the daisy represents happiness. The Baby Boomers felt the daisy represented Spring and childhood and evoked feelings of nostalgia. Millennials also said that the flower also represents friendship and innocence, one of the traditional definitions. Traditionally, daisies represent innocence and purity (Iowa State University, 2005). This could also be seen as similar to the definitions of youth and childhood provided by some generations since innocence and purity are typically associated with childhood or children. In the previous study, daisies were found to evoke feelings of happiness, cheer, and memories of childhood (Moore, 2016). However, the results are inconsistent and suggest that the generations do not associate traditional definitions of daisies with the flower today.

Iris

There were many inconsistencies amongst the definitions provided for the iris by the three generations. To members of Generation X, the iris represented nostalgia and sophistication. Millennials agreed that irises represent respect with members of Generation X. Irises also represented cheer and intrigue to the Millennials. The Baby Boomers felt the iris represented Spring, wisdom, and beauty. Only one definition

provided by one generation, the Baby Boomers, matches the any of the traditional definitions of faith, hope, and wisdom (Kandeler & Ullrich, 2009a). The participants in the previous study by the researcher listed happiness, short-lived, Spring, prettiness, friendship, mothers, and maternal as some of the meanings of irises (Moore, 2016). All of this suggests that more research is needed to learn whether or not the traditional definitions are still applicable or what new definitions of the iris are.

Calla Lily

The three generations indicated beauty and elegance as the definitions of the calla lily. One of these definitions agrees with traditional flower dictionaries that state that calla lilies represent beauty (Iowa State University, 2005). The previous study found beauty and weddings as the definition (Moore, 2016). The results of this study show no need for a new, contemporary definition for calla lilies.

Red Tulip

The definitions agreed upon by the three generations for the red tulip in this study was spring and happiness. Traditionally, red tulips have meant a “declaration of love” (Greenaway, 1978, p. 54). In the previous study, the participants included Spring and Easter as definitions of red tulips (Moore, 2016). The results suggest that people now have different definitions of red tulips than past definitions. More research is needed to more precisely define and narrow down these new meanings.

Daffodil

The definition of the daffodil in this study was Spring and happiness. Some of the generations also added friendship. In the previous study, Spring was the agreed upon definition by the three generations (Moore, 2016). These definitions are different than the

traditional definition of regard, meaning best wishes or thoughts (Greenaway, 1978). The results suggest that people now have a wide variety of definitions for daffodils, but agree that spring is one definition. More research is needed to more precisely define and narrow down these new meanings.

Generational Differences in Results

Some generations had additional meanings that can give us more insight into the generational differences. Baby Boomers and participants from Generation X gave several flowers definitions like childhood, youth, and nostalgia suggesting they place meaning on flowers based on memories and past experiences. A few definitions provided by Millennials, obligation for the striped carnation and cliché for red roses, suggest that they would might reject overly popular flowers and go against tradition. Some participants felt very strongly saying they would only give striped carnations because they “felt some obligation to give them flowers but didn't really like them” and “because I have to”.

Recommendations

The researcher’s suggestions for future studies follow. For continued research on the topic of this study, the researcher suggests larger sample sizes for each generation and a compatible questionnaire to determine usage of flower meanings when purchasing and gifting flowers. Limiting the population to Murray, KY greatly decreased the available population and decreases the generalizability of the results. There is also a need for more related research regarding flower meanings, the purchasing tendencies of generations, reasons for purchasing specific flowers, and money spent on specific flowers. While completing the review of literature, the lack of relevant studies on the previously mentioned topics in the scholarly body of knowledge became apparent. More research on

all aspects of cut flowers is needed to provide a fuller view of cut flowers and the cut flower industry.

REFERENCES CITED

- Aguirre-Sacasa, R. (Writer), & Krieger, L. T. (Director). (2017). Chapter two: A touch of evil [Television series episode]. In Aguirre-Sacasa, R., Berlanti, G., Goldwater, & J., Schechter, S. (Executive Producers), *Riverdale*. USA, The CW.
- Chengyan, Y., & Hall, C. (2010). Traditional or specialty cut flowers? Estimating U.S. consumers' choice of cut flowers at noncalendar occasions. *Hortscience*, 45(3), 382-386.
- Glesne, C. (2011). *Becoming qualitative researchers: An introduction* (4th ed.). Boston, MA: Pearson Education, Inc.
- Greenaway, K. (1978). *Illuminated language of flowers*. United States of America: Balance House Ltd.
- Iowa State University. (2005). *The language of flowers*. Iowa State University.
- Kandeler, R., & Ullrich, W. R. (2009a). Symbolism of plants: Examples from European-Mediterranean culture presented with biology and history of art. *Journal Of Experimental Botany*, 60(4), 1067-1068. doi:10.1093/jxb/erp042
- Kandeler, R., & Ullrich, W. R. (2009b). Symbolism of plants: Examples from European-Mediterranean culture presented with biology and history of art. *Journal Of Experimental Botany*, 60(13), 3611-3613. doi:10.1093/jxb/erp215
- Marshall, C., & Rossman, G. B. (2006). *Designing qualitative research*. Sage.
- Moore, D. (2016). *Flower meanings: Are they relevant today?* (Unpublished Undergraduate Thesis). Murray State University, Murray, Kentucky.
- Top 10 Characteristics of the four generations currently in the workforce. (2012). *AMWA Journal: American Medical Writers Association Journal*, 27(3), 143.
- Wiedmer, T. (2015). Generations do differ: Best practices in leading Traditionalists, Boomers, and generations X, Y, and Z. *Delta Kappa Gamma Bulletin*, 82(1), 51-58.

LIST OF APPENDICES

Appendix A - Solid Carnation Picture



Solid Carnation

Appendix B - Striped Carnation Picture

Striped Carnation



Appendix C - Yellow

Rose Picture

Yellow Rose



Appendix D - Red Rose Picture



Red Rose

Appendix E - White Chrysanthemum Picture

White Chrysanthemum



Appendix F - Daisy Picture

Daisy



Appendix G - Iris Picture

Iris



Appendix H - Calla Lily Picture



Calla Lily

Appendix I - Red Tulip Picture



Red Tulip

Appendix J - Daffodil Picture

Daffodil



Research Consent Letter

Study Title: Flower Meanings: Are They Relevant Today?

Investigator: Dakota Moore and Dr. Kimberly Bellah, Hutson School of Agriculture

Faculty Sponsor Information: Dr. Kimberly Bellah, 1-270-809-6924, Hutson School of Agriculture, 213 South Oakley Applied Science, Murray, KY

You are being invited to participate in a research study conducted through Murray State. In order to comply with federal regulations, your agreement to participate in this project is necessary. You must be at least 18 years of age to participate. The investigator will explain to you in detail the purpose of the project, the procedures to be used, and the potential benefits and possible risks of participation. You may ask them any questions you have to help you understand the project. A basic explanation of the project is written below. Please read (or listen to) this explanation and discuss with the investigator any questions you may have. You will be given a copy of this form to keep.

- 1. Nature and Purpose of the Project:** Flowers and flower color have long held symbolic meanings throughout their use in bouquets and arrangements. Today, however, flower meanings are not commonly considered when purchasing and designing arrangements, bouquets, and other floral products. In order to describe contemporary emotions elicited from flowers, this study will examine the reactions of participant groups representing three generations when exposed to a set of flowers. The objective of this study is to determine current definitions of flowers based in emotions and feelings across three generations. The results will determine if the meanings of flowers are still relevant today across generations.
- 2. Explanation of Procedures:** Participants will be asked to participate in an interview for research for an Graduate thesis. Informed consent documents will then be administered before the interview is conducted. The interview process will present participants with pictures of flowers from a predetermined list and record their reactions and feelings when asked a series of 5 questions. Each interview will last approximately 20 minutes.
- 3. Discomforts and Risks:** No known risks or discomforts.
- 4. Benefits:** None for participants, but responses will help us to understand the relevancy of flower meanings in today's society.
- 5. Confidentiality:** All of your responses will remain anonymous. There will be no identifiable information collected from participants.
- 6. Refusal/Withdrawal:** Your participation is strictly voluntary and you are free to withdraw/stop participating at any time with absolutely no penalty.

I acknowledge that the risks and benefits involved and the need for the research have been fully explained to me; that I have been informed that I may withdraw from participation at any time without prejudice or penalty; and the investigator has offered to answer any inquiries that I may make concerning the procedures to be followed or my rights as a participant, and has answered to my satisfaction any questions that I have.

I understand that by answering the researcher's survey questions, I voluntarily consent to participate in this research project.

THE DATED APPROVAL STAMP ON THIS DOCUMENT INDICATES THAT THIS PROJECT HAS BEEN REVIEWED AND APPROVED BY THE MURRAY STATE UNIVERSITY INSTITUTIONAL REVIEW BOARD (IRB) FOR THE PROTECTION OF HUMAN SUBJECTS. ANY QUESTIONS ABOUT THE CONDUCT OF THIS PROJECT SHOULD BE BROUGHT TO THE ATTENTION OF DR. KIMBERLY BELLAH AT 1-270-809-6924 OR kbellah@murraystate.edu. ANY QUESTIONS ABOUT YOUR RIGHTS AS A RESEARCH PARTICIPANT SHOULD BE BROUGHT TO THE ATTENTION OF THE IRB COORDINATOR AT (270) 809-2916, 328 WELLS HALL, MURRAY, KY 42071 OR BY EMAILING msu.irb@murraystate.edu. If you would like to know the results of this study, please contact Dr. Kimberly Bellah.

Appendix L - Interview Question Sheet

Flower 1

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 2

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 3

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 4

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 5

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 6

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 7

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 8

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 9

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Flower 10

1. Describe your feelings when looking at this flower.
2. Describe what feelings you would be trying to convey if you gave this flower to someone.
3. If you gave someone this flower or a bouquet of these flowers, how would you describe the symbolism of that flower to your relationship with that person?
4. What does the flower represent to you?
5. Provide a meaning you would give to this flower.

Appendix M - IRB Approval Letter



Institutional Review Board

328 Wells Hall
Murray, KY 42071-3318
270-809-2916 • msu.irb@murraystate.edu

TO: Kimberly Bellah, Agricultural Sciences
FROM: Jonathan Baskin, IRB Coordinator *JB*
DATE: 4/4/2018
RE: Human Subjects Protocol I.D. – IRB # 18-136

The IRB has completed its review of your student's Level 1 protocol entitled *Flower Meanings: Are They Relevant Today?*. After review and consideration, the IRB has determined that the research, as described in the protocol form, will be conducted in compliance with Murray State University guidelines for the protection of human participants.

The forms and materials that have been approved for use in this research study are attached to the email containing this letter. These are the forms and materials that must be presented to the subjects. Use of any process or forms other than those approved by the IRB will be considered misconduct in research as stated in the MSU IRB Procedures and Guidelines section 20.3.

Your stated data collection period is from 4/4/2018 to 4/3/2019.

If data collection extends beyond this period, please submit an Amendment to an Approved Protocol form detailing the new data collection period and the reason for the change.

This Level 1 approval is valid until 4/3/2019.

If data collection and analysis extends beyond this date, the research project must be reviewed as a continuation project by the IRB prior to the end of the approval period, 4/3/2019. You must reapply for IRB approval by submitting a Project Update and Closure form (available at murraystate.edu/irb). You must allow ample time for IRB processing and decision prior to your expiration date, or your research must stop until such time that IRB approval is received. If the research project is completed by the end of the approval period, then a Project Update and Closure form must be submitted for IRB review so that your protocol may be closed. It is your responsibility to submit the appropriate paperwork in a timely manner.

The protocol is approved. You may begin data collection now.

**Opportunity
afforded**

murraystate.edu

Appendix N – IRB Application

Murray State University

Institutional Review Board (IRB)

Application for Approval of Investigations Involving Human Participants

This form is the official documentation of the formal design or plan of a research activity submitted to the IRB for review. Failure to provide all required information will result in return of your application for correction prior to review. It is to be filled out on-line and then the appropriate parts are to be printed for submission. Do not submit pages that do not apply to your research protocol and do not submit your protocol answers as an attachment (the only attachments should be supporting documents). **NOTE: You must submit the signed form as a pdf document and the appropriate materials that support that request as editable Word documents to msu.irb@murraystate.edu.**

PART A

I. Project Title: Flower Meanings: Are They Relevant Today?		
Principal Investigator(s): Dakota Ray Moore		
Department: HSOA	Telephone: 615-339-3632	
Campus Address: N/A	Email address: dmoore23@murraystate.edu	
Status: <input type="checkbox"/> Undergraduate Student <input checked="" type="checkbox"/> Graduate Student <input type="checkbox"/> Faculty <input type="checkbox"/> Other (Specify: _____)		
<i>If PI is an Undergraduate or Graduate Student, applications must be submitted by the faculty mentor and all IRB communications will be sent to the faculty mentor:</i>		
Faculty Mentor: Dr. Kimberly Bellah kbellah@murraystate.edu	Telephone: 1-270-809-6924	Email address: _____
Department: Hutson School of Agriculture Agriculture, 213 South Oakley Applied Science, Murray, KY		Campus Address: Hutson School of
Will any other university personnel or students be assisting with this data collection? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No If yes, who are they and what position do they hold at the university? Dr. Kimberly Bellah, Associate Professor, Agriculture Education		
Please check which is appropriate: <input type="checkbox"/> Class Project <input type="checkbox"/> Research Project <input checked="" type="checkbox"/> Thesis (or Doctoral project)		
If this research is for a thesis or senior project, who are the faculty members on your thesis or project committee? Dr. Kimberly Bellah		
Project Period (mm/dd/yyyy) From: 4/15/2018 To: 3/14/2019		

The designated project period must include all project activities involving humans, with the start date no earlier than the date of IRB approval. The IRB can approve a project for a maximum of 12 months. However, the IRB may decide that more frequent review is necessary. Protocols with project periods longer than 12 months or those that the IRB feels necessitate more frequent review will require a continuing review (use the Project Update and Closure form).

Is a proposal for funding support being submitted? ☒ No ☐ Yes

If yes: ☐ Internal ☐ External

Agency or Sponsor: _____

Deadline: _____

Will this protocol require review by another IRB? ☒ No ☐ Yes

If yes, name of other IRB: _____

RESPONSIBILITIES OF THE PRINCIPAL INVESTIGATOR: Any additions or changes in procedures in the protocol will be submitted to the IRB for written approval prior to these changes being put into practice. Any problems connected with the use of humans once the project has begun must be brought to the attention of the IRB Coordinator. The principal investigator and his or her designee are responsible for retaining Informed Consent Documents in a secure location for a period of three years after the completion of the project or until a minor reaches one year past the age of majority, whichever is longer. Should the faculty investigator or sponsor leave the university before this time, s/he must notify the IRB and provide the exact location for the future storage of these materials.

ASSURANCE STATEMENT: I have read and understand Murray State University's *Procedures and Guidelines* for the Protection of Human Subjects and I agree: (1) the information provided herein does strictly apply to the proposed research; (2) to accept responsibility for the scientific and ethical conduct of this study; (3) to obtain IRB approval prior to revising or altering the research protocol or the approved Informed Consent form; and (4) to immediately report to the IRB any serious adverse reactions and/or unanticipated effects on subjects which occur as a result of this study. I certify that I will conduct my study in an ethical manner that complies with all relevant MSU policies and procedures.

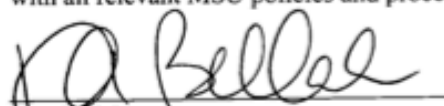
This form is the official documentation of the formal design or plan of a research activity submitted to the IRB for review. Failure to provide all required information will result in return of your application for correction prior to review.


Principal Investigator

3/27/2018
Date

Statement of Approval by Faculty Mentor (required for all students):

I have read and do confirm the accuracy of this application, and I accept responsibility for the conduct of this activity, the supervision of participants, and the maintenance of informed consent documentation as required by the IRB. I certify that my student(s) will conduct this study in an ethical manner that complies with all relevant MSU policies and procedures.


Faculty Mentor

3/27/2018
Date

REQUIRED INFORMATION (Applies to all levels of review)

In order for the IRB to evaluate your application, the following required materials must be provided with this application. Protocols will be returned if incomplete or if documents are not sent in the correct format. Electronic file names should follow this format: [PI first initial & last name]_[Document type]_[version # (date for CITI training)]

Examples: jbaskin_application_v1.pdf, wsmith_interview consent_v3.doc, hmallory_CITI_012416.pdf

- YES ☒ NA ☐ A copy of all interview or survey questions, evaluation instruments (including standardized questionnaires), and data collection forms to be used (If copyright agreements forbid photocopying of a standardized instrument, include an original with a note requesting that it be returned to the investigator).
- YES ☒ NA ☐ Informed consent document(s), either a consent form or cover letter, or parental/guardian permission and minor assent document(s), if necessary.
- YES ☐ NA ☒ Letter of approval from cooperating institutions (includes gathering data at a site).
- YES ☒ NA ☐ Scripts of statements or questions to be read to subjects which should include the following information: participant time commitment, course credit procedures to be used, voluntary nature of the study and that subjects are free to discontinue participation at any time without prejudice from the investigator, how data will be handled - anonymous or confidential.
- YES ☒ NA ☐ A copy of any advertisement, recruitment letter, sign-up folder, etc. that will be used to obtain participants
- YES ☒ ON ☒ FILE A copy of the required training certification (the IRB will not review any protocol until all principal investigators, faculty mentors, university personnel and others who will be assisting with the data collection have completed the required training and submitted a certificate or score to the IRB Coordinator)
- YES ☒ A pdf copy of the signed, completed *Application for Review* sent to the IRB via email at msu_irb@murraystate.edu
- YES ☒ An editable *Word* document copy of all attachments (surveys, consent documents, recruitment materials, data collection forms, etc.) sent to the IRB via email at msu_irb@murraystate.edu

This form is the official documentation of the formal design or plan of a research activity submitted to the IRB for review. Failure to provide all required information will result in return of your application for correction prior to review.

LEVEL OF REVIEW

Activities involving no more than minimal risk to participants and in which the only involvement of humans will be in one or more of the categories defined in Section 6.1 and 6.2 of the *Procedures and Guidelines* as Level 1 or Level 2 research will be reviewed by the IRB as a Level 1 or 2 application. "Minimal risk" means the probability and magnitude of harm or discomfort anticipated in the research are not greater in and of themselves from those ordinarily encountered in daily life or during the performance of routine physical or psychological examination or tests (45 CFR 46.102 (I)). These categories do not apply to research involving prisoners, fetuses, pregnant women, or human in vitro fertilization. Activities involving those populations and/or more than minimal risk will be reviewed as a Level 3 application. The investigator is responsible for initially identifying the category he/she feels is appropriate.

For continuing activities, investigators should use the *Project Update and Closure* form.

After reading Section 6 of the MSU *Procedures and Guidelines*, state the category that you feel best applies to your research project: (Level 1, 2, or 3) Level 1

Note: The final determination of the appropriate level of review will be made by the IRB Coordinator.

PART B

1. Does this study involve deception (i.e., withholding from or giving false or misleading information to subjects which would reasonably affect their decision of whether or not to participate)? ☐ YES ☒ NO
2. Will procedures cause any degree of physical or emotional discomfort greater than normally encountered in everyday life, risk of physical injury, invasion of privacy, threat to dignity, harassment, or otherwise present potential harm to subjects? ☐ YES ☒ NO
3. Other than on consent forms, will the subjects be identified (i.e., names, case identifiers, audio or video recordings, photographs, or other information gathered on people or institutions that would allow subjects to be identified) **and** could their participation in this research lead to personal harm to themselves or their reputation? ☐ YES ☒ NO
4. Are subjects from any of the categories listed below?
 - a. Minors (less than 18 years of age) ☐ YES ☒ NO
 - b. Prisoners or persons who are under criminal sanctions ☐ YES ☒ NO
 - c. Persons with diminished mental capacity (e.g., mental retardation, neurological, psychiatric, or related disability) ☐ YES ☒ NO
 - d. Persons in a residential program (e.g., hospital, developmental center, group home, etc.) ☐ YES ☒ NO
 - e. Current clients of a human service program (e.g., counseling center, clinic, etc.) or clients who have **not** given permission for their unidentified clinical data to be used in research studies ☐ YES ☒ NO
 - f. Pregnant women ☐ YES ☒ NO
 - g. Traumatized, terminally ill or comatose patients ☐ YES ☒ NO

If your research falls into one of the categories listed under Level 1 review and if you answered NO to all parts of questions 1-4, complete Part C for Level 1 review.

If your research does not fall into one of the categories listed under Level 1 or you answered YES to any part of questions 1-4, complete Part D for Level 2 or 3 review.

Part C

Level 1 Review

I. PROJECT SIGNIFICANCE: As part of its risk-benefit analysis, the IRB must have information on (a) the purpose of the research, (b) why the research is necessary, (c) what outcomes are expected from it (both general and specific), and (d) in what way those outcomes will add to or benefit generalizable knowledge. Your answer should clearly address each of those four questions and should avoid (or define) technical terminology/jargon as much as possible.

Flowers and flower color have long held symbolic meanings throughout their use as cut flowers in bouquets and arrangements. These meanings vary some by culture and time period, but many traditions assign them similar meanings. Similarly, horticultural therapy is an emergent field assisting in providing clientele with therapeutic outlets using plants and flowers (Soderback, Soderstrom, & Schalander, 2004). Today, however, flower meanings are not commonly considered when purchasing and designing arrangements, bouquets, and other floral products. In order to describe contemporary emotions elicited from flowers, a descriptive, qualitative study will examine the reactions of study groups representing three generations when exposed to a set of flowers.

II. PARTICIPANT SELECTION:

- | | | | |
|---|---|--|-----------------------------|
| a) Does this research involve the use of existing data, documents, records, pathological or diagnostic specimens? | <input type="checkbox"/> YES | <input checked="" type="checkbox"/> NO | |
| b) Will participants be less than 18 years of age? | <input type="checkbox"/> YES | <input checked="" type="checkbox"/> NO | <input type="checkbox"/> NA |
| c) Will participants be students at Murray State University? | <input checked="" type="checkbox"/> YES | <input type="checkbox"/> NO | <input type="checkbox"/> NA |
| d) Will any participants be unable to speak, read or understand English? | <input type="checkbox"/> YES | <input checked="" type="checkbox"/> NO | <input type="checkbox"/> NA |
| e) Will you be specifically recruiting members of any minority population? | <input type="checkbox"/> YES | <input checked="" type="checkbox"/> NO | <input type="checkbox"/> NA |
- If yes, specify the population(s):

Describe how participants will be selected, enlisted, or recruited. Information about selection should include specifics about the subject group(s) (e.g. Participants will be selected based on their height/class attendance/random drawing from a list provided by the school district). You must attach a copy of any recruitment materials used in this study, including a copy of any verbal script, flyer, or email that will be used to invite people to be part of the study. These must be submitted via email with the protocol.

Dakota Moore will be doing the recruitment for all generations. Participants will be approached and asked to participate in an interview for this study at various locations including the Murray State Arboretum and the Curris Center on MSU's campus between March and August 2018. Millennial Generation participants will be asked if they are between the ages of 19 and 35 to confirm that they are in the Millennial Generation. Gen X participants will be asked if they are between the ages of 36 and 51 to confirm that they are in the Gen X group. Baby Boomer Generation participants will be asked if they are between the ages of 52 and 70 to confirm that they are in the Baby Boomer Generation.

III. PROCEDURES/METHODS:

Answer the following questions to provide an explanation of why this research needs to be conducted using the specific methodology, participants, and procedures proposed in this protocol:

- a. What is your research question or hypothesis?

The objective of this study will be to describe the three generations of interest and to determine

current definitions of flowers based in emotions and feelings. The study methodology will present participants with pictures of flowers (see attachment) from a predetermined list and record their reactions and feelings when asked a series of questions. The analysis will take a phenomenological approach to their responses by looking for repeating themes by generation (Marshall & Rossman, 2006). The results will determine if the meanings of flowers are still relevant today across generations.

- b. Describe the specific procedures and methodology that will be used in the study, including the frequency, duration and location of each procedure and the materials that support that methodology.

Participants will be randomly asked to participate in an interview for research for a thesis. Informed consent documents will be administered before the interview is conducted. The interview process will present participants with pictures of flowers from a predetermined list and record their reactions and feelings when asked a series of questions. Each interview will last approximately 20 minutes.

- c. Describe any compensation that participants will receive in return for their participation.

N/A

IV. INFORMED CONSENT PROCESS: Describe the informed consent process and attach a copy of all consent and/or assent documents. The informed consent document is NOT the process. It is the evidence that shows that your subjects have been given the information that they need to make an informed decision about whether or not to participate in your research project. You must be explicit. You must give a step-by-step description of how you intend to inform your subjects of the details of their involvement in your research activity (i.e., you must say who gives this information, who they give it to, how they transmit this information, and when it is given). It is the principal investigator's responsibility to ensure that the consent and/or assent documents are written at a level that can be easily understood by the subject population.

Each participant will be informed that the interview consists of 10 pictures of flowers followed by questions regarding each picture. Participants will be informed that the interview is voluntary and can be discontinued at any time during the process. The participants will also be informed that there are no risks involved. The informed consent document will be presented and read aloud by the interviewer, Dakota Moore, and participants will be told that no personal information or coding other than generation group which will be included on the sheets used to record their responses.

V. CONFIDENTIALITY AND ANONYMITY: Describe how participants' privacy will be maintained and confidentiality be guaranteed, including (a) how long confidential documents and information will be retained after the end of the study, (b) the specific building address where they will be retained, and (c) what will be done with the materials at the end of the retention time. (Federal regulations require that these materials be retained for at least three years after the study is closed.) If this study involves using a sign-up folder for recruitment of participants, explain how this document will be handled when the recruitment is finished (will it be kept with the confidential study materials, shredded, etc.).

No participant will be asked his or her name or any other identifiable information other than the informed consent form. All interviews will be verbal and transcribed by the interviewer.

VI. CONFLICTS OF INTEREST and/or PROBLEMS OF UNDUE INFLUENCE:

Describe any possible issues about which the IRB should be aware concerning these matters.

- a. During the project period, will any of your subjects include students enrolled in classes taught by you or your faculty mentor? ☐ Yes ☒ No

If "Yes," please answer the following questions. If "No," please go to section 'b.'

1. During the project period, is participation in research a course requirement for any courses taught by you or your faculty mentor? ☐ Yes ☐ No

- 1a. If yes, is there an equitable alternative available for students to complete the requirement other than by participating in research studies? ☐ Yes ☐ No

If the answer to question 1a above is *no* (i.e., there is no equitable alternative to complete the course requirement), then this research cannot use any of the students in any of your or your faculty mentor's classes that have a research participation requirement. Explain how you will ensure that students in those classes do not participate in this research:

N/A

If the answer to question 1a is *yes* (i.e., there is an equitable alternative to complete the course requirement), describe the equitable alternative:

N/A

2. During the project period, will you or the faculty mentor offer extra credit to any of the students in your or your faculty mentor's classes in exchange for participation in this research study? ☐ Yes ☒ No

- 2a. If yes, is there an equitable alternative available to get extra credit for students who choose not to participate in the study? ☐ Yes ☐ No

If the answer to 2a is *no* (i.e., there is no equitable alternative to get extra credit), then the research cannot use as subjects any of the students in your or your faculty mentor's classes where extra credit is offered for research participation. Explain how you will ensure that students in those classes do not participate in this research:

N/A

If the answer to 2a is *yes*, (i.e., there is an equitable alternative available to receive extra credit) describe the equitable alternative:

N/A

- b. Are you using people with whom you otherwise interact in a work environment? This includes specifically targeting classmates if the PI is a student. ☐ Yes ☒ No

- c. If you plan to conduct research at an off-campus site, are you also employed at that site?
☐ Yes ☒ No ☐ Not applicable
- d. Do any members of the subject population work for you or any member of your family?
☐ Yes ☒ No
- e. Do you have any financial interest in the outcome of this research?
☐ Yes ☒ No
- f. Are you using family members or friends in your research?
☐ Yes ☒ No

If you answered *yes* to b, c, d, e or f or if you have another conflict of interest or problem of undue influence, you must describe how you will handle the situation so that the rights of the subject population will be protected.

N/A

-
- Copy only the pages of the forms that apply to your research (i.e., Parts A, B, and C for Level 1).
 - For Level 1, submit a signed *pdf* copy of the protocol approval form and an editable *Word* file of all supporting materials (cover letter, consent form, surveys, recruitment fliers, data collection instrument, etc.) to the IRB via email at msu.irb@murraystate.edu.

Appendix O - Baby Boomer Generation Interviews Flower 1 (Solid Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happy 2. For them to be happy 3. Friend to cheer them up 4. Happiness 5. Fun or happy	Happiness Happiness Friendship, cheer Happiness Fun, happiness
Participant 2	1. Fresh 2. Thank you 3. Friends 4. Centerpiece for dinner 5. Springtime	Fresh Thankfulness Friendship Decoration Spring
Participant 3	1. Pretty, long-lasting, someone care for me 2. Friendship, Congrats 3. Friend (not a best friend), Co-worker, acquaintance from church, work, club, etc. 4. Thoughtfulness 5. Nice	Pretty, care Friendship, congratulations Friendship Thoughtfulness Nice
Participant 4	1. Nice, simple, happy 2. Make them happy 3. To make a friend happy 4. Smiles 5. Happiness	Nice, happiness Happiness Friendship, happiness Smiles Happiness
Participant 5	1. Bright, smiling flower 2. Peaceful 3. To brighten someone's day 4. Happiness 5. Brightness	Bright Peace Bright Happiness Bright
Participant 6	1. I feel the joy of living a simple life. 2. Genuine love and friendship. 3. This person is someone that I feel comfortable in his or her company. 4. Innocence, simple joy, down to earth 5. It means the virtue of effortless happiness.	Joy Friendship Comfort Innocence, joy Happiness
Participant 7	1. Cheer 2. Warm emotions of caring 3. I would give these flowers to family or friends 4. Maybe springtime 5. Cheer	Cheer Care Family, friendship Spring Cheer
Participant 8	1. Happiness, cheer 2. Love and/or affection 3. Mostly affection, perhaps as much because of the red and pink colors as for the carnation itself	Happiness, cheer Love, affection Affection

Participant 9	4. Joy, happiness, affection	Affection, joy, happiness
	5. Affection	Affection
	1. Nice	Nice
	2. Someone in need of care or healing	Care, healing
	3. Thinking of a friend during a rough time	Friendship
Participant 10	4. Caring	Care
	5. Caring	Care
	1. Beautiful; makes me smile	Beauty, smile
	2. I love and appreciate you	Love, appreciation
	3. Friend	Friendship
	4. Caring	Care
	5. I would hope it would bring them joy	Joy

Appendix P - Baby Boomer Generation Interviews Flower 2 (Striped Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. A little more serious, maybe after a loss 2. Everything is ok 3. Friend or family member 4. Serious change 5. Change	Condolences Consolation Friendship, family Change Change
Participant 2	1. Happy flowers 2. Happy, silly 3. Friendship 4. Happiness 5. Friend	Happiness Happiness Friendship Happiness Friendship
Participant 3	1. Pretty, unique, long-lasting 2. Friendship, Congrats, thinking of you 3. Unique friend, close co-worker, acquaintance you are trying to impress 4. Thoughtfulness 5. Uniqueness	Prettiness, uniqueness Friendship, congratulations Uniqueness, friendship Thoughtfulness Uniqueness
Participant 4	1. Happy 2. When I want to show my appreciation 3. Friend or coworker 4. Gratitude 5. Gratitude	Happiness Appreciation Friendship Gratitude Gratitude
Participant 5	1. Another happiness flower 2. Calming 3. To cheer up an old friend 4. Cheer and bright feelings 5. Friendship	Happiness Calm Cheer, friendship Bright, cheer Friendship
Participant 6	1. I feel more creative and outgoing. 2. I would express my appreciation for this person's uniqueness and personal charm. 3. This may not be someone that I am close to, but someone I newly befriended with or I found intriguing and out of the ordinary. 4. Personal flair, charming looks, and effervescent personality 5. An appreciation for the someone's' courage to be different.	Creativity, outgoing Appreciation, uniqueness, charm Friendship, newness Charm, effervescent Appreciation, uniqueness
Participant 7	1. Happy 2. A wish for happiness for them 3. I would give these flowers to family or friends 4. Happy wish 5. Happiness	Happiness Happiness, wish Family, friendship Happiness, wish Happiness
Participant 8	1. The flower looks like a party to me	Party

	2. Celebration and joy	Celebration, joy
	3. I would give these flowers on a birthday or to celebrate some other event, like a graduation	Birthday, celebration, graduation
	4. Happiness and joy	Joy, happiness
	5. Happiness and celebration	Happiness, celebration
Participant 9	1. Pretty	Prettiiness
	2. Thinking of you	Thoughtfulness
	3. Caring	Caring
	4. Caring	Caring
	5. Caring	Caring
Participant 10	1. A little more happier	Happiness
	2. I hope this makes you happy	Happiness
	3. Friend	Friendship
	4. Cheer	Cheer
	5. Happiness to someone	Happiness

Appendix Q - Baby Boomer Generation Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. A little sad 2. Sympathy 3. Family or friend 4. Sadness 5. Show of sympathy	Sadness Sympathy Family, friendship Sadness Sympathy
Participant 2	1. Different 2. Happy 3. Not a loved one so a friend 4. Friend 5. Friend	Difference Happiness Friendship Friendship Friendship
Participant 3	1. Happy, loved, special 2. You truly care about this person 3. Strong friendship 4. Happy birthday, anniversary, special occasion for a great friend or family member 5. Love, but not girl or boyfriend or spouse, love to a friend	Happiness, love Caring Friendship Friendship, family Love, friendship
Participant 4	1. Funeral 2. Sorry empathy 3. Remembrance 4. Condolences to a friend 5. Friend	Condolences Sympathy Remembrance Condolences, friendship Friendship
Participant 5	1. This one is another one for friends 2. Happy and bright to cheer a friend up 3. To honor our friendship 4. Spring 5. Old friends	Friendship Friendship, happiness, cheer, bright Friendship, honor Spring Friendship
Participant 6	1. Feeling beautiful and cherished. 2. That I adore the person, and deeply treasure the relationship. 3. This is someone that I have developed a more spiritual, deeply cherished relationship with. There is a richness of sacred love and gratitude towards the person. 4. Sacred love, royal character. 5. Heavenly beauty and connection.	Beauty, cherish Friendship Love, gratitude, love Love, royalty Beauty
Participant 7	1. Love but also bright 2. Expensive so giving roses usually carries significance 3. I would give these flowers to someone I care for 4. Love 5. Significant love	Love, bright Expense, significance Care Love Love

Participant 8	1. I am a native Texan. I cannot look a Yellow Rose without thinking of Texas	Texas, memories
	2. Roses mean love but a yellow rose can be love for friends and family without a romantic connotation	Love, friendship, family
	3. Love and concern but not necessarily romantic love so friendly love	Love, friendship
	4. Friends	Friendship
	5. Friendly love	Love, friendship
Participant 9	1. Love. This was my mother-in-law's favorite flower	Love, family, memories
	2. In memory of my Mother-in-law	Family
	3. Love	Love
	4. Honor in memory	Honor, memory
	5. Honor in memory	Honor, memory
Participant 10	1. Bright	Bright
	2. Sending a friend happiness	Happiness
	3. A friend	Friendship
	4. I've heard yellow rose is for friendship	Friendship
	5. Friendship	Friendship

Appendix R - Baby Boomer Generation Interviews Flower 4 (Red Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Love	Love
	2. Feelings of love	Love
	3. Husband or family to show them I love them	Love, family
	4. Love	Love
	5. Love	Love
Participant 2	1. Valentine's Day	Valentines
	2. Love	Love
	3. Loved one	Love
	4. Special occasions	Occasion
	5. Love	Love
Participant 3	1. Love, passion, strong/nice scent	Love, passion
	2. Love, caring, I am sorry, or I love you	Love, caring
	3. Love. Parent, spouse, girl/boyfriend	Love, family
	4. Love, strong relationship, special occasion	Love, special
	5. Strong bond	Bond
Participant 4	1. Love	Love
	2. Romance	Romance
	3. Very close relationship, lover	Love
	4. Valentine's day	Valentines
	5. Romance	Romance
Participant 5	1. Love, love, love	Love
	2. To show your love	Love
	3. Husbands always give this to their wives to show love. Sometimes sons give these to their mothers	Love, wives, mothers
	4. Love and romance and chocolates	Love, romance
	5. Gift of love	Love, gift
Participant 6	1. Cliché type of love	Love
	2. That I love you just as I love humanity	Love, humanity
	3. I feel this is appropriate to give to you for the special occasion.	Special
	4. Common gift to show love	Love
	5. Big love	Love
Participant 7	1. Love	Love
	2. The expense of roses carries the significance of your feelings	Expense, significant
	3. You give these flowers to a significant loved one	Significant, love
	4. Love for your partner	Love
	5. Love	Love
Participant 8	1. Romantic love	Love, romance
	2. In giving this flower you are saying "I love you"	Love
	3. You are expressing romantic love. Red roses	Love, romance,

	are the perfect flower to give on Valentine's Day or on anniversaries to the person you love	Valentines, anniversary
	4. Romantic Love	Love, romance
	5. Love	Love
Participant 9	1. Love	Love
	2. Love	Love
	3. I love them	Love
	4. Love	Love
	5. Love	Love
Participant 10	1. Love	Love
	2. You send as a Valentine	Valentines
	3. Loved one	Love
	4. Love and Valentine's Day	Valentines, love
	5. Love	Love

Appendix S - Baby Boomer Generation Interviews Flower 5 (White Chrysanthemum)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Fun 2. Don't take life too seriously, be silly 3. Friend or family 4. Fun 5. Fun	Fun Silly Friendship, family Fun Fun
Participant 2	1. Seems like a funeral 2. Respect 3. You send these to a funeral 4. Funeral 5. Respect	Funeral Respect Funeral Funeral Respect
Participant 3	1. Peace 2. Sympathy, Happy Easter 3. Friends, Family 4. Peace 5. Sympathy	Peace Sympathy, Easter Friends, family Peace Sympathy
Participant 4	1. Peace 2. Calm 3. Something different thoughtful 4. Unique 5. Special	Peace Calm Thoughtfulness Uniqueness Special
Participant 5	1. I've seen these at weddings and funerals recently 2. Something peaceful and pure about this. Maybe to show respect at the funeral but also symbolizing of the wedding 3. Given to a bride. Or maybe a grieving family I guess 4. Churches 5. Peace	Wedding, funeral Peace, purity, funeral, wedding, respect Wedding, grief Church Peace
Participant 6	1. Sadness and longing 2. I am with you in whatever you are going through, trying to understand you, and to be there for you. 3. This may not be anyone I know well. I give this flower because I want to let him/her know that I care or understand what they are going through 4. Sympathy and love 5. Sympathetic love	Sadness Condolences, sympathy Condolences, sympathy Sympathy, love Sympathy, love
Participant 7	1. It's kind of dark 2. Sympathy 3. You are sending them well wishes or you hope they feel better soon	Dark Sympathy Well wishes, healing

Participant 8	4. Dark times	Dark
	5. Sympathy	Sympathy
	1. Happiness	Happiness
	2. Celebration and perhaps congratulations	Celebration, congratulations
	3. "I am happy for you and celebrating with you." I would give these flowers to family or friends	Family, friendship, happiness, celebration
Participant 9	4. Caring	Care
	5. Caring for or celebrating with you.	Care, celebration
	1. Nice	Nice
	2. To cheer them up	Cheer
	3. Friend or family	Friendship, family
Participant 10	4. Cheer or sympathy	Cheer, sympathy
	5. Sympathy	Sympathy
	1. Funeral flower	Funeral
	2. Sorry for your loss	Loss, condolences
	3. Love and sympathy	Love, sympathy
	4. Funeral	Funeral
	5. Sadness and loss	Sadness, loss

Appendix T - Baby Boomer Generation Interviews Flower 6 (Daisy)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happiness 2. Happiness 3. Friend or family 4. Smiles 5. Happiness	Happiness Happiness Friendship, family Smile Happiness
Participant 2	1. Living in the country 2. You don't really give these, you just pick them as a kid 3. Kids give them to their moms 4. Farm land 5. Wild	Country Childhood Childhood, mothers Farm Wild
Participant 3	1. Spring, happiness, newness 2. Congratulations, thank you for being a Friend 3. Great friendship, family member 4. Newness, Spring, Life 5. Happiness	Spring, happiness, newness Congratulations, friendship Friendship, family Newness, Spring Happiness
Participant 4	1. Spring 2. Renewal 3. Thank you for a job or appreciation 4. Hope 5. Energy and forward looking	Spring Renewal Appreciation Hope Energy, future
Participant 5	1. A happy Springy flower 2. I like people would gift these as a bulb so someone can plant it and enjoy the Spring blooms 3. A friend or neighbor so I could enjoy the blooms too 4. Enjoyment 5. Memories for good times	Happiness, Spring Spring, gift Friendship, neighbor Enjoyment Memories
Participant 6	1. Time to celebrate 2. I am really happy, for me and you, and life 3. I am so happy to be with you 4. Cheerfulness, light hearted goodness in life 5. Cheerfulness and goodness of life	Celebration Happiness Happiness Cheer, goodness Cheer, goodness
Participant 7	1. Childlike. It makes you happy 2. Reminding someone of past memories we share 3. A childhood friend you found recently 4. Children 5. Spring	Childhood, happiness Memories Childhood Childhood Spring
Participant 8	1. Happiness, springtime 2. Happiness and celebration	Happiness, Spring Happiness, celebration

	3. I would give this flower to friends or family when they are celebrating a happy event	Friendship, family, celebration, happiness
	4. Joy	Joy
	5. Cheer	Cheer
Participant 9	1. Love, wife's favorite flower	Love
	2. Love	Love
	3. You are special enough to get your favorite flower	Special
	4. Love	Love
	5. Love	Love
Participant 10	1. Happy	Happiness
	2. Joy	Joy
	3. Have a happy day	Happiness
	4. Sunshine and bright days	Sunshine, bright
	5. Joy	Joy

Appendix U - Baby Boomer Generation Interviews Flower 7 (Iris)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happy 2. Happiness 3. Friend 4. Springtime 5. Happiness	Happiness Happiness Friendship Spring Happiness
Participant 2	1. Expensive 2. It shows a lot of interest because of the expense 3. Give it to someone who is refined 4. Expense 5. Refined	Expense Expense, interest Refinement Expense Refinement
Participant 3	1. Exotic 2. Get well soon, Sorry for your loss 3. Friendship, Family, Acquaintance 4. Condolences 5. Feel better soon	Exotic Condolences Friendship, family Condolences Care
Participant 4	1. Nice, I like this flower 2. Energy 3. Very special and distinctive 4. Quality time to do something different 5. Fun and different	Nice Energy Special, distinction Quality Fun, different
Participant 5	1. My grandkids pick these at school and give them to me when I pick them up 2. Grandmother who they love 3. To show love and bring smiles 4. Bright smiles on my granddaughter 5. Having fun	Childhood, school Love, grandmother, family Smile, love Bright, smile, childhood Fun
Participant 6	1. Wisdom, mature beauty 2. That I admire your maturity in character, not necessarily age wise, your sophisticated personality 3. I admire you for your wisdom, inner beauty, and solid character 4. Wisdom and inner beauty 5. Wisdom and sophisticated feminine beauty	Wisdom, beauty Maturity, sophistication Wisdom, beauty, character Wisdom, beauty Wisdom, sophistication, beauty
Participant 7	1. Seems like a traditional flower 2. You give it to people to cheer them up 3. Give it to someone older and wise 4. Respect 5. Tradition	Tradition Cheer Elder, wisdom Respect Tradition
Participant 8	1. Springtime 2. Caring in hard times or celebrating good	Spring Care, celebration

	times.	
	3. I would give these flowers to family or friends to represent my emotional support for them in good or bad times.	Support, family, friends
	4. Caring and the state of Tennessee.	Care, Tennessee
	5. Beauty	Beauty
Participant 9	1. Spring	Spring
	2. A small gift for the spring	Spring
	3. Wife	Wife
	4. Spring	Spring
	5. Spring	Spring
Participant 10	1. Reminder of my childhood	Childhood
	2. Happy Spring	Happiness, Spring
	3. Friend	Friendship
	4. New life and Spring	Spring, newness
	5. Newness	Newness

Appendix V - Baby Boomer Generation Interviews Flower 8 (Calla Lily)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happiness 2. Appreciate the beauty 3. Family or friend 4. Beauty 5. Contentment	Happiness Beauty Family, friendship Beauty Contentment
Participant 2	1. Another expensive flower 2. Give it to someone beautiful like the flower 3. A loved one 4. A beautiful woman 5. Expense	Expense Beauty Love Beauty Expense
Participant 3	1. Pretty, Easter 2. Happiness 3. Family, great friendship 4. Easter 5. New start	Easter, pretty Happiness Family, friendship Easter Newness
Participant 4	1. High class 2. Special 3. A very special person and a special flower. It means gratitude because this flower is not common. 4. Quality 5. Very elegant	Classy Special Special, gratitude, uniqueness Quality Elegant
Participant 5	1. Wedding flowers 2. Wedding joy and anniversaries 3. Maybe I could send it to my daughter for her anniversary 4. Happy, pretty bride 5. Anniversary	Wedding Anniversary, wedding, joy Anniversary, daughter, family Happiness, pretty, wedding Anniversary
Participant 6	1. Aging or the maturity that comes with aging 2. I may give this to someone who is celebrating a birthday or a great achievement 3. This is someone that I feel has traditional way of thinking. Giving this flower will not risk our relationship with potential misunderstanding. 4. Traditional 5. Traditional, conventional.	Maturity Birthday, achievement Traditional, understanding Traditional Traditional, conventional
Participant 7	1. Pretty 2. To make someone feel beautiful 3. Give to a classy woman you are friends with 4. Elders	Pretty Beauty Class, friendship Elder

Participant 8	5. Beautiful	Beauty
	1. Grace and beauty	Grace, beauty
	2. Support and love	Support, love
	3. I would give these flowers to family or friends who are celebrating something like a birthday or need support during a hard time in their life	Family, friendship, birthday, celebration
	4. Encouragement, hope and love	Encouragement, hope, love
Participant 9	5. Encouragement, hope and love	Encouragement, hope, love
	1. Elegance	Elegance
	2. Beauty	Beauty
	3. Classy	Classy
	4. Elegance	Elegance
Participant 10	5. Simple elegance	Elegance
	1. Pretty and beautiful	Pretty, beauty
	2. Wedding decorations	Wedding, decorations
	3. Usually in a wedding bouquet	Wedding
	4. Love	Love
	5. Love	Love

Appendix W - Baby Boomer Generation Interviews Flower 9 (Red Tulip)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happy 2. Happiness 3. Friend or family 4. Newness 5. Springtime	Happiness Happiness Friendship, family Newness Spring
Participant 2	1. Announcing Spring 2. Pretty 3. A loved one 4. Spring 5. Spring	Spring Pretty Love Spring Spring
Participant 3	1. Very pretty, Spring 2. Congratulations, Thinking of you 3. Family, Close Friend 4. Happiness, Spring 5. Friendship	Pretty, Spring Congratulations, thoughtfulness Family, friendship Happiness, Spring Friendship
Participant 4	1. Classy 2. Respect and appreciation 3. Close but not too close. This is a flower that could be given to a colleague in a work environment or a friend 4. Holland 5. Appreciation	Classy Respect, appreciation Colleague, friendship Holland Appreciation
Participant 5	1. Mother had these in the yard when I was a little girl 2. You could give these as bulbs so a friend can plant them and enjoy them 3. The red would mean love for them 4. Spring and new emergence 5. Spring happiness	Mothers, childhood Friendship, enjoyment Love Spring, newness, emergence Spring, happiness
Participant 6	1. Childlike everlasting, perfect beauty 2. I wish you the perfect joy in life 3. This is someone that I want to please, to cheer up, to be reminded of the perfect creation whom they are 4. Perfect beauty 5. Youth and newness	Childlike, beauty Joy Cheer, reminder Beauty Youth, newness
Participant 7	1. Spring and youth 2. To make someone feel young 3. A good friend 4. Easter time 5. Spring	Spring, youth Youth Friendship Easter Spring
Participant 8	1. Springtime	Spring

	2. Celebration or concern	Celebration, concern
	3. I would give these to family or friends who are celebrating something like a birthday	Family, friendship, celebration, birthday
	4. Cheer	Cheer
	5. Happiness and cheer.	Happiness, cheer
Participant 9	1. Spring	Spring
	2. Joy and new life	Joy, newness
	3. Family or wife	Family
	4. Spring time	Spring
	5. Hope	Hope
Participant 10	1. Memories of Tulip Time a festival in Holland, Michigan in the Spring in my childhood	Memories, festival, childhood, Spring
	2. Happy Spring	Spring, happiness
	3. Celebration of Tulip Time	Celebration
	4. Spring	Spring
	5. Tradition	Tradition

Appendix X - Baby Boomer Generation Interviews Flower 10 (Daffodil)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happy 2. Happiness 3. Family or friend 4. Newness 5. Springtime	Happiness Happiness Family, friendship Newness Spring
Participant 2	1. Another Spring flower 2. A little more happier than the Tulip 3. Would make anyone happy 4. Spring 5. Happiness	Spring Happiness Happiness Spring Happiness
Participant 3	1. Childhood, Buttercups 2. Thinking of You, Happy Birthday 3. Family, friend 4. Childhood memories, My aunt 5. Happiness, Positive attitude	Childhood Thoughtfulness Family, friendship Childhood, family Happiness
Participant 4	1. Sunshine and spring 2. Early spring 3. Sharing of joy and happiness with a friend 4. Hope 5. Friendship	Spring Spring Joy, happiness, friendship Hope Friendship
Participant 5	1. Bright Springtime 2. Maybe a good housewarming gift for a friend 3. Bright yellow brings lots of smiles 4. Spring 5. Joy	Spring Housewarming, friendship Bright, smile Spring Joy
Participant 6	1. Simple and innocent childhood 2. I appreciate your humble beauty. 3. This is someone who I adore for his/her deep quality of resilience and bright and happy persona. 4. Beauty and childhood 5. Humility and beauty	Innocence, childhood Beauty Resilience, happiness Beauty, childhood Happiness, beauty
Participant 7	1. Cheerful 2. Cheer 3. I would give these flowers to family or friends who are celebrating something 4. Cheer 5. Celebration	Cheer Cheer Celebration, family, friends Cheer Celebration
Participant 8	1. Happiness 2. Happiness 3. A good flower for a new mother celebrating the birth of a baby or for a birthday or someone	Happiness Happiness Newness, celebration, birthday, support, care

	who needs support during a hard time in their life	
	4. Happiness and care	Happiness, care
	5. Happiness	Happiness
Participant 9	1. Spring	Spring
	2. Tell them they are special	Special
	3. Thinking of them	Thoughtfulness
	4. Spring	Spring
	5. Spring	Spring
Participant 10	1. Joy	Joy
	2. Childhood memory	Childhood, memories
	3. Sister	Sister
	4. Childhood adventures	Childhood, adventure
	5. Spring	Spring

Appendix Y - Generation X Interviews Flower 1 (Solid Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. I don't have any specific feelings. They're a pretty color, but they don't hold any symbolism 2. Maybe a simple gesture of thank you for completing a small task for me, like watching a dog for an afternoon or house sitting 3. I think the relationship would be surface level friend. Nothing too deep, carnations are very cheap flowers and not known for their deeper meaning 4. A low level of thought for a friend of a friend who did you a small favor 5. Maybe just "thank you."	Pretty Thanks Friendship, cheap Thoughtfulness, friendship Thanks
Participant 2	1. They have nice, happy color 2. Friendship 3. Friendship or family 4. Love, kindness happiness 5. Appreciation	Nice, happy Friendship Family, friendship Love, kindness happiness Appreciation
Participant 3	1. They're very pretty, I feel like carnations have a second-tier reputation but that's too bad 2. I would send these to coworkers on holidays, or maybe to the hospital for someone I didn't know particularly well. They seem nice but somehow reserved 3. Friendly but not close, somewhat formal 4. Well wishes 5. Friendship	Pretty Holidays, reserved, nice Friendship, formal Well wishes Friendship
Participant 4	1. Approachable 2. Respect 3. To make them happy 4. Spring 5. Respect	Approachable Respect Happiness Spring Respect
Participant 5	1. Happy, loved 2. That they were thought of and loved. 3. Best friend, close female friend or sister 4. Thoughtfulness 5. Sisterly love, affection	Happiness, love Love, thoughtfulness Friendship, family Thoughtfulness Family, love, affection
Participant 6	1. Nice and traditional 2. Honor and companionship 3. I would give this to a relative with whom I'm close to like my mother or grandmother, maybe a favorite aunt. Possibly a long-term friend. 4. A message of familiarity and caring 5. Consideration, empathy	Nice, tradition Honor, companionship Family, mothers, friendship Familiarity, care Consideration, empathy

Participant 7	1. These flowers make me think of romance, Valentine's Day	Romance, Valentine's
	2. I would be trying to convey love. Celebrate an anniversary, Valentine's Day	Love, celebration, anniversary, Valentine's
	3. Spouse, romantic relationship	Romance, spouse
	4. Love, romance	Love, romance
	5. I would say this flower means how much you love or care about someone else.	Love, care
Participant 8	1. Formal. They look good for a function that would include older people.	Formal, mature
	2. Very formal, old school standard pretty flowers.	Formal, old school, pretty
	3. Similar to what you would give a generic hallmark gift card for. Formal and standard	Generic, standard, formal
	4. Not much. They are pretty, but too inside the box for my personal taste	Pretty
	5. A very standard formal flower you can gift for any occasion	Standard, gift
Participant 9	1. Happy	Happiness
	2. I hope you have a great day, cheer them up	Cheer, nice
	3. Friend	Friendship
	4. Nice gesture to brighten someone's day	Nice, bright
	5. Happy flower	Happiness
Participant 10	1. New romance	Romance
	2. That I love them in a romantic way	Love, romance
	3. I would give this flower to someone that I was in a new relationship with and this would symbolize the passion of new love	Love, relationship, passion
	4. Romantic love	Love, romance
	5. This flower symbolizes new love to me	Love

Appendix Z - Generation X Interviews Flower 2 (Striped Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Striped carnations require a little more effort, and they look a little nicer than a solid carnation, but at the end of the day, it's still a carnation 2. I appreciate you 3. To me, this would be something you would have your child give to their teacher or coach to show respect or appreciation 4. A low-level thought or gesture of appreciation 5. Thanks. I spent the extra dollar to buy you striped ones.	Nice Appreciation Appreciation, respect Thoughtfulness, appreciation Thankfulness
Participant 2	1. Nice color, bright 2. Friendship or special occasion 3. Friendship or family 4. Love, kindness, and happiness 5. Appreciation	Nice, bright Friendship, occasion Family, friendship Love, kindness, happiness Appreciation
Participant 3	1. I can't help but associate these with the old logo for Carnation powdered milk that was in my mom's pantry for ages for some unknown reason, which is a shame because they're actually really interesting 2. These feel non-committal to me, formal 3. I wouldn't give these flowers except as an accent part of a larger bouquet 4. Something old-fashioned or traditional 5. Formal, tradition	Mother, interesting Formal Accent Tradition Formal, tradition
Participant 4	1. Happy flower 2. To give cheer 3. You are thinking of them 4. Cheerful 5. Fun because it's more fun than the solid Carn	Happiness Cheer Thoughtful Cheer Fun
Participant 5	1. Fun, spontaneous 2. Fun, flirty 3. New relationship 4. Fun 5. Fun and friendly	Fun, spontaneity Fun, flirtatious Relationship Fun Fun, friendship
Participant 6	1. Interesting and stimulating; maybe a little excitement 2. Personal interest, compassion 3. Close friend, could be a past love or a person for whom I have an interest for currently 4. Something a little different	Excitement, interest, stimulation Interest, compassion Friendship, interest, love Difference

Participant 7	5. Interest and excitement	Interest, excitement
	1. I think of a high school dance when looking at this flower	Dance
	2. Infatuation or a date to a dance. Also could be something used for decorations at wedding	Infatuation, dating, dance, wedding
	3. I think this could be a serious relationship, but I think of this more as courting type relationship.	Relationship, dating, courting
	4. I think wedding decorations when I see this flower and love	Wedding, love
Participant 8	5. I would say this flower represents love	Love
	1. Interesting and different	Interest, difference
	2. A more creative flower and artistic	Creativity, artistic
	3. Would likely need to know them well and the reason would be less formal and creative in nature, so probably a friend or family member	Creativity, friendship, family
	4. An interesting flower specimen, imaginative	Interest, imagination
Participant 9	5. Imagination	Imagination
	1. Cheap	Cheap
	2. Think of prom or school dance	Prom, dance
	3. A corsage or boutonniere for a dance, young love	Dance, love
	4. Thank you	Thankfulness
Participant 10	5. Thank you for being my date to this event	Thankfulness, dating
	1. Hominess	Home
	2. That I feel that their company or home is very warm or cozy	Home, warmth, cozy
	3. I would give this to a close friend or family member	Friendship, family
	4. Traditional happiness	Tradition, happiness
	5. Tradition and happiness	Tradition, happiness

Appendix AA - Generation X Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. I think of friendship or the song Yellow Rose of Texas. 2. Friendship or maybe get well or cheer up. Yellow typically evokes happiness or warmth. 3. Friendship. Maybe a close friend or even partner who is trying to convey their friendship to you in addition to their love. 4. Friendship 5. Friendship	Friendship, Texas Friendship, cheer, warmth, happiness Friendship, love Friendship Friendship
Participant 2	1. Happy 2. Appreciation, kindness 3. Friendship, close relationship 4. Friendship 5. Friendship	Happiness Appreciation, kindness Friendship Friendship Friendship
Participant 3	1. Intrigued 2. That I wanted to make them happy 3. I'd send these to someone who I was dating when I didn't want to seem too overbearing 4. Romance without being as formal or splashy as red roses 5. Spontaneity	Intrigued Happiness Dating Romance Spontaneity
Participant 4	1. Not too pretty, but it's different 2. To a friend 3. These are flowers for friends 4. Girls give these to their bridesmaids 5. Friendliness	Difference Friendship Friendship Bridesmaids, wedding Friendship
Participant 5	1. Gratitude 2. Sympathy for a friend's situation, friendship 3. Friends, co-worker 4. Friendship 5. Friendship	Gratitude Friendship, sympathy Friendship Friendship Friendship
Participant 6	1. Tradition, beauty 2. Friendship or caring. I once gave these to a girlfriend once. She politely informed me that yellow roses are for friends 3. Close friend that needs to know that I care, and that I'm thinking of her 4. Compassion, taking an interest in someone platonically like a new friend 5. Caring, consideration	Tradition, beauty Friendship, care Friendship, care Compassion, interest, friendship Caring, consideration
Participant 7	1. I think of seeing this at my mom or grandmother's house. I think of Mother's Day. 2. Appreciation and love of someone. For example, mother, grandmother or even wife.	Mother, family, memories Appreciation, love, family, mother

	3. Close relationship. A relationship of admiration and love.	Relationship, admiration, love
	4. Appreciation, love	Appreciation, love
	5. I would say this flower represents a special occasion.	Special, occasion
Participant 8	1. Yellow Rose of Texas	Texas
	2. I hope you like yellow. It's a happy color	Happiness
	3. I am not a huge fan, but this might be a more formal occasion for a friend or family member	Family, friendship
	4. Happiness	Happiness
	5. Friendship	Friendship
Participant 9	1. Condolences	Condolences
	2. I'm sorry	Condolences, apology
	3. Friend or acquaintance. I'm sorry for your loss	Condolences, friendship
	4. Apology for your pain	Apology
	5. Hope after grief	Hope, condolences
Participant 10	1. This flower makes me feel that I can persevere.	Perseverance
	2. That I know that they have been through a tough ordeal and that I'm proud of how they handled it.	Pride
	3. I would give this flower to someone whose perseverance I respected.	Perseverance, respect
	4. The yellow rose has always represented quite strength to me. The kind of strength you need to persevere through tough times.	Strength, perseverance
	5. Perseverance	Perseverance

Appendix BB - Generation X Interviews Flower 4 (Red Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Red roses are supposed to represent love, passion, and romance	Love, passion, romance
	2. Love, romance, passion	Love, romance, passion
	3. My partner or spouse. Someone who I love in a romantic way.	Love, romance
	4. Romance	Romance
	5. Love	Love
Participant 2	1. Feelings of love	Love
	2. Love	Love
	3. This would be a close loving relationship	Love, relationship
	4. Love	Love
	5. Love	Love
Participant 3	1. Impressed	Impression
	2. That I cared a lot about them and the particular occasion like Valentine's Day	Valentines
	3. Loving. I'd save these for my spouse or at least someone who I'd been dating for a long time	Love
	4. Valentine's Day	Valentines
	5. Love and expense	Love, expense
Participant 4	1. Love	Love
	2. Sending a Valentine	Valentines
	3. A loved one	Love
	4. Love	Love
	5. Love	Love
Participant 5	1. Love, passion, romance	Love, passion, romance
	2. Love	Love
	3. Love interest	Love
	4. Love, romance	Love, romance
	5. Love, romance	Love, romance
Participant 6	1. Beauty, passion	Beauty, passion
	2. Deep caring. There may not be true love, but there's definitely lust	Care, love, lust
	3. Lover, significant other	Love, significance
	4. Desire, excitement	Desire, excitement
	5. Passion, desire, fervor	Passion, desire, fervor
Participant 7	1. Love, romance	Love, romance
	2. I would be trying to convey love. Celebrate an anniversary, Valentine's day.	Love, anniversary, Valentine's
	3. Spouse, romantic relationship	Romance, relationship
	4. Love, romance	Love, romance
	5. I would say this flower means how much you love or care about someone else.	
Participant 8	1. Red Rose, the original symbol of love	Love

	2. Power, love, and strength	Love, strength
	3. This is a flower for strong, powerful love	Strength, love
	4. Power and strength	Strength
	5. Love	Love
Participant 9	1. Love	Love
	2. I love you	Love
	3. You love them deeply	Love
	4. Love, passion	Love, passion
	5. Deep compassion and love for someone	Love, compassion
Participant 10	1. Committed Love	Love, commitment
	2. Long term, committed love	Love, commitment
	3. I would only give this to a person that I was in a long-term committed relationship with	Relationship, commitment
	4. This symbolizes a relationship that as proven it can be permanent	Relationship, permanence
	5. Commitment	Commitment

Appendix CC - Generation X Interviews Flower 5 (White Chrysanthemum)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. It's cool-looking and pretty 2. Kind of every occasion flower. Maybe for a wedding since it's white. 3. Maybe love or congrats on a wedding	Pretty Wedding Love, congratulations, wedding
Participant 2	4. Love or purity 5. Love or pure 1. Fullness 2. Longevity 3. Friend and family. It would be in a bouquet with other flowers 4. Longevity, fullness 5. Longevity	Love, purity Love, purity Fullness Longevity Friendship, family Longevity, fullness Longevity
Participant 3	1. I love these! They're beautiful and also seem exotic. They also remind me of chrysanthemum tea. 2. These strike me more as flowers you'd see as part of a centerpiece at a wedding rather than something you'd give someone. 3. A close friend, someone who I trusted to appreciate something out of the ordinary 4. Beauty and mystery 5. They seem perfect for an elegant party, like a fancy dinner or a wedding	Beauty, exotic Wedding Friendship Beauty, mystery Elegance, wedding, fancy
Participant 4	1. Seems sad, maybe it's the black background 2. Condolences 3. Someone grieving 4. Remembrance 5. Grief	Sadness Condolences Grief Remembrance Grief
Participant 5	1. Sympathy, purity, death 2. Sympathetic 3. I would give someone a bouquet of white chrysanthemums for a funeral. 4. Sympathy 5. Sympathy	Sympathy, purity, death Sympathy Condolences, funeral Sympathy Sympathy
Participant 6	1. As a flower, it seems to say "pay attention to me" with its big, bloom. I would expect to see this where it can get some looks in a table centerpiece 2. Maybe "congratulations" for a new promotion, for getting married 3. Maybe to a coworker or mother for an event or accomplishment 4. This is one of those big flowers that seems to	Attention, centerpiece Congratulation, promotion, wedding Coworker, mothers, accomplishment Statement

	be more about the giver than the recipient. I would be trying to make a statement with this flower.	
Participant 7	5. Dedication and devotion 1. Wedding, special occasion 2. Pretty flower. I think of a wedding, special occasion or just seeing this blooming in the spring 3. Someone you care about or want to demonstrate how you feel. I think this could be used for weddings, get well bouquets, even funerals. 4. Beautiful, simple 5. This flower represents simple beauty that we all enjoy.	Dedication, devotion Wedding, occasion Pretty, wedding, Spring Wedding, condolences, well wishes Beauty, simplicity Beauty, simplicity
Participant 8	1. Very interesting, almost like sea coral. 2. Different and artsy flower, pure 3. Pure white so purity if given standalone. Thinking outside of the box and a testament to how cool and creative nature can be 4. Creative and pure 5. Creative, pure, full flower.	Interest Purity, artistic Purity, creativity Creative, purity Creative, purity
Participant 9	1. I like this one, it's very detailed 2. I am interested in getting to know you 3. Friends or love interests 4. Blossoming friendship 5. Flirty	Detailed Interest Friendship, love Friendship Flirting
Participant 10	1. This flower seems very professional 2. Maybe something for a funeral or wedding 3. Maybe to someone you respect 4. Respect, condolences 5. Respect	Professional Condolences, wedding Respect Respect, condolences Respect

Appendix DD - Generation X Interviews Flower 6 (Daisy)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. They're cheerful 2. Get well soon, cheer up, Happy Mother's Day 3. I think these would be appropriate for a friend or if they were ill or had experienced a loss recently. 4. Joy 5. Joy, cheer, peace	Cheer Cheer, mothers, well wishes Friendship, well wishes, condolences Joy Joy, cheer, peace
Participant 2	1. Happiness 2. Happiness 3. Friendship or family. Given to brighten someone's day. 4. Summertime 5. Happiness	Happiness Happiness Friendship, family, bright Summer Happiness
Participant 3	1. Cheerful 2. That I was trying to brighten their day 3. I feel like these flowers are very flexible - you can give them to anyone as a nice surprise 4. Sunniness 5. Happiness	Cheer Bright Flexibility, surprise Sun Happiness
Participant 4	1. Bright 2. Kids pick them for adults 3. To a mother 4. Children 5. Fun	Bright Childhood Mothers Childhood Fun
Participant 5	1. Purity, happy 2. Happy and to brighten up someone's day 3. Friends 4. Friendship and happiness 5. Friendly	Purity, happiness Happiness, bright Friendship Friendship, happiness Friendship
Participant 6	1. Light, happy feelings; sunny days of good cheer 2. Have fun; be lighthearted, carefree, optimistic 3. Close friend, long-term friend. Maybe a relative that could use a lift in spirits 4. Summer love 5. Youthfulness and innocence	Light, happiness, sun, cheer Fun, lighthearted, carefree Friendship, family Summer, love Youth, innocence
Participant 7	1. Beautiful, natural, innocence 2. Thank you, appreciation of that person or what they have done 3. Relationship could be family, friend or someone that you want to convey appreciation	Beauty, nature, innocence Appreciation Family, friendship, appreciation

	to.	
	4. Beautiful, natural, innocence	Beauty, nature, innocence
	5. Simple but beautiful flower	Simplicity, beauty
Participant 8	1. A true field type flower, usually paired with bees and sunshine	Field, bees, sun
	2. Young, innocent, happy flower	Youthfulness, innocence, Happiness
	3. Creates a feeling of calm and peace. You would think of a field on a bright sunny day.	Calm, peace, bright, sun, field
	4. Bright sunny day flower	Sun, bright
	5. Bright sunny day flower you want to draw a happy face on.	Bright, sun, happiness
Participant 9	1. Cheery	Cheer
	2. Feel better soon	Well wishes
	3. Friend	Friendship
	4. Energy	Energetic
	5. Encouragement	Encouragement
Participant 10	1. Simple Happiness	Simplicity, happiness
	2. I would give this flower to someone, if I felt that we were experiencing a happy moment	Happiness
	3. I would only give this to someone I was very close too and whose company I found joyful.	Joy
	4. Joy in the simple things in live.	Joy, simplicity
	5. Joy	Joy

Appendix EE - Generation X Interviews Flower 7 (Iris)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. I remember having these growing at my childhood home. They bring about a sense of nostalgia to me.	Childhood, nostalgia, memories
	2. Maybe a sense of nostalgia as well or a bit of friendship with the hopes of something long term.	Nostalgia, friendship, hope
	3. I would give these to my mom or maybe a friend on their birthday	Mothers, friendship, birthday
	4. Home	Home
	5. Rebirth	Rebirth
Participant 2	1. Beauty	Beauty
	2. Beauty and colorful	Beauty
	3. Friend or family. Given at a joyful occasion.	Friendship, family, joy
	4. Beauty	Beauty
	5. Joy	Joy
Participant 3	1. I really love the purple. Between the color combo and the interesting shape, these might be the most visually impressive flowers of the whole group	Impressive, interest
	2. To someone I look up to or respect	Respect
	3. Respectful. I'd give these to my mom or grandma or bring them to a party I was invited to. I also associate them with Easter for some reason	Respect, mothers, party, Easter
	4. Beauty and sophistication	Sophistication, beauty
	5. Sophistication	Sophistication
Participant 4	1. Reminds me of St. Louis	St. Louis
	2. Fleur de lis	Fleur de lis
	3. Someone older who you respect	Respect
	4. Fleur de lis	Fleur de lis
	5. Tradition	Tradition
Participant 5	1. Honor, royalty	Honor, royalty
	2. Thoughtfulness	Thoughtfulness
	3. Friendship, mother	Friendship, mothers
	4. Respect	Respect
	5. Respect	Respect
Participant 6	1. Beautiful, but also stylish	Beauty, style
	2. Appreciation and respect	Appreciation, respect
	3. Someone that I cherish like a mother, grandmother, favorite aunt	Mothers, family
	4. Seems like a more sophisticated flower	Sophistication
	5. Goodness and kind-heartedness. If I gave out flowers regularly, I would only give this one to specific people on special occasions	Goodness, kindness, special, occasions

Participant 7	<ol style="list-style-type: none"> 1. I think of Spring, Easter, or Mother's day 2. Love, appreciation in a maternal or family member sense. 3. Mother, grandmother, aunt 4. I think of love and appreciation. I think the purple makes me think of Easter, and sacrifice 5. Easter and sacrifice 	<p>Spring, Easter, mothers Love, appreciation, mothers, family Mothers, family Love, appreciation, Easter, sacrifice Easter, sacrifice</p>
Participant 8	<ol style="list-style-type: none"> 1. Mysterious and exotic 2. Mysterious, exotic flower with a sense of art and money 3. Here is a unique and artistic flower that is mysterious 4. It seems like a sturdy, strong flower 5. Exotic, strong 	<p>Mystery, exotic Mystery, exotic, artistic, money Uniqueness, artistic, mystery Sturdiness, strength Exotic, strength</p>
Participant 9	<ol style="list-style-type: none"> 1. Elegant and detailed 2. Happy birthday 3. Friend or family 4. Detailed and beautiful with age 5. Celebrate another year of a beautiful life 	<p>Elegance, details Birthday, happiness Friendship, family Details, beauty, age Celebration, birthday, life</p>
Participant 10	<ol style="list-style-type: none"> 1. Nostalgia because my mother grew irises 2. I would convey that their household reminded me of the good parts of my childhood 3. I would give this to a family friend that I thought was a good mother to her children 4. A stable childhood 5. Stable Childhood 	<p>Nostalgia, memories, mothers Home, childhood Family, friendship, mother Stability, childhood Stability, childhood</p>

Appendix FF - Generation X Interviews Flower 8 (Calla Lily)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Calla lilies will forever be known as funeral flowers	Funerals
	2. Grief, sorrow	Grief, sorrow
	3. Someone who you care for who recently lost a loved one	Condolences
	4. Funerals	Funerals
	5. Grief	Grief
Participant 2	1. Beauty	Beauty
	2. Beauty	Beauty
	3. Friend or family. Given at a joyful occasion	Friendship, family, joy
	4. New life, weddings	Newness, weddings
	5. Unique	Unique
Participant 3	1. I feel like they're associated with funerals and should be reserved for serious occasions, but they are very beautiful and pretty	Funerals, beauty, pretty
	2. Sympathy	Sympathy
	3. These would be for anyone who is grieving or needs sympathy	Sympathy, grief, condolences
	4. A solemn occasion	Solemn
	5. Condolences	Condolences
Participant 4	1. Very pretty but superficial	Pretty, superficial
	2. Beautiful	Beauty
	3. Someone who deserves the beautiful flower	Beauty
	4. Beauty	Beauty
	5. Summer	Summer
Participant 5	1. Love	Love
	2. Remorse	Remorse
	3. Sibling, friends, mother	Family, mothers, friendship
	4. Apology	Apology
	5. Remorse	Remorse
Participant 6	1. Calla Lilies make me think of weddings. Beauty, elegance, and refinement	Weddings, beauty, elegance, refinement
	2. Congratulations	
	3. I would give these to a great friend or a cousin getting married, or a great friend celebrating a milestone	Friendship, family, wedding, celebration
	4. Understated elegance	Elegance
	5. Refined love	Love, refinement
Participant 7	1. Modern, office flowers	Modern, business
	2. Congratulations or appreciation	Congratulations, appreciation
	3. Relationship could be a friendship or professional relationship	Friendship, professional

	4. Modern	Modern
	5. Modern flower that represents luxury and beauty.	Modern, luxury, beauty
Participant 8	1. Older generation, traditional	Maturity, traditional
	2. Formal flowers to show respect	Formal, respect
	3. I must be giving you these because one of your grandparents or boss had an accomplishment, is sick, or unfortunately passed away.	Accomplishment, grandparents, condolences, well wishes
	4. Longevity, respect & grace	Longevity, respect, grace
	5. Graceful formal flower	Grace, formal
Participant 9	1. Grace	Grace
	2. Beauty	Beauty
	3. Someone who lost someone	Condolences
	4. End of a beautiful life	Condolences, beauty
	5. Respect	Respect
Participant 10	1. Fakeness and decoration	Fake, decoration
	2. This is usually a decoration so maybe housewarming	Decoration, housewarming
	3. To brighten up a place and make it more elegant	Bright, elegance
	4. Represents all the temporary things that people do to make a space more elegant and sophisticated	Elegance, sophistication
	5. Decoration, elegance	Decoration, elegance

Appendix GG- Generation X Interviews Flower 9 (Red Tulip)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Tulips are more of an informal love, like when you're dating and want to give the person flowers, but you're not to the red roses phase yet. 2. I like you. A lot. I'm ready to say I love you 3. I would give them to someone I'm dating. 4. Courtship 5. Love	Love, dating, newness Love Dating Courtship Love
Participant 2	1. Happy 2. Happiness 3. Friends and family. It says happy days are ahead 4. Spring is here 5. Happiness, new	Happiness Happiness Friendship, family, happiness Spring Happiness, newness
Participant 3	1. Happy, appreciative 2. Gratitude 3. I feel like I could give these to anyone. Tulips are actually my mom's favorite flower, so I often bring them for her birthday 4. Spring, cheerfulness 5. Thankfulness	Happy, appreciation Gratitude Mothers, birthday Spring, cheer Thankfulness
Participant 4	1. Bright and happy 2. To cheer someone up 3. A friend 4. Spring 5. Cheer	Bright, happiness Cheer Friendship Spring Cheer
Participant 5	1. Love 2. Passion 3. Significant other or someone you love 4. Love 5. Love	Love Passion Love Love Love
Participant 6	1. Red still evokes some passion for me, but I've never really seen tulips as something to give a lover. They seem like a hardy flower, not soft or dainty 2. Love with respect, fondness 3. With these flowers being red, I would give these to a long-term lover or spouse. 4. Dedication and love 5. Love, adoration	Passion, hardiness Love, respect, fondness Love Dedication, love Love, adoration
Participant 7	1. Spring 2. Housewarming, or welcome. I could also see giving these to family member as love or appreciation.	Spring Housewarming, welcome, family, love, appreciation

	3. I think you could give these to a friend or neighbor to welcome or give them to a spouse or family member to show love and appreciation.	Friendship, welcome, family, love, appreciation
	4. Spring, appreciation, love	Spring, appreciation, love
	5. Spring, welcome	Spring, welcome
Participant 8	1. Abundance, young, bountiful flower	Abundance, youth, bounty
	2. Here is to growth and fullness in life	Growth, fullness, life
	3. Friendship type flower, conveying abundance and fullness, and a young strong energy	Friendship, abundance, energy
	4. Abundance and strong flower	Abundance, strength
	5. Abundance, youth	Abundance, youth
Participant 9	1. Spring new season encouragement	Spring, encouragement
	2. You can do this. A boost in confidence	Confidence
	3. Friend	Friendship
	4. New season and new life	Newness
	5. Encouragement to get through a tough season	Encouragement
Participant 10	1. This gives me a feeling of simple goodness.	Simplicity, goodness
	2. That I felt like they were happy and successful and created a happy home.	Happiness, success, home
	3. I would give this to a very close friend or family member.	Friendship, family
	4. This represents a stable home.	Stability, home
	5. When I see people with this flower, it reinforces that they have a happy home-life.	Happiness, home

Appendix HH - Generation X Interviews Flower 10 (Daffodil)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Like the yellow rose, I feel the daffodil is representative of friendship	Friendship
	2. Friendship, happiness	Friendship, happiness
	3. Friends, partner or spouse, parent, whomever you want to feel happy and content	Friendship, family, happiness, contentment
	4. Friendship or happiness	Friendship, happiness
	5. Friendship or happiness	Friendship, happiness
Participant 2	1. Happiness	Happiness
	2. Happiness	Happiness
	3. Friends and family, a new beginning	Friends, family, newness
	4. Spring is coming	Spring
	5. Newness	Newness
Participant 3	1. Happy	Happiness
	2. Happiness and lightness	Happiness, light
	3. Like daisies, I feel like you could give these to anyone that needs to be cheered up	Cheer
	4. Spring	Spring
	5. Friendship	Friendship
Participant 4	1. Cheery	Cheer
	2. For Mother's Day	Mothers
	3. Mother to make her happy	Happiness, mothers
	4. Spring	Spring
	5. Happiness	Happiness
Participant 5	1. Happy	Happiness
	2. Celebratory	Celebration
	3. Friends, family	Friendship, family
	4. New beginning	Newness, new beginning
	5. New beginning	Newness, new beginning
Participant 6	1. Sweetness, informality, simplicity	Sweetness, informality, simplicity
	2. Caring and fondness, in an informal way	Care, fondness, informality
	3. Possibly a secretary or assistant at work to signify my gratitude and caring	Gratitude, care
	4. Amity, friendliness	Amity, friendship
	5. Being neighborly	Neighborly
Participant 7	1. Spring, Mother's day, appreciation, love	Spring, mothers, appreciation, love
	2. Appreciation, love	Appreciation, love
	3. Mother, grandmother, spouse	Family, mothers
	4. Appreciation of someone else	Appreciation
	5. Love and appreciation of a close family member.	Appreciation, love, family
Participant 8	1. Yellow artistic bright flower	Bright, artistic

	2. Artistic creative and bright	Creativity, bright
	3. A gift of energetic flowers for brightness and creativeness.	Energetic, bright, creativity
	4. Nothing specific, very unique	Uniqueness
	5. Creative, artistic, bright	Creativity, artistic, bright
Participant 9	1. New, young life	Newness, youth, life
	2. Congratulations on the new bundle of joy after a new birth	Congratulations, birth, newness
	3. Friend	Friendship
	4. New life	Newness, life
	5. Young and vibrant	Vibrancy, youth
Participant 10	1. Warmth	Warmth
	2. I would convey that I felt that they had a warm and loving home.	Warmth, home
	3. Probably a relative or family friend.	Family, friendship
	4. This flower represents a warm and loving home	Warmth, home
	5. Family love	Familial, love

Appendix II - Millennial Generation Interviews Flower 1 (Solid Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Sad	Sadness
	2. Maybe condolences	Condolences
	3. Someone I don't know that well, but they probably had someone die	Condolences, less familiar relationship
	4. Sadness	Sadness
	5. Compassion.	Compassion
Participant 2	1. The colors in particular make me think about romantic interest	Romance
	2. I would give these flower to someone I was interested in romantically or I would give them to my mother	Romance, family
	3. Friends, person I was interested in, possibly my mother	Friendship, family
	4. Romantic interest	Romance, interest
	5. Intentions to date	Dating, intentions
Participant 3	1. Happy flowers	Happiness
	2. Love	Love
	3. Most likely the flowers would be for someone I was in a romantic relationship with	Romance, relationship
	4. Relationships	Relationships
	5. Love	Love
Participant 4	1. Bubbly happiness, giddiness	Happiness
	2. Early romantic interest	Romance
	3. I would probably give this to someone in an early dating relationship	Dating, new relationship
	4. Puppy love	Love
	5. Puppy love	Love
Participant 5	1. Happy	Happiness
	2. Celebration, happiness, congratulations, get well soon	Celebration, happiness, congratulations
	3. Friendship, family member	Friendship, family
	4. Lightheartedness, congratulations	Congratulations, lighthearted
	5. Friendship, congratulations	Friendship, congratulations
Participant 6	1. Very romantic and sweet, definitely a Valentine's flower	Romance, Valentines
	2. That I loved them romantically or that I loved them in general and wanted them to have Valentine's flowers	Romance, love, Valentines
	3. It would almost definitely have to be symbolic of my romantic love for them	Romance, love
	4. Romantic love and Valentine's day	Romance, love, Valentines

Participant 7	5. Romantic love.	Romance, love
	1. Joy, I think these flowers are beautiful	Joy, beauty
	2. Joy, I'd give them to make someone feel happy	Joy, happiness
	3. A parent or maybe a teacher, someone I have a lot of respect for	Family, respect
	4. An expression of love and gratitude for a caregiver	Love, gratitude, caregiver
Participant 8	5. Love, gratitude, admiration	Love, gratitude, admiration
	1. Calm, happy	Happiness, calm
	2. It's a pretty flower that makes me feel calm	Calm
	3. Love because they're red and pink	Love
	4. Love	Love
Participant 9	5. Love	Love
	1. This reminds me of a flower I would have gotten from a third-grade boyfriend.	Childhood, young relationship
	2. Affection	Affection
	3. New relationship	Newness
	4. Affection	Affection
Participant 10	5. Puppy love	Love
	1. Happy flowers	Happiness
	2. Positivity, but not related to joy or love, perhaps more to wishing them wealth and prosperity	Positivity, wealth, prosperity
	3. Family and friends	Family, friendship
	4. Plenty, excess	Plenty, excess
	5. Wealth, surplus	Wealth, surplus

Appendix JJ - Millennial Generation Interviews Flower 2 (Striped Carnation)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. It reminds me of a sunny day in the city 2. That I'm flirting with them 3. I don't know them but they're cute and I need to impress them 4. Spontaneity 5. Flirtatious	Sun, city Flirtatious Impressions Spontaneity Flirtatious
Participant 2	1. I feel intrigued when looking at this 2. Maybe just make them happy 3. I would probably give this to friends 4. Spring 5. Intrigue	Intrigue Happiness Friendship Spring Intrigue
Participant 3	1. Happy flowers again 2. Love but different than the solid Carnation 3. Most likely these are for someone I loved but in more of a platonic way 4. Friendships 5. Happiness	Happiness Love Love, friendship Friendship Happiness
Participant 4	1. It's kind of boring to me 2. Probably that I felt some obligation to give them flowers but didn't really like them. 3. I probably don't like them more than a friend 4. Stuffiness 5. Friendship maybe	Obligation Friendship Stuffiness Friendship
Participant 5	1. Happy, whimsical 2. Playfulness, not serious 3. Friend, family member, community member 4. Just a happy little flower 5. Congratulations, happiness for something	Happiness, whimsy Playfulness Friendship, family Happiness Congratulations, happiness
Participant 6	1. Interested; looks very happy 2. To me this seems like a celebratory flower, I feel like it's the kind you get after an accomplishment, or the kind you wear at prom 3. We are close and have some kind of relationship, like friends of some kind and I was happy for them, or wanted to share a special moment with them 4. I'm going to say celebration or commemoration of some kind 5. To commemorate a special event between friends	Happiness, interest Celebration, accomplishment, prom Friendship, Happiness Celebration or commemoration Commemoration, friendship

Participant 7	1. Joy but also a sort of melancholy feel when compared to the solid carnation	Melancholy, joy
	2. Joy, I'd give someone this flower to make them happy	Joy, happiness
	3. I think I would give this flower to anyone for any reason because I think it's really pretty	Pretty
	4. Trying to cheer someone up	Cheer
	5. Joy or happiness	Joy, happiness
Participant 8	1. Exotic	Exotic
	2. That you think they are attractive	Attractive
	3. Dating	Dating
	4. Dating	Dating
	5. Exciting	Exciting
Participant 9	1. This looks like a bloody tissue. Kind of ugly	Ugly
	2. Maybe just giving them because I have to	Obligation
	3. I would give these flowers to someone I was not very close to. Maybe just a friend I'm not close to	Friendship
	4. Boredom	Boredom
	5. Boredom	Boredom
Participant 10	1. The mild amusement, tasteful	Amusement
	2. Make them happy	Happiness
	3. Maybe just a friend or family member, not someone special	Friendship, family
	4. Happy, sunny days	Happiness, sun
	5. Amusement	Amusement

Appendix KK - Millennial Generation Interviews Flower 3 (Yellow Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Very uncomfortable	Uncomfortable
	2. I don't care for them much and our relationship isn't very personal	Impersonal
	3. Idk probably as a housewarming gift for someone I know has a yellow kitchen or someone I don't like but have to pretend to	Housewarming, fake
	4. A beacon of apathy and impersonal relationships	Apathy, impersonal
	5. Dislike	Dislike
Participant 2	1. Not as pretty as red roses but still pretty	Pretty
	2. I would probably give this flower to someone I was meeting for the first time or didn't have a strong connection with	Newness
	3. Someone with whom I didn't have a strong connection, maybe an acquaintance or a friend	Friendship, acquaintance
	4. Indifference	Indifference
	5. Potential	Potential
Participant 3	1. This is another friendship flower	Friendship
	2. Represents our friendship	Friendship
	3. These are for someone you have a deep bond of friendship with	Friendship, bond
	4. Friends	Friendship
	5. Friends	Friendship
Participant 4	1. Contentment, appreciation	Contentment, appreciation
	2. That I'm glad they're in my life or that I appreciate something specific they did	Appreciation
	3. I think this would be for like a good friend	Friendship
	4. Friendship	Friendship
	5. Close friendship, appreciation	Friendship, appreciation
Participant 5	1. Happiness, love, admiration	Happiness, love, admiration
	2. Intimacy, roses feel serious to me, but like red roses feel more love oriented, so this one is not as serious a love	Intimacy, love
	3. Blossoming love	Love
	4. An ongoing relationship	Relationship
	5. I care about you, but don't love you yet	Love
Participant 6	1. Very happy, but somewhat solemn and sad. Like a memory of happiness.	Happiness, memory, sadness
	2. I've actually given this to someone before as a token of best-friendship	Friendship

	3. It would mean that they were my best friend	Friendship
	4. Friendship, or a memory of friendship	Friendship, memories
	5. Friendship	Friendship
Participant 7	1. Joy, yellow flowers feel particularly happy to me	Joy, happiness
	2. I'd give this to someone to make them happy	Happiness
	3. A good friend	Friendship
	4. An expression of platonic love which is friendship	Friendship, love
	5. Love and friendship	Love, friendship
Participant 8	1. Like it's a regular plant	Regular
	2. It's like "hey friend, you seem to be having a bad day so take this"	Friendship
	3. Friends	Friendship
	4. Cheering up a friend	Friendship, cheer
	5. Friendship flower	Friendship
Participant 9	1. It is horrendous.	Horrendous
	2. Friendship	Friendship
	3. Close Friend	Friendship
	4. Friendship	Friendship
	5. Friendship	Friendship
Participant 10	1. Curiosity, comfort, openness, friendship	Curiosity, comfort, friendship
	2. Warmth and happiness	Warmth, happiness
	3. Friends, family, platonic loved ones	Friendship, family
	4. Brightness and warmth	Bright, warmth
	5. Friendliness, good cheer, warmth or coziness	Friendship, cheer, warmth

Appendix LL - Millennial Generation Interviews Flower 4 (Red Rose)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Unimpressed, everyone does red roses	Unimpressive
	2. I suppose since most people want red roses, if I were to give them this that means I care for them	Care
	3. We'd at least be dating, probably dating seriously	Dating
	4. Love	Love
	5. A sign you love someone	Love
Participant 2	1. Romantic feelings. Definitely elicit feelings of love.	Love, romance
	2. I would give it to someone I love	Love
	3. Partner or someone you love in a romantic way	Love, romance
	4. Love	Love
	5. Love	Love
Participant 3	1. The flowers of love	Love
	2. Love	Love
	3. For someone I'm dating or in love with	Love, dating
	4. Romance	Romance
	5. Love	Love
Participant 4	1. Melancholy	Melancholy
	2. Traditional romantic love	Love, romance
	3. They would be a significant other	Significance
	4. Love	Love
	5. Romantic love	Love, romance
Participant 5	1. Happiness	Happiness
	2. I love you, I messed up and I'm sorry, you did really well in a performance and I want to congratulate you	Love, apologies, congratulations
	3. Lovers, loved ones, significant other, someone you admire	Love, admiration
	4. Love	Love
	5. Love	Love
Participant 6	1. It's beautiful and vibrant	Beauty, vibrance
	2. A serious sort of commitment. Romantic probably	Commitment, romance
	3. The relationship is a serious relationship, like a romantic partner. But I feel like this is a classic flower, so its meaning has become very broad and you could give it to a lot of people.	Romance, classic, broad
	4. The totality of human experience, but especially love, commitment, and appreciation.	Love, commitment, appreciation

Participant 7	5. Serious commitment or love	Commitment, love
	1. Love, I can't help but think of love when looking at red roses	Love
	2. Love, I'd give these to someone to let them know I love them.	Love
	3. Someone I love. A family member or partner.	Love, family
	4. An expression of the love felt for someone.	Love
Participant 8	5. Love or passion	Love, passion
	1. Romantic, sexy	Romantic, sexy
	2. Romantic	Romantic
	3. We would be dating	Dating
	4. It's the "hey you're hot and we're dating" flower	Dating
Participant 9	5. Love and romantics	Love, romance
	1. This makes me think of Valentine's day... which is stupid.	Valentine's
	2. Love	Love
	3. Love	Love
	4. Love	Love
Participant 10	5. Love	Love
	1. Boredom, it's so common, people always give it to women they love	Boredom, commonality, love, women
	2. Obligatory positivity	Obligations
	3. You give it to someone you love	Love
	4. Overblown representation of romance.	Romance
	5. Tradition, love	Tradition, love

Appendix MM - Millennial Generation Interviews Flower 5 (White Chrysanthemum)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Soft 2. They deserve more than a basic flower 3. Good friends 4. More than average 5. Superfluous	Soft Special Friend Above average Superfluous
Participant 2	1. I feel strange or fascinated by it. It definitely isn't like the other flowers on this list 2. Maybe appreciation of a friendship 3. I would probably give this to a friend. 4. Fascination 5. Intrigue	Fascination, unique Friendship, appreciation Friend Fascination Intrigue
Participant 3	1. Something more elegant and pure 2. Flowers to honor them 3. Someone I respect 4. Pure white 5. Honor	Elegance, purity Honor Respect Purity Honor
Participant 4	1. A sense of peacefulness 2. I feel like I would be trying to cheer them up or help them deal with stress 3. I think they would be a good friend or a family member. 4. Childhood simplicity, purity 5. Kind of a big hug in flower form	Peace Cheer, relief Friendship, family Childhood, purity Hug
Participant 5	1. A little melancholy 2. Get well soon or I'm sorry or sorry for your loss 3. Someone was injured or sick or they experienced a loss 4. An apology but like in a "I'm sorry you're going through this" kind of way 5. I'm here for you if you need me	Melancholy Condolences, sympathy Condolences, sympathy Condolences, sympathy Sympathy
Participant 6	1. Confusion. It's very busy. But maybe it's celebratory? The white speaks to purity 2. That I was happy for their new start or journey 3. Looks to me like I'd be trying to commemorate a friend or family member's birth or perhaps a commitment ceremony like a wedding 4. Purity and new beginnings 5. Purity and new beginnings	Celebration, purity Newness, happiness Commemoration, birth, wedding, friendship, family Purity, newness Purity, newness

Participant 7	1. Somber, they are beautiful flowers but something about them feels somewhat sad	Somber, beauty, sadness
	2. Comfort. I'd give these to someone to give my "best wishes"	Comfort
	3. I'd give these to someone who recently lost a loved one	Condolences
	4. A way to pay respects to those who have passed.	Condolences, respect
	5. Passing or beauty	Condolences, beauty
Participant 8	1. It reminds me of sleep and makes me want to take a nap because it looks like a cloud	Sleep, cloud
	2. Maybe to feel better or help with stress	Heal, relief
	3. Someone who needs to heal	Heal
	4. Rest, healing	Rest, heal
	5. Rest, healing	Rest, heal
Participant 9	1. This reminds me of a sterile hospital	Hospital
	2. Truce	Truce
	3. Someone I was trying to get to forgive me	Forgiveness
	4. Clean slate, purity	Purity, clean
	5. Purity	Purity
Participant 10	1. Solemnity, gravity	Solemn
	2. Condolences or consolation	Condolences
	3. Someone who has lost a person they cared about	Loss
	4. Death	Death
	5. Loss	Loss

Appendix NN - Millennial Generation Interviews Flower 6 (Daisy)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Underwhelmed. You can find these outside 2. Like an obligation 3. Kids pick these for their moms 4. Plain boring basic 5. Mundane	Underwhelming Obligation Childhood, mother Plain Mundane
Participant 2	1. I feel happy when looking at them 2. I would give these to someone I was trying to cheer up 3. Coworker, friend, family 4. Sunshine, cheerfulness 5. Happiness	Happiness Cheer Friendship, family Sunshine, cheerfulness Happiness
Participant 3	1. Childlike 2. Bright 3. Most likely to someone who needs joy 4. Children playing in the Summer 5. Joy	Childhood Bright Joy Childhood, Summer Joy
Participant 4	1. Innocence, nostalgia 2. Caring about them 3. I feel like this is something parents and children give to each other 4. Innocence, childhood 5. Childhood joy	Innocence, nostalgia Care Parents, childhood, family Innocence, childhood Childhood, joy
Participant 5	1. These are so lighthearted to me 2. We're dating, but like we're not that serious and this is a not serious flower and like you just make me feel happy 3. Friend, first date, dating 4. Blooming, light-hearted love 5. Lighthearted	Lighthearted Dating, happiness Friendship, dating Love, lighthearted Lighthearted
Participant 6	1. Happiness, youthfulness, the boundless energy of nature and the sun. 2. That we are celebrating spring or summer and I want to celebrate it with them 3. They would be a friend or acquaintance 4. Youthfulness and joy above all else 5. Celebration of life and youth	Happiness, youth, energetic, Sun Celebration, Spring, Summer Friendship Youth, joy Celebration, life, youth
Participant 7	1. Optimistic, daisies make me feel almost excited like good things are coming 2. Joy, I'd give these to someone to make them feel happy 3. I'd give these to anyone who needed cheering up 4. Daisies make me think of innocence and	Optimism, excitement Joy, happiness Cheer Innocence, adventure,

	adventure like going exploring when you're a kid, being carefree with daisies in your hair	childhood, carefree
	5. Joy, innocence, nostalgia	Joy, innocence, nostalgia
Participant 8	1. It reminds me of childhood	Childhood
	2. I would give this to my little cousin to say "hey look at this pretty flower"	Family, childhood
	3. Young kids or family members	Childhood, family
	4. Childhood	Childhood
	5. Happiness, childhood	Happiness, childhood
Participant 9	1. Happy	Happiness
	2. Cheerfulness	Cheer
	3. A Friend, sister, mother etc.	Friendship, family
	4. Happiness and allergies.	Happiness
	5. Happiness	Happiness
Participant 10	1. Pleasant, positivity	Positivity, pleasantness
	2. A token of goodwill and friendship	Goodwill, friendship
	3. Friends, colleagues, and anyone who could use some flowers to brighten up their living or working space	Friendship, bright
	4. Moderate joy and upbeatness	Joy
	5. Contentment	Contentment

Appendix OO - Millennial Generation Interviews Flower 7 (Iris)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Intrigued 2. They're fun looking flowers so I'd probably be trying to cheer them up 3. Good enough friends that I would know they're going through something and needed cheering up 4. Optimism 5. Hope	Intrigue Fun, cheer Friendship, cheer Optimism Hope
Participant 2	1. I feel like royalty, power, wisdom, thoughtfulness too 2. I would try to convey that I'm thinking of them or like them 3. I would give this to a friend or girl that I'm interested in because they seem expensive 4. Wisdom and thoughtfulness 5. Wisdom and royalty	Royalty, power, wisdom, thoughtfulness Thoughtfulness Friendship, interest, expense Wisdom, thoughtfulness Wisdom, royalty
Participant 3	1. Another flower that reminds me of respect 2. Honor them 3. Someone I respect 4. Fleur de lis 5. Honor	Respect Honor Respect Fleur de lis Honor
Participant 4	1. Energy, excitement 2. I would want them to get excited 3. A good friend or a loved one 4. Excitement or joy 5. Recharging, energizing	Energy, excitement Excitement Friendship, love Excitement, joy Recharging, energizing
Participant 5	1. Sadness 2. Something bad happened and I care about you and I'm thinking about you 3. Loved one, community member, family of deceased. 4. Condolences or remembrance 5. Condolences or remembrance	Sadness Condolences Family, community, condolences Condolences, remembrance Condolences, remembrance
Participant 6	1. Intrigued by mystery; curious 2. I would be trying to convey a sense of exoticism; maybe I or they just got back from an international vacation 3. We are definitely friends, but we don't have to be super close. This is also a respectful admiration kind of flower	Mystery, curiosity Exotic, travel Friendship, admiration

	4. It symbolizes to me a welcoming, but also a deep sense of respect and maturity.	Welcome, respect, maturity
	5. Respect	Respect
Participant 7	1. Joy, I think they're really pretty	Joy, pretty
	2. Joy, I'd give these to someone to make them happy	Joy, happiness
	3. I'd give these a friend to make them happy	Friendship, happiness
	4. These make me think of royalty	Royalty
	5. Strength, beauty, confidence	Strength, beauty, confidence
Participant 8	1. Nothing too special, seems common but expensive	Commonality, expense
	2. I would send this in like a bouquet for a date or something to highlight the other flowers	Dating
	3. Maybe just like to a date	Dating
	4. Expensive	Expense
	5. Expensive	Expense
Participant 9	1. This one reminds me of my Fleur de lis tattoo	Fleur de lis
	2. Probably would give this to someone who was too proud of themselves	Pride
	3. Someone that felt as though they were higher class than myself that I was trying to get a dig at.	Dishonesty
	4. Royalty, stuffiness	Royalty, stuffiness
	5. Stuffiness, royalty, pride	Stuffiness, royalty, pride
Participant 10	1. Awe, curiosity	Awe, curiosity
	2. Something to brighten their day	Bright
	3. Anyone who happens to like irises or purple or blue flowers or could use cheering up	Cheer
	4. Beauty, cheer	Beauty, cheer
	5. Beauty, cheer	Beauty, cheer

Appendix PP - Millennial Generation Interviews Flower 8 (Calla Lily)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. It looks professional 2. I feel like I would buy this for an office instead of giving them to someone to make the place seem fancy 3. They were probably my boss or admin so clients would see it 4. Sophistication 5. Sophistication	Professional Business, fancy Coworkers Sophistication Sophistication
Participant 2	1. Sadness or mourning 2. I would give it to someone to whom I'm offering condolences 3. I would give it to anyone who is going through a loss 4. Mourning 5. Mourning	Sadness, mourning Condolences Condolences Mourning Mourning
Participant 3	1. A very elegant flower. Pure and beautiful 2. Beautiful 3. Given to a wonderful woman I love 4. Weddings 5. Pure	Elegance, purity, beauty Beauty Love, wonderful Wedding Purity
Participant 4	1. I just think they look pretty 2. I'm not sure, I would just be wanting to give some beautiful flowers 3. They would probably be a good friend or significant other you love 4. Weddings or something pretty 5. Pretty things or something similar	Pretty Beauty Friendship, love Pretty, wedding Pretty
Participant 5	1. Happy but like refined happy, like elegant happy 2. I admire you in a non-love kind of way 3. Mentor, admired one in a non-romantic sense 4. Admiration 5. Elegance	Happiness, elegance Admiration Admiration Admiration Elegance
Participant 6	1. Domesticity, hominess, coziness, but not like a winter day with a fire, like a spring or summer day with the windows open 2. It's a housewarming gift and we're celebrating that 3. I don't have to be close to them, we could just be acquaintances. But we have to be close enough that I care about important changes in their lives.	Domesticity, coziness, Spring, Summer Housewarming, celebration Friendship

	4. A sense of camaraderie and congratulations on a milestone	Camaraderie, congratulations
	5. Domesticity	Domesticity
Participant 7	1. Love or beauty	Love, beauty
	2. Love, I'd give these to someone to let them know I love them	Love
	3. I think I'd be more inclined to give these to a romantic partner. These seem like the flowers you'd give for an anniversary or something	Romance, anniversary
	4. Romantic love	Love, romance
	5. Love, passion	Love, passion
Participant 8	1. This reminds me of my grandma's house because she use to have these all over	Grandmothers, memories
	2. To brighten their home	Bright, housewarming
	3. A friend or family member	Friendship, family
	4. Housewarming	Housewarming
	5. Housewarming	Housewarming
Participant 9	1. This reminds me of my prom flowers	Prom
	2. I would give these to someone that I felt like I had to give flowers to, but I didn't really want to. So, I got them flowers I would not get myself.	Obligation
	3. Prom date maybe. Someone that was attractive but that I didn't really have feelings for.	Prom, attraction
	4. Beauty	Beauty
	5. Beauty	Beauty
Participant 10	1. Complexity and sophistication, artificiality	Complexity, sophistication, artificiality
	2. Show appreciation	Appreciation
	3. I probably would give them to someone who values outward beauty	Beauty
	4. Complexity	Complexity
	5. Complexity and sophistication	Complexity, sophistication

Appendix QQ - Millennial Generation Interviews Flower 9 (Red Tulip)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Reminds me of eating at a restaurant with friends	Friendship
	2. Friendship	Friendship
	3. We would be friends	Friendship
	4. Friendship and probably Spring because you can only find them then	Friendship, Spring
	5. Friendship	Friendship
Participant 2	1. I feel calm	Calm
	2. I would be trying to convey a feeling of peace	Peace
	3. I'd only give this flower to friends	Friendship
	4. Calmness and peace	Calm
	5. Calmness	Calm
Participant 3	1. Easter flowers	Easter
	2. The love of Christ	Love, Jesus
	3. This is what you'd give to your mother on Easter	Easter, mothers
	4. Spring	Spring
	5. Easter	Easter
Participant 4	1. Awe	Awe
	2. I just want to share something beautiful	Beauty
	3. I feel like they're kind of intimate so probably a significant other you love	Love, intimacy
	4. Beauty	Beauty
	5. Beauty	Beauty
Participant 5	1. Happiness and Spring	Happiness, Spring
	2. Lighthearted, I just got these flowers because they reminded me of you	Lightheartedness
	3. Friendship, family member	Family, friendship
	4. A non-serious flower of just like "here's some flowers and they're pretty and its Spring"	Obligation, Spring
	5. Family, friendship	Family, friendship
Participant 6	1. It feels like spring. Like Easter	Spring, Easter
	2. I imagine it would be a gift for them to plant in their garden	Gift, garden
	3. Something you give to neighbors, but we could be closer than that too	Neighbors
	4. Community	Community
	5. A sense of belonging	Belonging
Participant 7	1. Love, something about red flowers seems to always make me feel lovingly	Love
	2. To someone to let them know that I love them	Love

	3. I'd give these to anyone I really care for like friends, family, or a partner	Friendship, family
	4. Love in general. Not specific to any type of relationship, just love.	Love
	5. Love	Love
Participant 8	1. Reminds me of spring	Spring
	2. Happy spring	Spring, Happiness
	3. Family	Family
	4. Spring	Spring
	5. Spring	Spring
Participant 9	1. Reminds me of spring	Spring
	2. Maybe my mom for Mother's Day.	Mother
	3. Mother or other family member	Mother, family
	4. Something new	Newness
	5. Newness	Newness
Participant 10	1. Very happy, pleased, normal spring day	Happiness, Spring
	2. Love and openness	Love, freedom
	3. Friends, family. Platonic and romantic loved ones	Friendship, family, romance, love
	4. Cuteness and happiness. They grow in spring	Happiness, Spring
	5. Happiness	Happiness

Appendix RR - Millennial Generation Interviews Flower 10 (Daffodil)

Participant	Response to Numbered Question	First-level Coding
Participant 1	1. Happy because it is my favorite flower 2. I wish them well genuinely 3. Very good friends 4. Happiness 5. Excitement	Happiness Wellness Friendship Happiness Excitement
Participant 2	1. I feel happy when looking at this one. It feels like a good start to the day 2. I would hope the person had a good day or offer it to them in a time of celebration 3. I would give these to a good friend or perhaps loved one I wanted to surprise 4. Sunshine 5. Great starts, new beginning	Happiness, new start Celebration Friendship, surprise Sunshine Great starts, new beginning
Participant 3	1. Happy, bright, joy 2. Children, Spring 3. This is one you'd give to a child 4. Spring 5. Happiness	Happiness, bright, joy Childhood, Spring Childhood Spring Happiness
Participant 4	1. Peacefulness 2. Friendliness 3. I feel like this flower doesn't have a lot of heavy meaning attached so it would be good to give to anyone to cheer them up or make them happy 4. Childhood, youth 5. I'm not sure what it would mean to other people, it just reminds me of growing up	Peacefulness Friendship Happiness, cheer Childhood, youth Childhood, youth
Participant 5	1. Happiness, sunshine 2. Happiness and happy love 3. Friend, loved one, family member, religious occasion 4. Happiness 5. Happy	Happiness Happiness, love Friendship, family Happiness Happiness
Participant 6	1. Very happy, but maybe just not that sincere 2. You're trying to make up for something you did to them and want to be forgiven, or you just thought of them and wanted to get them for them 3. We would have to be pretty close. Friend, lover, family member 4. An attempt at happiness 5. Reconciliation	Happiness Thoughtfulness, forgiveness Friendship, love, family Happiness Reconciliation

Participant 7	1. Cheer, daffodils feel like such happy flowers	Happiness, cheer
	2. Cheer, I'd maybe give these to someone who was feeling kind of down	Cheer
	3. I'd give these to anyone who needs cheering up	Cheer
	4. To me they just feel like pure happiness, they make me think of warm beautiful days	Happiness, beauty
	5. Happiness and summer	Happiness, summer
Participant 8	1. This reminds me of my mother because these are her favorites	Mothers
	2. I would give these to my mom as a gift like we did as kids	Mothers, childhood
	3. My mom to cheer her up	Mothers, cheer
	4. My mom and picking them with her	Mothers,
	5. Mothers	Mothers
Participant 9	1. This reminds me of warm weather like spring or summer	Spring, summer, warmth
	2. "Happy spring, here's a March flower"	Spring, March
	3. A friend, an officemate	Friendship
	4. Spring and warm weather	Spring, warmth
	5. Warmth	Warmth
Participant 10	1. Calm, pensive	Calm, pensive
	2. A flower that cheers someone up	Cheer
	3. Anyone who needs a bright yellow flower	Bright
	4. Mild tranquility	Tranquility
	5. Mild tranquility	Tranquility
