DESIGN FOR BEREAVEMENT

Nathan Larson
DESIGN FOR BEREAVEMENT

A design thesis submitted to the
Department of Architecture and Landscape Architecture
of North Dakota State University

by

Nathan Larson

In partial fulfillment of the requirements for
the degree of Master of Architecture

[Signature]
primary thesis advisor

[Signature]
thesis committee chair

May 2012
Fargo, North Dakota
# TABLE OF CONTENTS

Non-Exclusive Distribution License ii
Table of Contents iv
Abstract 1
Problem Statement 3
Statement of Intent 5
Proposal 7
Research Results 15
Case Studies 25
Historical Context 39
Project Goals 43
Site Analysis 45
Programmatic Requirements 55
Process 64
Design Solution 76
Project Documentation 71
References 79
Studio Experience 83
Personal Identification 84
This project seeks to explore how the built environment can create a healthy atmosphere for grieving the death of a loved one. By examining psychological research to develop the form of the building, a space can be created to foster closure and community socialization and support.

Keywords: greiving, death, psychology, closure, socialization
PROBLEM STATEMENT
How can architecture be utilized to aid in the process of grieving?
TYPOLOGY: Funeral home

CLAIM: Architecture can be used to help people through the process of grieving.

PREMISES:

The death of a beloved family member or friend is a particularly difficult time which causes many people great amounts of emotional distress.

Ceremonies and rituals are almost always utilized on the occasion of a death in order to offer the survivors a chance to remember their loved one and mourn the loss, (York, 2000).

Throughout the world, there are a multitude of ways different cultures have honored their dead and have sought relief for their sadness.

THEORETICAL PREMISES:

Architecture can be used to help people through the process of grieving. When people are mourning the loss of a loved one, it can be a very difficult period accompanied by great emotional distress. Through the use of good architecture, implementing a knowledge of the psychology of grieving, and understanding the social interaction of the survivors, the space occupied can offer closure and an environment for survivors to socialize and support each other in their grieving.

PROJECT JUSTIFICATION:

In our lives, we will all deal with death. It’s the most difficult and mysterious part of the human experience. I want to explore ways to deal with death in a healthy way that will offer peace to those who have lost someone they love.
THE PROPOSAL
Death is a natural, inevitable part of life, yet it remains an abstract concept. We will never receive an account of what it is like or what happens when it occurs. I think this is part of the reason death is such a troubling ordeal.

The survivors of a person who has died are left with only feelings of sadness, loss, and often insecurity. As a designer, I want to create an environment that fosters feelings of comfort and offers the opportunity for survivors to gather together and help each other come to terms with their loss.

Traditional funerals are performed as a way of formally releasing the deceased into death and for loved ones to say their final goodbyes. They offer the survivors the opportunity to share stories and memories while congregateing together under shared emotions. Funerals are really ceremonies for the people the deceased individual has left behind, so it is with them in mind that I will design.

The space to be designed, a funeral home, should be a place of graceful tranquility. It should offer a dignified atmosphere as it is the setting for the last moments of interaction between the deceased and the survivors.

I will research the history of funeral rites from different cultures to find rituals and practices that have been a part of their grieving processes. Incorporating these findings can provide experiences unlike the typical funerals we have grown accustomed to. Some of the imagery, while typically unseen in our culture, could prove to be very comforting when introduced in the design.

The design should offer some feelings of hope for the survivors. While opinions of an afterlife are not shared by all, the idea gives great comfort to many mourners. In this way, spirituality should be incorporated into the design to suggest a continuation beyond death.

I have been witness to the struggles of many friends and family members as they try to come to terms with the loss of someone important in their lives. It is my hope and wish that I can, through design, aid in their journey of grieving and offer comfort and peace.
USER/CLIENT DESCRIPTION

Owner:

The funeral home will be independently owned by a funeral director or a partnership of funeral directors.

Users:

The building will be utilized by the building staff as well as survivors attending a funeral or prayer service. The building’s staff would include three funeral directors, two funeral assistants, an administrative assistant, and an advance funeral planner. The building’s chapel space will hold approximately 200 people at full capacity. Sufficient parking will be needed for services held in the building allowing enough parking space for a chapel filled to capacity. It would also be important to remember that some of the survivors may be elderly or ill, so ease of mobility should be considered.

MAJOR PROJECT ELEMENTS

Lobby
Chapel
Crematory
Embalming Room
Visitation Lounge
Kitchenette
Administrative Office
Funeral Planning Office
SITE INFORMATION:
The site chosen for this project is a hill on outskirts of Alexandria overlooking Lake Connie.
The primary focus of this project is to produce a space that fosters healthy grieving. This will be achieved through examination of the psychology of grieving and the implementation of those findings.
## PLAN FOR PROCEEDING
RESEARCH DIRECTION:

The research I will carry out will center around the investigation of the sociological and psychological aspects of the grieving process. I plan to pay special attention to the socialization between survivors and how that interaction aids in the act of grieving. The way this interaction takes place should inform the organization of spaces and, ultimately, the design of the building. To become better informed about the typology, I will research funeral homes and learn their history and how they function. A full site analysis will also be performed for the site chosen for the project.

DESIGN METHODOLOGY:

My design methodology will be comprised of both quantitative and qualitative analysis. This mixed method will be guided by the theoretical premise/unifying idea. Graphic and digital analysis will be utilized. Because industry knowledge is very important to a successful project, I will contact and interview local funeral directors and, hopefully, tour their facilities.

DESIGN DOCUMENTATION:

I intend to gather information and store it digitally in an organized file. The documentation will be updated biweekly and made available through the digital commons. The final thesis book will contain all of the essential information and will be available through the library.
The death of a loved one is often a very difficult and emotionally challenging time. Death impacts people of every culture, every faith, and in all parts of the world. It is a universal constant in every society, yet it remains a mysterious and seldom-discussed topic. Most cultures throughout the world approach death in a similar way: by performing a ritual or ceremony to mark the passing of that person who has died.

In their book *Living Through Loss*, Nancy R. Hooyman and Betty J. Kramer, (2006) the authors expanded on the reason for these rituals. Rituals have the ability to bring about the feeling of the sacred from the ordinary. They elevate the level of importance of an activity and make interactions more special. Often, these rituals utilize symbolic acts that can convey a transcendental significance on experiences or certain life events, (Hooyman & Kramer, 2006).

It seems only right that a ritual would be performed at the time of a death. Death is an important marker in the life of a person. This is true not just the person who has died, but also all of those related to the deceased and all of those who have befriended that person. The death of a loved one produces life-changing consequences and the ritual performed marks the significance and importance of that loss.

Typically, the ritual performed for the event of a death is a funeral. The basic function of a funeral is to serve as the rite of passage for the deceased. It is used as a ceremony for the final disposition of the body, (Hooyman & Kramer, 2006, p.221). Funerals have a number of secondary functions as well which are mainly intended for the survivors. Dorothy S. Becvar, (2001) wrote in her book, *In the Presence of Grief*, that a function of the funeral ceremony is also to make an acknowledgement of the loss and pain of those the deceased has left behind. The ceremony facilitates an opportunity for the bereaved to have an open, public expression of their grief, (Becvar, 2001, p. 213).

This public expression of grief within the community also affords an opportunity for a public confirmation
of the reality of the death. This also gives the greater public a platform to have a discussion of life, death, and the effect they have on the community. (Becvar, 2001, p. 213).

Another important function of a funeral is to offer social support for the friends and family of the person who has died. The funeral is a venue where the bereaved can openly discuss memories shared with their loved one. In the process of this socialization, the survivors also begin to redefine their identities with one another. After a death, the bereaved suddenly find themselves to no longer be a mother, father, sister, brother, etc. and their identities will change within their community. Having the ability to discuss these new changes with other community members helps the bereaved person to begin acclimating to his or her new identity and the changed place within his or her society. This socialization reaffirms the social order within that community as these roles change, (Hooyman & Kramer, 2006, p. 221).

For persons of faith or spiritual backgrounds, the funeral is commonly a religious experience. Through the ritual of the funeral, the transition of the deceased from this life to the next is examined and shared. This can serve as a great means of comfort for the bereaved, knowing their loved one’s spirit is continuing on in another realm. The funeral serves to affirm this continuation of life for those who believe in the afterlife (Becvar, 2001, p. 213).

Closure is also a very important function of a funeral. The funeral ceremony, as well as the socialization of survivors within that context, can help the bereaved come to terms with the death and acknowledge the impact that it will have on their lives. Some who might wish to ignore the death or chose not to have a funeral at all may have reasons to act in that way at the time, but research has shown that later this can lead to great emotional distress over the lack of closure with the death. This is often the case with miscarriages or the death of a newborn baby, (Becvar, 2001, p. 216).
The funeral is, without doubt, a very important tool in the process of grieving. It is, however, something that we generally choose not to think about until it is absolutely necessary. Death can be an uncomfortable topic to discuss and an uneasy reality to think about. Because of this, most people do not spend much time thinking about funeral arrangements unless a death has occurred. Even when pre-planning a funeral, most people assume there is a standardized format that is followed; the thought of customization seldom comes to mind, (Becvar, 2001, p. 17).

Dorothy S. Becvar, (2001) argues in In the Presence of Grief that this is the major concern with the modern funeral arrangement. It is assumed that funerals have to take place the same way. Most funerals are very similar and follow a format that is familiar, that is socially accepted, and that follows the norms of our culture.

She continues her argument with the idea that the survivors have little or no part in preparing their loved one for their funeral. In fact, most of the survivors have very little actual contact with the deceased at all after death. They might have visited him or her prior to his or her death and, when they next see the deceased, the setting is often a wake, visitation, or viewing. At this point, the deceased person has been embalmed, made-up, and dressed to appear as life-like as possible. There is little sense of having the true experience of this person’s transition from life to death and, in this way, the survivors do not have the opportunity to have full closure. The lack of closure can add to grief and confusion. (Becvar, 2001, p. 17)

This can also become a factor if there is no viewing of the body before the body is cremated. A picture of the deceased next to an urn containing ashes does little to solidify the idea of death in a way that can offer closure.

The idea was then offered by Becvar, (2001) that the survivors should have the opportunity to play a more active role in the planning, preparation, or ritual of the funeral of their loved one. The ability to
play a role in the funeral helps ease the survivor into an acceptance of the death. It is important to remember that in most cases, the whole funeral process is completed within one to three days. If the bereaved are allowed to take a more active role in this process, that short time will bear more significance and the grieving process will be much more easily understood by the survivors.

The traditional funeral service, whether it be in a religious context, at a funeral home, or a grave-side ceremony, is generally facilitated by a funeral director or a member of clergy. Most times, these individuals were not particularly close to the deceased. Allowing the bereaved to carry a greater role within the ceremony would make the service more personal and would help join together the survivors, (Becvar, 2001).

In regards to the engagement of the survivors in the ceremony as a hands-on way to deal with grief and aid in the process of healing, Dorothy S. Becvar (2001) is quoted:

In terms of the funeral service, family members may choose to take on some of the primary roles in the prescribed ritual or may take responsibility for the creation of a ceremony. And whereas the violation of tradition may at first seem overwhelming, it is important to be sensitive to the degree to which the bereavement process may be facilitated as survivors are able to do something meaningful—to express their caring, feel a sense of control, and engage in a personally fulfilling farewell ceremony for the one who has died. (p. 18)

From this quotation, we can see that the traditional format for a funeral may not always be the best. Allowing for change and variation can open the door to the possibility of new ways of healing and finding closure.
It is more difficult at times to stray from the traditional format of the funeral, but it is worth the added effort. Those more closely related to the deceased have the distinct privilege of offering their services. Their efforts will ensure that the service they plan is befitting the wishes of their loved one while also making sure their work is in the best interests of the other survivors. The are afforded the opportunity to do one last thing, one last action of love, for their departed loved one. This can be immensely beneficial for the process of healing, (Becvar, 2001, pp. 214-215).

The traditional funeral has in most cases proven to be a somber affair, frequently focusing on the finality of death, but it doesn’t necessarily need to be so somber to still remain respectful. In some funeral proceedings, the survivors chose to utilize the idea of celebrating the life of their loved one. This process can take many forms but generally centers around remembering the happy times enjoyed with the deceased and the beloved personality traits that made that person special. Celebrating the life of that person in addition to mourning the loss can be very comforting to those attending the funeral, (Becvar, 2001, 215).

Approaching a funeral in this way can also lead to more socialization between the bereaved individuals who have come to the funeral. Socialization between people mourning the loss of an individual is an important part of the grieving process. There is comfort in knowing others share similar feelings during times of bereavement.

The idea of socialization within the context of a funeral or visitation was researched in depth in the book *Handbook of Bereavement Research*, edited by Margaret S. Stroebe, Robert O. Hansson, Wolfgang Stroebe, and Henk Schut (2002). Their research showed that when a member of a social network dies, the remaining members of that network are organically drawn together. This commonly happens at a visitation or a funeral. It is at these ceremonies or gatherings that the members of that social network will have the opportunity to share their emotions and their memories with each other. While much of this
discussion is typically centered around the one those people are grieving, it is important to know that this social sharing often includes other personal and family histories, (Stroebe, et al., 2002, p. 525).

During this socialization, the survivors will often discuss shared memories. These stories are shared back and forth and serve as a way to make certain those memories and emotional events are not forgotten. By discussing these events and memories with each other, people begin to build a social narrative. In this way they develop a collective memory while also confirming their own personal memories of the loved one who has died.

While this interaction is taking place, an interesting occurrence can be noticed. As people socialize, they may become more emotional and the tone of the socialization generally changes. When strong emotional bonds are present between survivors and intense emotions are shared, those listening reduce their use of verbal mediators. Their responses begin to rely less on words and more on non-verbal comforting behaviors. Commonly seen behaviors are hugging, kissing, or just touching. These actions can be exceedingly comforting for some, much more so than verbal communication. This would suggest that during times when the bereaved are sharing an intense emotional experience, they decrease the physical distance between themselves. People literally come together to comfort one another, (Stroebe et al, 2002, p. 525).

Allowing for this emotional sharing and physical comforting is an important consideration when planning a funeral or organizing a funeral space. To foster these activities will help aid in the process of healing.

The act of socialization following the death of a loved one can help in additional ways. When a loved one dies, the survivor is sometimes left without a partner for socially sharing emotions. It is terribly important for someone mourning a loss to have a person he or she can attach to and develop social
bonds with. The bereaved person needs to have a confidant of some sort to share feelings with as well as observe the way other person is dealing with the loss. This observation of others grieving validates the feelings and emotions felt during one’s own grieving process.

An environment that fosters emotional sharing in a social way can contribute to the forming of new relationships after the loss of a friend or confidant. During this time of socialization, survivors may also find that the activity is useful in maintaining relationships with those within the same social network. The bereaved person will find comfort in those close and satisfying relationships.

The most essential and key aspect of socialization within a funeral setting is finding social support from family or friends who understand the complexity and emotional strain of the situation. Sharing in those difficult times together is a mutually beneficial arrangement for the process of grieving, (Stroebe et al, 2002, p. 527).

Those relationships formed or strengthened during the funeral and visitation are very important for the weeks and months following the funeral. Long after the funeral is finished and the body has been laid to rest, the process of grieving continues. Social support is still a very important part of the grieving process long after the funeral, but there are generally few formal occasions after the funeral to grieve together. This is why it is imperative that people begin socializing and grieving together at the funeral to make social connections that will carry through the remainder of the grieving process.

Following the funeral, the bereaved will return to their everyday life, complete with schedules, patterns, and rituals. One of the most difficult ongoing parts of the grieving process is returning to the repetitive patterns of life and being constantly reminded of the lost loved one. The daily patterns are interrupted multiple times throughout the day. These activities can be as mundane as preparing and sharing meals to events as formal as holidays, (Becvar, 2001, p.18).
Any time a tradition is brought up the deceased person will be missed. It is in these times it is important to maintain those social sharing relationships developed during the beginning phases of bereavement. There is comfort in knowing that others have been grieving too and maintaining contact will assist the bereaved in the continued path toward healing.

When daily life is interrupted by the loss of a loved one, the bereaved is faced with a lack of consistency they had been accustomed to. The comfort of predictability is gone. Fostering a support system within social networks at the time of the funeral can be a way for survivors to help each other develop new patterns and regain some of the predictability and comfort in their world, (Belcvar, 2001, p. 18).
In summary, funerals serve many functions within society. They not only offer a place to bid farewell to a friend or relative, they also allow for the beginning of the healing process.

Through Dorothy S. Becvar’s (2001) research, I have learned that the common, traditional funeral may not be the best option for modern bereavement. We might need to reevaluate how we perform these ceremonies and find a more appropriate method of closure and healing.

Becvar’s (2001) offering of a more hands-on approach to funeral planning would afford people grieving a loss the opportunity to ensure that the deceased’s wishes are met while also allowing the bereaved to prepare a service that would be personal and impactful for the survivors left behind.

Celebrating the life of a person who has died is an excellent way to take the focus off of the finality of death and, in turn, begin discussions within the network of people grieving. Beginning the process of socialization will start forming bonds of trust and understanding that will prove to be very useful in the weeks and months following a funeral. These bonds create a support system that will help people grieving to be able to care for each other during difficult times.
As this information relates to the project at hand, I will need to take special notice of every aspect of the traditional funeral ceremony. I will need to evaluate each of the parts and decide if there is another way it can be done and, if so, how that would be reflected in the design of the building.

The focus on socialization aiding in the process of grieving is something that I will need to take into account. The spaces within the building will need to be designed to foster the idea of community. This community of support and comfort will be solidified by the way people come together.
Meiso No Mori is a crematorium in Kakamigahara City, located in Gifu, Japan. The structure was completed in May of 2006 by Toyo Ito Associates. The crematorium stands as a location for cremations and funerals within the city’s cemetery park, replacing an older structure which served the same purpose.

The spaces within the building are layed out on one floor with a total area of 2,269.66 square meters.

The distinguishing characteristic of Meiso No Mori is the undulating form of the concrete roof. The form was inspired by the rolling hills of the landscape. Indoors, the creative use of light provides an effect intended to produce a spiritualistic quality within the space. The form of the roof creates larger domed areas under the structure that were meant to denote the significance of the spaces they cover. An interesting note about the roof is that the tapered columns holding up the structure also function to funnel rainwater for the process of water collection.

The major programmatic elements consist of the following spaces: green space, driveway, reflecting pond, entrance hall, lobby, waiting room, interment room, valedictory room, furnace room, and administration offices.

(All images from Toyo and Associates, Architects, 2008)
This case is similar to the other two case studies in a few ways. Each of the buildings have the major programmatic elements arranged on the same floor for easy circulation. Another important aspect of these buildings is that each has a distinct path of movement throughout the building that reflects the progression of the funeral ceremony in conjunction with the transition from public to more private spaces.

I found this case study to be different from the others because of its lightness and its sculptural qualities. The other case studies didn’t seem to have the light, gestural quality that Meiso No Mori exudes.

The concept of this project was to connect with the rolling hills of the cemetery park by repeating the forms in the undulating roof. The choice was made to create an environment that brought to mind the idea of spirituality. This was accomplished through the use of glazing and lighting techniques. The building feels very open and has a free, airy spirit about it.
Harju Funeral Chapel
Juha Leiviska

Harju funeral chapel is a renovation and addition project completed by Juha Leiviska in 1997 in the town of Mikkeli, Finland. The original structure was designed by Martti Valikangas in 1937 during the transition from traditional church architecture to modernism. The original structure was devoid of any ornamental styling but focused its importance on scale, proportion, and strict symmetry.

The spaces within the building are laid out on one floor with the chapel in the center surrounded by the supporting spaces.

The beauty of this renovation lies in the use of light and shadow as well as the reinterpretation of a classic building. The original 1937 design utilized verticality as an important concept. The chapel features very high ceilings and tall, thin, vertical windows. The emphasis was on height and symmetry. Leiviska took the existing elements and delicately added his contributions to the building while maintaining the stylistic elements of the original design. The new additions utilize soft, filtered light to wash away the shadows of the room, producing a tranquil and hopeful space for the funeral to be conducted. The new spaces added to the original chapel were placed symmetrically on the site to maintain the original emphasis on symmetry. The chapel is left as the tallest, most important piece of massing with its hierarchy clearly visible denoting it as the most important space of the building.

The major programmatic elements consist of the following spaces: chapel, sacristy, relatives wing, canopy, and belltower.
This case is similar to the other two case studies in a couple different ways. Each of the buildings utilize hierarchy to pronounce the chapel as the dominant, most important space within the building or complex. Another important aspect of these buildings is that each has a path of movement throughout the building, almost formal in nature, that directs the bereaved through the space into the chapel.

I found this case study to be different from the others because of use of an existing structure and the dynamic use of light and shadow. Leiviska used filtered light to clear the front of the chapel of any shadow to create an emotional response of peace for those attending a funeral.

The concept of this project was to create that feeling of peace by symbolically showing the process of redemption. Kairamo states, “Our religion deals with death as a transposition of the power of earthly shadows to light and peace with God.”
Plan to Section

Structure

Massing

Hierarchy

Circulation to Use

Geometry

Natural Light
CASE STUDY 3
Kaze-No-Oka
Maki and Associates

Kaze-No-Oka, the 1997 Crematorium by Maki and Associates, stands in the cemetery park at Nakatsu, Oita, Japan. It serves the city as the principal facility for cremations and funerals.

The total floor area of the building is 2,515 square meters. Spaces are arranged on one level with each significant area of the building separated by space for movement and reflection.

Kaze-No-Oka is unique because of the way it interacts with its surroundings. Maki and Associates designed the funeral complex with the intent that it become like a sculpture within the cemetery park. The forms are geometric but rise from the landscape as if growing there or planted in the surface. Another defining characteristic of the building is the separation of spaces. Each of the major elemental parts of the building is finished in its own, unique material. The spaces are not only differentiated by the material used but also the spacing. Each major space is separated by a path that allows the bereaved the opportunity for quiet reflection as they progress to the next part of the building. The major elements of the building are not only indicated by the separation of materiality, but also by their different heights which reveal the hierarchy of the spaces.

The major programmatic elements consist of the following spaces: funeral hall, waiting area, crematorium, port-cochere, oratory, enshrinement room (where remains are placed in the urn by family members), courtyard, office, and park.
This case is similar to the other two case studies in a few ways. The buildings have a similar progression of spaces, from public to private, with these spaces arranged on one single floor for easy and convenient circulation. This case is very similar to Meisu No Mori in terms of programmatic elements. Both being Japanese buildings, they share a cultural context that would indicate they have similar uses. Although it is used quite a bit differently, this case study is similar to Harju Chapel in its use of natural lighting for emotional effect.

I found this case study to be different from the others because of the choice of materials used. The previous two case studies had lighter materials which were mostly of white or very light color and utilized openings to let in large amounts of light. Kaze-No-Oka makes use of much darker, heavier materials like brick, Cor-ten steel, and concrete. While still punctuated with light, these materials feel stronger and more somber.

The concept of this project was to create a building that looks to be a sculpture in the cemetery park but functions to house a very traditional Japanese funeral ceremony.
CASE STUDY SUMMARY

My search for buildings to analyze for this series of case studies lead me to find seven examples of well-designed cremation and funeral facilities. I selected the three included because they offered the most complete information about the design and functionality of the facilities, but the remaining four have also offered some insight to the realm of funeral and chapel design.

Regarding my theoretical premise, it was important to examine each of these case studies to evaluate how the designer approached the idea of cultural context, socialization, and the aesthetic interpretation of death and mourning.

An important common thread that I found with all of the case studies I examined was the progression of spaces. Although these buildings are located in different countries with different cultural norms and ceremonies for the dead, they each have a distinct path from the public entry to the final chamber where the last rites or funeral are to take place. I find it interesting that no matter the location or religious background, each ceremony has a formality and a similar progression of activities as the body is prepared after death. An understanding of this progression of space will be essential for the development of my thesis project.

The use of light was another common characteristic of the case studies I researched. I found this to be true not only within the ones listed but also others I considered for the analysis. How light (and shadow) can be used within a building can change the whole mood and feel of the space. I was enchanted by the images of the alter space at Harju Chapel and the way the light flooded in from the sides of the apse to illuminate the resting place for the casket or urn. Light is a powerful tool for the practice of architecture and I would like to continue studying its implementation in greater depth as I continue with the thesis project. There is something universally spiritual about light and the feeling it brings to those who occupy a space. It seems only appropriate to research and utilize this tool in a project so closely tied to spirituality and the search for peace.
The sites of the case studies I used play an interesting role in the development of the projects. Two of the case studies are in similar locations, in Japanese cemetery parks. The other case study, Harju Chapel, is an expansion of a traditional 1937 funeral chapel in Finland. I think it is important to consider how each of these sites relates to my chosen site in Alexandria, MN. The project in Finland seems to bear a closer connection with my site because of both climate and context. Much of the population around Alexandria is of Western European decent, so the funeral customs are much more likely to be similar. The inclusion of traditional architecture might also be important for Alexandria, as something radically different from the traditional funeral structures might not be a peaceful environment for local mourners.

While the two Japanese examples might have less in common with traditional American funeral customs, some lessons in healthy bereavement are still available to be learned. The inclusion of an enshrinement room is a very interesting part of the Japanese funeral building. The enshrinement room is where family members place the cremated remains in the urn. My research has shown that those people mourning the loss of a loved one can find comfort in the ability to help that person one last time, even after death. The utilization of this room would allow family members to care for the deceased, which would be especially helpful in the circumstance that he or she had a condition that left the family feeling helpless to aid in the dying person’s struggle. This could be a good way to introduce the idea of socializing by grieving together.

The materials used in the different case studies are varied and follow two different ideas. The first two case studies use light, bright materials. Both of the buildings are primarily white. Meiso No Mori is almost completely encased in glass, making it bright and open. Kaze-No-Oka, on the other hand, uses heavy and dark materials. I think the intent of the designer was to emphasize the use of light in the building. The light is much more sparse than the other two case studies, but the few places it shines through are very dramatic.

Ultimately, these case studies have given me a greater insight to the design of funeral chapels and how they function. They will serve as good references in the development of my thesis project.
There are a number of different ways civilizations have dealt with death and the process of disposition of the deceased. Most common in our society are traditional burial and cremation, but other methods of disposal of physical remains have been utilized throughout history.

A common method of removing the body of the deceased in the Hindu tradition was cremation. The body of the deceased was brought to the edge of the water along the Ganges or other holy rivers. Kindling would be laid out on platforms at the water’s edge and the body placed on top. The body then would be burned upon this platform and the ashes released into the holy river. This practice is still in place through some parts of India today, (Harris, 2007).

Among the most interesting of historical methods of caring for the body of the deceased would be that of medieval Scandinavia. According to old Norse sagas, a common tradition was Viking burials. The people of that culture believed that the land of the dead existed across the ocean. To send their dead to that place, wooden boats would be constructed and filled with tinder. The body was placed in the boat and would be lit on fire. The boat was then sent out to sea to make the journey to the land of the dead. Effectively, the body was cremated and buried at sea, (Harris, 2007, p. 74).

Although burning ships are no longer utilized, burial at sea is still an option today. The regulations for burial at sea are that the body is released into water of at least six-hundred feet in depth and at a minimum of three miles from the coastline. The body is placed inside a metal casket with holes punched in it, which when released into the water sinks rapidly to the bottom. The casket is often also outfitted with concrete weights to ensure quick and proper sinking of the casket, (Harris, 2007, pp 70-71).
Another option for burial at sea is the scattering of ashes. Government rules regulate how and where the ashes can be dispersed for reasons of health and sanitation. The scattering of ashes must occur at a minimum of 500 yards from the coast in California and a minimum of three miles everywhere else in the country. A permit must be applied for so a record can be kept of the burial. Within ten days of scattering the ashes, a completion permit must be filed with the exact location of the scattering accounted for, (Harris, 2007, pp 70-71).

Still, the most common forms of body disposition are burial and cremation.

Traditional burial is a way to present the body of the deceased at the funeral in as close to live-condition as possible. The typical burial, with all costs including the funeral ceremony, costs an average of $10,000, (Harris, 2007, p. 73).

The process of preparing the body for display and, subsequently, burial involves the process of embalming. Embalming removes fluids from the body that would speed the process of decomposition and replaces them with chemicals that help to preserve the tissues until after the funeral is over and the body is buried. Embalming is not required by law, however. Refrigeration is also an option to slow decay. It is less successful than embalming and would require a faster funeral and burial. The body can be stored anywhere with a temperature below thirty-eight degrees fahrenheit to keep bacteria from growing (Harris, 2007, p. 9-10).

The room where embalming takes place closely resembles an operating room. State regulations require a secure environment for the process of embalming, which offers a degree of privacy for the dead. Technicians working to embalm a body wear splash guards over their faces, full length body suits, surgical caps, latex gloves, shoe covers, and gauze masks. The environment is very sterile and efforts are taken to maintain the cleanliness and sanitation of the room.
After the body has been preserved, whether through chemicals or refrigeration, it is typically dressed in clothes owned by the deceased and a cosmetologist applies make-up and styles the hair. The goal is to present the body looking in a state resembling how it looked during life, or as close as possible, (Harris, 2007, pp 9-10).

Cremation is also a very common form of disposal of the body of the deceased. In recent years, it has been gaining in popularity within the United States. This is due in part to ecological concerns and the reduced cost of this method, as opposed to traditional burial. The average cremation, including a viewing, urn, and cremation container, usually costs about $1,800. This is quite a savings over a traditional burial funeral.

In the process of cremation, the body is burned in an incinerator for a time period of about two or three hours at temperatures of 1,400-1,800 degrees fahrenheit. When removed, the remains are sterile and weigh approximately fifteen pounds. The remains contain some bone fragments, so they are placed in a pulverizing machine that reduces the remains to grain-sized fragments. The cremated remains are then placed in a box or urn, where they can either be buried, displayed, or scattered (Harris, 2007, pp. 66-67).

It is important to understand the different methods of body disposition as well as the cultures and contexts from which they originated. Having options available to the survivors of the deceased allows for a more personal and customized funeral experience.
ACADEMIC GOALS

It is my intention to complete a thesis project that showcases the skills I have learned and practiced over the course of my collegiate career. I also hope to be able to learn more and improve my abilities. My hope is to design a building that is current, relevant, and important. In choosing the typology of a funeral home and crematorium, I hope to differentiate myself and create an aesthetic statement that sets me apart from my classmates.

I believe that studying bereavement is a very important idea as death is one of the most uncertain of life’s situations we can experience. I have often forgotten the emotional impact a truly well designed piece of architecture can create. To find a way to positively impact the wellbeing of a person during a difficult and unsettling time is a thought that excites me concerning this profession. This is what I want to exhibit through my research and execution of my thesis project.

PROFESSIONAL GOALS

I have had concerns about whether or not architecture is the right path for me to take with my career. I feel that part of the reason I feel this way is because, until now, the things that I have designed didn’t really represent my aesthetic. The research I have been doing for this project has already refueled my excitement and passion for design. I am looking forward to creating a design that represents me and my visual aesthetic. I want it to be the showpiece within my portfolio, something I can really stand behind.
PROFESSIONAL GOALS

Upon graduation in May, I know that I will find myself entering a job market that isn’t extremely favorable and competing for jobs in a field super-saturated with out-of-work designers. I want to utilize the opportunity I have with this project to refine my skills with the design software I’ve learned and also learn more about new software available to me. I would like to be able to graduate confident in my abilities with the software I will need to know to secure an internship and excel in the field.

PERSONAL GOALS

My personal goals for my thesis project directly involve the quality of work I produce and the way that I produce it.

The projects I have completed so far through the architecture program have not been at the quality that I feel comfortable with. I would like to produce, for my last project as a student, something of the highest quality I can achieve. I need to gain a better understanding of the software needed for this industry if I am going to feel confident, or even comfortable, as I enter the field.

Part of the reason that my previous work has not attained a level of quality that I would prefer is due to the way that I work. I am a seasoned procrastinator and I think this has hurt the final product of the projects I have worked on thus far in school.

I am at a point where I am about to graduate with a degree in architecture but am unsure if I am truly passionate about the field. Until now I don’t think I’ve given myself an opportunity to really enjoy the process of architecture because I rush through things right before a project is due instead of working thoughtfully during the studio time given to create a design that I am proud of. I hope that through this project, I can revive the excitement I felt for architecture when I started 2nd year studio and, hopefully, use that as a means to revive my interest in working in the field post-graduation.
Upon deciding that I wanted to use a lake-front location in Alexandria, MN as my site, I selected four locations to investigate in person. The site I have chosen was the last one I visited and the one best suited for my project.

The site is undeveloped and on the outskirts of the city where growth is anticipated. The way the site is approached is from the east on McKay Avenue S. Woodland Elementary School has recently been constructed along McKay Avenue, just southeast of where the site is located. Between the school and where the site is, a new street has begun to be constructed. It only has been built as far as is needed by the school, but it will eventually continue past the site to the south as the city continues to grow. This road will be the main access for the site. It is expected that as the city expands in that direction, the city’s utility grid will follow to service the site.

Where the new road ends, an old dirt hunting road extends, winding around the hillside across the south edge of the site and continuing to the west. I walked up this road to the top of the hill. While standing on this dirt road, where the future road will be, I looked to the north and saw beautiful views of Lake Connie and the shore on the other side. The view was peaceful and relaxing, just as I had wanted my site to feel.

This hilltop location has a few large, old-growth oak trees that have beautiful branch structures unique to oak trees. I imagine in the summertime they produce a nice shaded area. Behind these trees is an open area that is currently covered with brush and grasses that came half-way up to my knees.

As I walked closer to the waterfront, I noticed an old barbed-wire fence that cut the site from East to west, preventing me from moving too close to the water’s edge. Across the lake to the north, I could see a multi-family development and an assisted living facility.
The water in the lake was calm and clean but, being so much smaller than Alexandria’s other lakes, there was no recreation to be seen. In fact, the entire site seemed nearly untouched by human hands, save for the fence and an old chair, propped up against a tree, aged by years of weathering the elements.

These small human interventions on the land lead me to believe that the area had been used as a private hunting area at some point in its history, but the condition of any human intervention speaks of abandonment. The next section of land to the west along the dirt road had a sign warning about trespassing. That land has yet to be annexed by the city and is still privately owned land, presumably used for hunting. The sign was weathered so that may not be the case any longer.

After surveying much of the characteristics of the site that would be necessary for my proposal, I took out my camera to take some pictures of the site for later use in the project. Even though it was already December 1st, there was no snow and the sky was still blue. It wasn’t until I took off my gloves to use my camera that I noticed how cold the wind was on my bare skin. The elevation of the hill, combined with the openness of the clearing, does little to shelter the site from winds.

It was about 2pm when I visited the site, so it was very brightly lit. The clearing at the top of the hill had no shading features and the shade trees around the edges were bare and let the light shine through. It occurred to me that because the site is higher than the surrounding area, it would receive light earlier and later in the day than some of the surrounding areas.

I left the site in a great mood, knowing I had found a place that was home to the qualities I was searching for. It is located in a convenient location yet has a secluded feeling. There are beautiful vistas of the natural landscape and the calming effects of water. I can envision outdoor spaces that would bear a connection to nature in a very beautiful way while also offering scenic views from whatever structure I design for my thesis project.
TEMPERATURE
HUMIDITY

AVERAGE RELATIVE HUMIDITY

PERCENT

HUMIDITY
AVERAGE PRECIPITATION

<table>
<thead>
<tr>
<th>Month</th>
<th>Precipitation (INCHES)</th>
</tr>
</thead>
<tbody>
<tr>
<td>January</td>
<td>1.0</td>
</tr>
<tr>
<td>February</td>
<td>0.5</td>
</tr>
<tr>
<td>March</td>
<td>1.5</td>
</tr>
<tr>
<td>April</td>
<td>2.0</td>
</tr>
<tr>
<td>May</td>
<td>2.5</td>
</tr>
<tr>
<td>June</td>
<td>4.0</td>
</tr>
<tr>
<td>July</td>
<td>3.5</td>
</tr>
<tr>
<td>August</td>
<td>3.0</td>
</tr>
<tr>
<td>September</td>
<td>4.5</td>
</tr>
<tr>
<td>October</td>
<td>5.0</td>
</tr>
<tr>
<td>November</td>
<td>4.0</td>
</tr>
<tr>
<td>December</td>
<td>3.0</td>
</tr>
</tbody>
</table>

PRECIPITATION
AVERAGE CLOUDINESS

CLOUDINESS
AVERAGE WIND SPEED

WIND SPEED
WIND DIRECTION
SUN PATH
The site is an empty hilltop with no significant topography to alter climactic conditions. There are a few shade trees on the site but no major shadows present. There currently can be observed very little vehicular traffic so the only noise would possibly be a motorist passing on the dirt road located 50 yards to the south.
PARKING
PORTE-COCHERE
ENTRANCE
LOBBY
PUBLIC TOILETS
CHAPEL
VISITATION LOUNGE
KITCHENETTE
PATIO
ADMINISTRATION OFFICE
FUNERAL PLANNING OFFICE
STORAGE
EMPLOYEE TOILETS
HEARSE PARKING
CREMATORIUM
EMBALMING ROOM

SPACES INCLUDED
INTERACTION MATRIX

PARKING
PORTE-COCHERE
ENTRANCE
LOBBY
PUBLIC TOILETS
CHAPEL
VISITATION LOUNGE
KITCHENETTE
PATIO
ADMINISTRATION OFFICE
FUNERAL PLANNING OFFICE
STORAGE
EMPLOYEE TOILETS
HEARSE PARKING
CREMATORY
EMBALMING ROOM

ESSENTIAL
DESIRABLE
NOT NEEDED
First sketches expressing community and socialization
PROCESS
Chapel form exploration
**PROCESS**

Chapel placement

AIR SYSTEM
- Constant air volume
- Multi-zone system

ZONE 1: Public Spaces (Mechanical Room)
ZONE 2: Private Spaces
ZONE 3: Semi-Public Spaces

Cooling Tower: Chimney at rear of building near mechanical room

Mechanical system
PROCESS

Structure exploration
PROCESS

Bird’s eye view
Midterm Design
PROCESS

Front facade
Midterm Design
Lobby view of reflecting pool and chapel
Midterm Design
PROCESS

Corridor to chapel
Midterm Design
PROCESS

Reception space
Midterm Design
DESIGN SOLUTION

Structure & mechanical
DESIGN SOLUTION

Office corridor
Lobby view of reflecting pool & chapel

DESIGN SOLUTION
DESIGN SOLUTION

Corridor to chapel
DESIGN SOLUTION

Chapel interior
DESIGN SOLUTION

Reception space
Design boards

PROJECT DOCUMENTATION
Physical model

PROJECT DOCUMENTATION


http://mcc.sws.uiuc.edu/climate_midwest/historical/temp/mn/210112_tsum.html
http://www.weatherreports.com/?location=Alexandria%2C+MN
http://mcc.sws.uiuc.edu/climate_midwest/historical/precip/mn/210112_psum.html
http://www.topoquest.com/map.php?lat=45.87885&lon=-95.35637&datum=nad83&zoom=2&map=auto&coord=d&mode=zoomin&size=m
http://www.topoquest.com/map.php?lat=45.87885&lon=-95.35637&datum=nad83&zoom=2&map=auto&coord=d&mode=zoomin&size=m
SECOND YEAR
Fall 2006 - Joan Vorderbruggen
Tea House - Fargo, ND
Rowing Club - Minneapolis, MN
Dwelling for Two - Fargo, ND
Spring 2007 - Darryl Booker
Dance Studio - Fargo, ND
Waldorf School - Moorhead, MN

THIRD YEAR
Fall 2007 - Cindy Urness
Wind Energy Research Center - Valley City, ND
Cranbrook Academy Art Museum - Bloomfield Township, MI
Spring 2008 - Ronald Ramsay
Apartment Complex - Fargo, ND
Boutique Hotel - Chicago, IL

FOURTH YEAR
Fall 2010 - David Crutchfield
High Rise/Vertical Community - San Francisco, CA
KKE Design Competition
Spring 2011 - Frank Kratky, Don Faulkner
Urban Design - Williston, ND

FIFTH YEAR
Fall 2011 - Paul Gleye
Mixed-Use Development - Fargo, ND
Spring 2012 - David Crutchfield
Design Thesis/Funeral Home - Alexandria, MN

STUDIO EXPERIENCE
<table>
<thead>
<tr>
<th>Name</th>
<th>Nathan Larson</th>
</tr>
</thead>
<tbody>
<tr>
<td>Address</td>
<td>14 Roberts Street #16</td>
</tr>
<tr>
<td></td>
<td>Fargo, ND 58102</td>
</tr>
<tr>
<td>Email</td>
<td><a href="mailto:nathan.a.larson@gmail.com">nathan.a.larson@gmail.com</a></td>
</tr>
<tr>
<td>From</td>
<td>Wahpeton, ND</td>
</tr>
<tr>
<td>Quote</td>
<td>“Beauty is in the evidence of the process” ~ Brian Dougan</td>
</tr>
</tbody>
</table>