You Need To See It To Understand It

Visualizations on Mental Health
Foreword

Story Of The Research

At the outset of this project, the Fall 2021 Communication Design Workshop team at ID met with Social Works with the stated goal of creating data visualization concepts that might fit within the ecosystem of the My State of Mind initiative. These visualizations were tasked with inspiring new areas of mental health focus, surfacing community mental health insights, and above all adding to the breadth of My State of Mind as a comprehensive mental health resource.

Taking this charge, the team set about establishing the context for the visualizations by conducting a series of interviews with those close to the subject of mental health and young adults. [characterize the interviewees and the perspectives they brought].

Armed with transcripts, notes, and first hand impressions, we then continued the research process by analyzing and coding our documentation into keyworded topic areas that emerged from the answers to our questions. From these keywords and topic areas of inquiry into the world of data visualization was a task that required the team to first individually research the topic areas and then determine the data necessary to relate those areas of interest to Greater Chicago and Cook County.
**Foreword**

### How To Use This Book

As the final product of Social Works and IDs efforts, this book is a collection of data investigations meant to establish an understanding for how different areas of mental health can be interrogated, delivering moments of education, glimpses of new capabilities, and hopefully rooted ideas for new elements to add to and around the My State of Mind platform.

Functionally, ‘You Need To See it To Understand it’ is a narrative of the mental health journey from Self to Social Circle to Community. By organizing the chapters and visualizations in this way we hope to better show where and how these tools can be used as well as what audiences might find them helpful. It is also our goal to suggest that this journey can become a method of progression that ends with communities having a better understanding of their personal health and a level of agency to share this understanding with those around them.

This book is also an index of potential methods of communication that illuminate a select grouping of mental health perspectives for a chosen user.

With this in mind we have created a spectrum of mental health experience on which all of the visualizations live. This spectrum has three primary sections: Myself, My Social Circle and My Community.

Some visualizations have additional links via QR code or hyperlinks to videos that demonstrate interaction. Scan the QR codes using your phone, or click the link to learn more about the selected visualization.
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Introduction

When we look at ourselves, our relationships, our communities, they are layered and complex. People have different questions about mental health and start from different entry and access points into these layers. Our goal is to make this journey more accessible for you to start from any layer.

Mental Health is not a linear process, so through our chapters you might be able to find combinations of engagements that match your needs. With this in mind, we have created a spectrum of mental health experience on which all of the visualizations live. This spectrum has three primary sections:

- **Self (Individual)**
- **Social Circle (Personal Network)**
- **Community (Neighborhood)**

By illuminating these key aspects with information and layered perspectives in conjunction with the My State of Mind platform, we hope to create a pathway toward expressions of empathy and common wellness that can live in the hands of the residents of Cook County.
Every individual health journey starts with the self. Young adults are still learning how to be aware of their needs. Understanding one’s self and one’s own needs allows for openness of improvement and moving forward.

The Self chapter runs the gamut from individual self-exploration to educational diagrams of new self wellness methods. Access to knowledge about mental health, including trauma and symptom information, can help users feel more empowered on their own mental health journeys. Self-awareness helps us to become better decision-makers and gives us more self-confidence. Those who want to gain a better understanding of themselves and their needs can refer to these visualizations and diagrams to gain knowledge about important mental health information that could be directly relevant to them and their lives.

- How do I understand the science behind mental health?
- How do I best take care of myself?
- What resources and support do I have available to me?
- Is there a term for what I am feeling?
Warning Signs of Mental Disorders Common in Young Adults

Author: Sue Kim, Sun Park

Description
An interactive board showing the early signs and symptoms, and its suspicious-able mental health disorders. Six disorders are mental disorders which are commonly happened to young adults.

Intent
Although it is critical to realize and diagnose mental health issues at an early stage, it is easy to ignore the common and light symptoms which might be signals for the early stage of the mental health issues. This board can be a chance to self-check the mundane behavioral, psychological, and physical symptoms, and to see what would be the possible mental health issues they might have suffering and may lead to consider asking help from mental health service providers.

Use Case
This board can be accessed via Social Works’ website or be distributed to student groups so that they can try to play and see if the symptoms they have overlooked can be the signals of needing help from mental health services.

Data or Research Needed
Mental disorders’ early-stage symptoms and signals that can be easily ignored.

Scan or click to see interactive data visualization

QR Code
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You're Not Alone

Author: Sami Cohanim

Description
An interactive dashboard with statistics, videos, social media campaigns, and links to resources all related to mental health and support.

Intent
This dashboard is meant to allow those struggling or interested in mental health to have a place to go to feel less isolated by hearing the stories of others and being able to educate themselves on facts and resources.

Use case
This dashboard can be accessed through SocialWorks' website so that those struggling or looking to learn more have one place to go with aggregated information.

Data or Research Needed
Pull live YouTube videos and Twitter hashtags, and recent mental health data.
Understanding My Brain

Author: Gauri Bhatt

Description
An interactive visual, to understand mental health and different mental illnesses, the functions of the different parts of the brain, parts of the brain the illnesses affect and thereby the consequential symptoms of the illnesses.

Intent
Mental illness is a biologically based disorder of the brain. Providing accurate information about mental illness, the cause and affect, is one of the ways to reduce stigmas about mental illness. Having this kind of knowledge has the potential to transform how mental illnesses are viewed and treated.

Use case
This interactive visualization can be incorporated into the SocialWork’s website as an educative tool for all age groups to gain scientific information about mental health causes and its affects on the brain.

Data or Research Needed
Scientific research to accurately display the parts of the brain affected by mental illnesses, percentage of brain affected, and, the correlation between the functions of the brain and the symptoms of mental illness based on the part of the brain affected.

Scan or click to see interactive data visualization

Functions of the brain

Which part of the brain is affected?

- Depression
- Bipolar Disorder
- ADHD (Attention deficit hyperactivity disorder)
- Panic Disorder
- Schizophrenia
- PTSD (Post traumatic stress disorder)
- Anxiety

What are the symptoms?

- Depression
  - Loss of interest and appetite. Not feeling like eating, drinking, sex
- Bipolar Disorder
  - Mood swings. Loss of concentration, Appearance
- Schizophrenia
  - Hearing voices, Hallucinations, Thought disorder
- Anxiety
  - Anger, irritability, and fear. Unable to think clearly
- PTSD
  - Inability to think clearly. Not able to think normally
- Panic Disorder
  - Decreasing blood flow to the brain, Thinking changes in the body
- Alzheimer’s Disease
  - Local Memory

ADHD (Attention deficit hyperactivity disorder)
- ADD
- Hyperactivity
- ADHD
- Executive dysfunction
- Emotional detachment

PTSD
- Posttraumatic stress disorder
- Frightened, helpless, depressed, suicidal
- Emotional detachment
- Inability to think clearly

Panic Disorder
- Decreasing blood flow to the brain
- Thinking changes in the body

Addictions
- Lack attention, Decreased coordination
Effective resources that are commonly used

Authors: Kavya Rai & Urvi Bidasaria

Description
This Visualization compiles the different kinds of aids that exist for a Young Adult, as well as their effectiveness. With the help of this, experts across Cook County can collectively recommend aids they believe are the most useful for those seeking information surrounding Mental Health resources.

Intent
This visualization helps address the questions surrounding:
- How might we communicate that various forms of help, with regard to improving one’s mental health, exist and are available?
- What forms of help are recommended (or available) for young adults? How might young adults be made aware of these different forms of help?
- Could this awareness help distinguish self care from medical help?

Use case
Accessible through a digital platform that would be hosted by My State Of Mind; and shared to young adults via service provider websites, virtual school forums, and community forums.

Data or Research Needed
An active data set that collects and combines recommendations from Mental Health Experts and Service providers across Cook County. This data set would be actively updated as experts input their recommendations on the live platform.

What kinds of support do I have available to me?
Select a resource to learn more

- Medication
- Trauma Resilience Model
- Cognitive Behaviour Therapy
- Eye Movement Desensitization and Reprocessing
- Trauma Releasing Exercises
- Mindfulness-Based Cognitive Therapy
- Find a support group
- Spend time with others
- Seek Help at a Trauma Treatment Centre
- Volunteer
- Don’t isolate
- You don’t have to talk about the trauma
- You don’t have to talk about the trauma
- Ask for support
- Validate your experience
- Eat a well-balanced diet
- Allow yourself to feel what you feel when you feel it
- Breathe Slowly And Deeply
- Try to exercise for 30 minutes
- Participate in social activities
- Reconnect with an old friend
- Get plenty of sleep
- Avoid alcohol and drugs
- Use The “Window Of Tolerance”
Click Speech Bubbles to Listen to Stories

Color Code: How severe the symptom is?

Severe:  ⬇️  ⬇️  ⬇️  ⬇️  Gentle

I have nothing to be depressed about
I feel guilty about being depressed
I’m feeling lonely
I can’t get out of bed
I want to die
I can’t get over things that happened in the past
I don’t want to leave my room
I can’t sleep
I hate myself

Mental Disorders or Conditions

- Depression
- Anxiety
- Addiction
- Eating Disorders
- PTSD
- Bipolar
- Psychosis

Stories about Living with Mental Disorders

Author: Minyi Zhang

Description
This information visualization mapped out audio stories living with symptoms when having commonly known mental disorders or conditions. Audio stories are color-coded based on the severity of the symptom. Users can click the speech bubble to listen to stories.

Intent
The story is powerful. Listening to real-life stories about living with different mental disorders can raise people’s awareness and empathy. It’s also a great education about gentle to severe symptoms of commonly seen mental disorders. Thus, when people notice people around them or themselves are having these symptoms they can take action to help others or themselves timely.

Use case
This information visualization can be used in SocialWorks digital platform to educate users about diverse mental disorders.

Data or Research Needed
- Typical symptoms of pervasive mental illnesses in America
- Code the symptoms from gentle to severe
- Audio recorded interviews, stories, focus group discussion about different symptoms

Scan or click to see interactive data visualisation
Tracking My Music History

Author: Aamena Ansari

Description
Music sets the tone of our lives, and the young adult population understands this intuitively. This tangible music log encourages our YAs to be self-reflective, and have a way to look back at their days and weeks with a higher awareness of their experiences. This tracking journal is meant to support personal and group reflections, that can contribute to communal mural planning, or however else the community wants to see themselves in the world.

Intent
This music log will help YAs reflect on:
- What cultural messages do I engage with?
- How does that impact my day and mood?
- What language or imagery can I use to express my ideas and experiences with myself and others?

Use case
Booklet is shared by My State Of Mind in community events. Followup meetups that are loosely facilitated where individuals can share out, and commonalities or themes are found. If desired by contributors, this info could become a mural, or graphic to reflect on together.

Distribute
Share pocket journals during a MIDM event. Encourage young adults to carry it with them for a week, tracking what they’re listening to.

Track and reflect
Young adults track music and mood. Create a key of symbols that resonates with them to note their mood during songs.

Regroup and share
What was it like using the journal for a week? Did participants notice anything new about themselves?

Merge
What different music keywords and vibes appeared for everyone in this week? Any patterns showing up?

Envision
What could a community mural with this new information look like? Is it a word map? Icons or colors representing vibes that came up?
Trauma symptoms & coping methods for self awareness and management

Author: Ruohua Huang

Description
This interactive infographic shows typical trauma symptoms and provides some methods for managing trauma. It allows the user to identify symptoms and then mix and match some coping methods based on personal preferences. The "Show more" and "Find one" take the user to external resources for further learning and seeking help.

Intent
- To help increase self-awareness by knowing trauma symptoms.
- To learn some trauma coping methods for self-managing and healing processes.

Use case
Use for young adults to become self-aware of trauma symptoms and be able to have a selection of trauma coping methods to react to.

Data or Research Needed
In-depth research about Trauma symptoms & coping methods with mental health professions

Scan or click to see interactive data visualization

QR Code

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How can I help myself or others overcome traumas

Author: Kelvin Yu

Description
A tool helps people diagnose different types of traumas and provide different types of resources and services to deal with this mental issue.

Intent
Requiring the right and adequate resources and services play a vital role in overcoming mental health issues. This visualization is meant to show the connection of what kind of service can provide when people encounter different types of trauma.

Use case
This visualization can be used as a tool on the Internet. People can leverage it by themselves or for family members and friends suffering from mental health issues. It can provide guidance and help from the physical health service provider and online tutorial.

Data or Research Needed
All kinds of services and activities can provide by health service providers.
Chapter 2

My Social Circle

The Social Circle is the network surrounding self that gives us our resilience. Social circles are essential for maintaining healthy mental health. Relationships with friends and family can play a huge role in our mental wellbeing as they provide support, primarily emotional support, along with upliftment and optimism.

Data visualizations could be beneficial in better informing those around the young adults (YA) such as parents, family, friends, and peers that form their social circle. Many members of their social ecosystem are not well-informed on how to help them with mental health issues. These data visualizations could be used to analyze behaviours and reactions of young adults dealing with mental health problems. It would assist the members of the social circle to identify intervention points to help the young adults cope and take appropriate action.

The Social Circle Chapter explains how social circles could be considered as a safe space for young adults to discuss mental health issues, share thoughts and feelings, and receive support. As individuals, we are more open to conversations on mental health when we relate to the people involved. Therefore, educating oneself and the social circle will help reduce stigma around mental health and improve ongoing care for young adults. Change takes place through the process of sharing one's vulnerabilities and leads to individual and collective wellbeing.

- How do I best help those that I regularly interact with?
- How can I emotionally support the people closest to me?
- How do I build safe spaces and conversations to support my social circle?
- I want to be there for my friend, but I don’t know how? What can I do?
How can I help as a parent?

Author: Kayya Rai

Description
What forms of information would be beneficial to those who are close to and care for a young adult? Since many parents/guardians are not well-informed on how to support someone with mental health issues, this visualization collates all the information that they can refer to. By using this visualization to filter out the behaviors and changes that a parent has observed, they can take appropriate necessary action.

Intent
- To better inform a young adult’s ‘close circle’ on how they can support someone going through mental health issues
- To build a connection between daily, mundane actions and clinical terms associated with mental health
- To provide a first step to a solution/remedy that they can offer immediately

Use case
Can be made available as a digital tool as well as a static mural (in public spaces like parks, clinics, etc) and can be used by:
- Parents noticing changes in their teenager’s behavior and actions, who want to learn how they can support their child
- Close friends who want to learn more on how they can be there and be present for their friend

Data or Research Needed
Data listing common behaviors associated with mental health terms that are frequently experienced by young adults

My teen is...
- anxious around others
- experiencing a loss of appetite
- having trouble sleeping
- in their room all the time
- experiencing drastic changes in energy
- not interested in going to school
- not eating
- having thoughts of suicide
- less motivated
- self-consciousness in public

It might be
- Depression
- Anxiety
- Social Phobia

How can I help?
- Outdoor activities
- Anger management techniques
- Movie night with friends
- Consulting with your doctor
How to Have a Safe Conversation

Author: Elizabeth C. Engele

Description
A guide to language to use at certain points in the conversation and general non-verbal tips to help others feel safe.

Intent
Conducting safe or hard conversations is a skill. This visualization is meant to equip viewers with terms and tips that they can use to get what they need in conversations and help others feel respected.

Use case
This visualization can be used as a mural in a high school hallway or classroom, where viewers pass by often so that they can remember the tips and terms when having future conversations.

Data or Research Needed
Secondary research on tips and terms needed to have a safe conversation.

How to have a Safe Conversation

A Guide to Language & General Tips

Practice in front of a mirror or write down points ahead of time if you think you might get nervous.

Think about what you need beforehand.

Expectation Setting

Opening Up

Clarifying

Affirming

Agreeing

Ending or Revisiting

Make eye contact.

Consider tone. Try not to sound negative or arrogant.

Ensure peers feel respected for contributing.

Allow & encourage everyone to speak.

Address others by name to help them feel that they matter.

Don’t expect someone to change their behavior or completely agree with you.

If you are going to criticize, critique ideas, not people.

This is a debate, not a fight.

Some takeaways I have from this conversation are…

I am afraid that if we continue talking about this now, we could say things that hurt each other.

Thank you for engaging in that with me.

Thank you for sharing!

Are there any circumstances that would make you consider…?

What do you think of this?

Tell me more.

Let’s bring this back to the goals we originally set.

Where are you struggling?

I really like what you said about…

I know we both care about…

I really like what you’re saying.

You must have felt… when…

So what I hear you telling me right now is…

I need to talk to you about something; it’s not comfortable to share.

My goal for sharing this is…

I would like…

I think…

I feel…

Through vulnerability, I think we can create a positive outcome.

Use “I” statements instead of “you” statements.

Author: Elizabeth C. Engele
How to build a Safe Space?

Author: Arijit Patra

Description
The visualization shows the process of setting up safe spaces for the discussion of mental health issues by their demographics. The visualization is in a network format which lets you explore and understand the relationships between the elements.

Intent
Safe space is an integral part for facilitating conversations on mental health, however, the instruction of setting up one is hard to find. This visualization becomes a guide to setup safe spaces for anyone interested in it and MSDM can curate the knowledge base on this.

Use case
This visualization can be used to show how to setup safe spaces for mental health conversations to institutions or organizations like schools, community centers intending to do so for the young adults.

Data or Research Needed
The data for this visualization can be generated through the process given below the visualization. It is primarily based on participants’ feedback and voting. The current constituent elements of safe space example shown here is based on the interviews with experts, however, it can change based on new findings during the research.

Network Diagram Visualization

Coming up with the Data for the Visualization

Description
A network visualization is a powerful tool for exploring and understanding the relationships between elements. The network diagram starts with a simple question and gradually takes you through the process of understanding the various components involved in setting up a safe space for mental health conversations. Each element is connected to other elements through lines, which represent relationships and dependencies. The visualization provides a clear overview of the process, making it easier to understand the complex interactions involved.

Use case
This visualization can be used to guide institutions or organizations in setting up safe spaces for mental health conversations. It provides a framework that can be adapted to specific contexts and needs.

Data or Research Needed
This visualization is based on research findings and feedback from participants. The data gathered through interviews, surveys, and other methods can be used to refine and improve the visualization. The visualization is a dynamic tool that can be updated as new insights and information become available.
Community encompasses people you relate or connect to but may or may not interact with, including those in your neighborhood. Community mental health has a deep rooted history in Chicago that is continuing to evolve to this day.

These visualizations provide tools for understanding mental health within communities on a macro level. Learning the history of mental health and the events that shaped community mental health care in Chicago can be beneficial for understanding how the mental health space and resources got to where they are today.

Additionally, specific Chicago neighborhood information reveals how different communities have been impacted and the factors contributing to care in those areas.

The Community chapter can provide clarity on the state of one’s own or nearby communities to provide a sense of connection and understanding. The information presented here provides context for Cook County’s mental health makeup and can have influence on new engagements with all residents and communities. While our past does not totally define us it can be a powerful gateway to empathy.
Chapter 3
My Community

- What resources are available in my neighbourhood?
- How does my neighborhood’s available mental health support resources compare to other Chicago neighborhoods?
- What is the history of mental health-related issues and support in Chicago?
- Has Chicago’s perception of mental health evolved over time? In what ways?
- How does my neighborhood respond/react to the topic of mental health?
Chicago Mental Health Service general info

Author: The class

Description
This Tableau data visualization maps out per capita income based on zip code and geographic data of mental health service providers and their general information (location, clinic name, phone number, zip code, language spoken, free service or not) in the Chicago area.

Intent
- To provide the basic service information of the Mental Health clinics (contact info, language spoken, free service or not)
- To see the relationship between area per capita incomes and distribution of mental health service availability

Use case
- Use for patients(youth) to gain information about mental health service available in Chicago area
- Use for mental health counselor to recommend clinics that meet patients(youth) needs
- Use for the local government to see the relationship between economic distribution and mental health service availability.

Data or Research Needed
Keep data up to date
Chicago Mental Health service availability

Author: The class

Description
This visualization informs the clinic that is accepting new patients. It shows information on which areas currently have the most clinics that can accommodate new patients, and which areas have the most shortages.

Intent
To show mental health service availability in Chicago.

Use case
- Use for youth to find service providers which can accept new patients.
- Use for state/city government to consider future funds for provide mental health service.

Data or Research Needed
Keep data up to date.

2018 Per Capita Income
- $21,100
- $24,000 to $29,900
- $29,800 to $37,200
- $37,200 to $46,100

Accepting New Participants
- Yes
- No
Price range with respect to mental health services provided and zipcode clustering

Author: Ujjwal Anand

Description

This Tableau generated treemap shows mental health service price ranges to help understand the common pricing and anomalies among all the service providers in the data set. It also shows the cluster of service providers within zip codes. The areas separated by thin white lines but within thick white lines belong to the same zip code.

Intent

The intent of this visualization is to uncover the variations in price range across all available service providers from the data set and also see which zip codes have more concentration of service providers and which have less. This helps us understand critical aspects of service providers distribution and find potential points of intervention in areas which have lower concentration of service providers.

Use case

• Use for youth to gain information about mental health service price in Chicago area and know the range of the price they can afford to
• Use for government department (i.e. Chicago Department of Public Health – Division of Mental Health / Illinois Department of Human Services- Division of Mental Health (DMH) to understand the accessibility & affordability of mental health services in Chicago and understand gaps in distribution of services.

Data or Research Needed

To take this visualization further we can include the flexibility in charging fees that service providers on an individual level with the care receivers. Therefore further data can be collected on what amount is exactly being charged from patients by the care providers.

The Price range with respect to Mental Health service Provider and grouping based on zip code

Sum of Price Min, service provider name (All fields data: MSM 05/23/2021; Ti accepted - All fields data: MSM 05/23/2020 (2) (1).csv) and sum of Price Max. The marks are labeled by sum of Price Min, service provider name (All fields data: MSM 05/23/2021; Ti accepted - All fields data: MSM 05/23/2020 (2) (1).csv) and sum of Price Max. Details are shown for Zip. The view is filtered on Zip and Exclusions (service provider name (All fields data: MSM 05/23/2021; Ti accepted - All fields data: MSM 05/23/2020 (2) (1).csv),Zip). The Zip filter has multiple members selected. The Exclusions (service provider name (All fields data: MSM 05/23/2021; Ti accepted - All fields data: MSM 05/23/2020 (2) (1).csv),Zip) filter keeps 3,512 members.

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**Chicago mental health service in relation to public transportation (CTA bus)**

**Author:** Sun Park

**Description**

The location of bus stations play a significant role in the accessibility of mental healthcare providers. Lack of bus stops nearby the service locations poses a potential barrier for some patients. This map could help the participants get to the right clinic and the local government to optimize the resources and distribution of mental health services.

**Intent**

To provide information on how accessible the clinics are by public transportation.

**Use case**

- Use for youth to find which clinics are accessible by CTA buses and which buses can take them to service providers.
- Use for the government - The Chicago Department of Planning and Development (DPD), i.e. Chicago Department of Public Health - Division of Mental Health / Illinois Department of Human Services - Division of Mental Health (DMH) to understand the relationship between public transportation (bus, trains) and locations of mental health services.

**Data or Research Needed**

Keep data up to date
Chicago mental health service in relation to outdoor public spaces and public transportation

Author: Kavya Rai

Description
The CTA & Chicago public parks play a significant role in the accessibility of mental healthcare providers. This map can help participants identify and get to the right clinic via public transportation, and see the relationship between public parks, trains, and mental health service locations. When looking into the space of mental health, the involvement of the government or legislation (whether it’s at a city, state or national level) plays a large role in building awareness surrounding the topic. Not only does this reduce stigma over time, but also creates a sense of accountability when it comes to upkeep and maintenance of these public spaces.

Intent
- To provide information on how accessible the clinics are by public transportation
- To see the relationship (proximity) between public parks, trains, and mental health service locations
- To introduce an additional sense of accountability at the government level

Use case
- Use for therapist to combine certain physical activities to a patient’s treatment (e.g., go for a 5 min walk in the park)
- Use for patients who are looking for a relaxing outdoor space
- Use for government (The Chicago Park District) to see if future sponsors are needed for public places and mental health

Data or Research Needed
- Mental Health clinic and service providers location
- Public transport network (route + stops) throughout Cook County
- Public space locations throughout Cook County
Chicago mental health service in relation to public school

Author: Sue Kim

Description
This visualization shows access to mental health clinics from public schools in Chicago, and provides information on whether students are in an environment with easy access to mental health services. Also, by providing information on whether free services are around, it is also possible to know whether students in various environments can receive the necessary mental health support.

Intent
- To provide information which public schools have enough mental health clinics near by
- To provide information on whether free mental health clinics available to students are accessible near public school

Use case
- Use for youth to find which clinics are available around public schools in Chicago
- Use for service providers to think about future locations for mental health services

Data or Research Needed
Keep data up to date
What is a “Safe Space”?

Author: Elizabeth C. Engle

Description

The term “safe space” can be interpreted differently depending on what context you’re in and who you’re talking to. Each of the three layers of the data visualization share different depictions of what the term “safe space” means.

Intent

With more of an understanding on what a safe space means to different populations, youth educators and leaders can create appropriate safe spaces for those they are working with. For example, it may be too difficult to create a “brave space” (Layer 3) for someone who views a safe space purely as a place of refuge (Layer 1).

Use case

Teachers, guidance counselors, after school club leaders are given this visualization in a pamphlet at the beginning of the school year and can use it as a reference point when discussing safe spaces.

Data or Research Needed

Secondary research was conducted on how different communities define safe spaces.

Key

Physical
Emotional
Developmental

Quotes that contain multiple colors across multiple categories.

What is a “Safe Space”?

The term “safe space” represents different things to different people. To the most vulnerable, a “safe space” represents a physical place of refuge. As young people get physical and emotional needs met, a “safe space” might moreso represent a space for learning and growth around different, sometimes controversial, ideas.

When using the term “safe space,” it is important to know how your audience might interpret the term so that you can speak to their needs and create a space that is appropriate for their safety needs.
Characteristics for effective Safe Spaces building

Author: Ruohua Huang

Description
This diagram shows key attributes of an effective safe space for youth to engage in community and mental health topics. And it contains further explanations for each attribute to guide the actions for building safe spaces.

Intent
- To draw out characteristics for an effective safe space.
- To help understand the meanings of safe spaces from youth and mental health expert perspectives.

Use case
Use for youth community leaders to reflect on their current community structures and think about areas for improvement.

Data or Research Needed
Safe space definitions by Young adults & mental health professionals

Characteristics for effective Safe Spaces building: 
- Open
- Close
- Accessible
- Provide Opportunity
- Share vulnerabilities
- Trust, honesty, genuineness, responsibility to each other
- Be open-minded. Stay open to change and be ready to adapt
- Build Trust
- boundary management: guidelines for managing emotional & professional boundaries between peers, staff/volunteers
- Authentic
- Resilient and accepting of others’ opinions and differences
- Inclusive
- Be brave to share vulnerabilities
- Physical space: The location should close youth
- Digital space: content & information should be understandable to all

It’s not easy for young people to talk about these things. It’s also not easy to hear these things.
- Mental health
- It’s not easy for broad perspectives to talk about these things. It’s also not easy to hear these things.
- Mental health

Fall 2021 + IIT Institute of Design + SocialWorks + Mental Health Data Visualization Project
Medicaid Accepted Mental Health Clinics in the City of Chicago: Wall Poster

Author: Sue Kim, Sun Park

Description
This booklet shows the information on how many Medicaid-accepted clinics are located in which areas of the city of Chicago and what specific specialty care they offer. All the mental health care programs provided by clinics are categorized into seven specialty types, and the total number of those are shown per community, respectively.

Intent
Medicaid accepted mental health clinics are critical to providing more people with the opportunity to get the care they need. Unfortunately, it is not easy to find the appropriate clinics for Medicaid holders. By using this portable booklet, Medicaid patients can find affordable and needed specialty care, and mental health counselors can guide them.

Use case
Mental health counselors in public schools or organizations can use this book to provide clinics’ information to young adults and other patients.

Data or Research Needed
Confirm with mental health clinics about the care program specialties, whether they are still accepting Medicaid insurance, and their location to accurately show the information.
Medicaid Accepted Mental Health Clinics in the City of Chicago: Wall Poster

Author: Sue Kim, Sun Park

Description
This board includes information comparing the distribution of young adults living in Chicago, the per capita income of each community in Chicago, and the location of mental health clinics. Additionally, it shows which type of specialty care is being provided most and least in the four Chicago areas, respectively.

Inten
People can know the current distribution of the overall mental health clinics in four Chicago areas. By comparing the locations of those clinics, the young adult population, and the per capita income of each community, they can get information about which areas need more clinics.

Use case
This data can help policymakers understand which neighborhoods may need more mental health clinics for young adults, low-income people, or specialty care and aid them to make effective decisions.

Data or Research Needed
Confirm with mental health clinics about the care program specialties, whether they are still accepting Medicaid insurance, and their location to accurately show the information.

This map shows the number of young adults living in each Chicago neighborhood and the locations of Medicaid accepted clinics. People can get information about which neighborhoods need more Medicaid accepted mental health clinics for young adults.

Individual Support Care
Individual psychiatric care regarding guidelines, strategies or educational purposes.

Young Adult Focused Care
It is a care focused on young adults who are suffering from mental health problems due to personal relationships, academic achievement, job search, etc.

Group Support Care
With varying formats of group support including teleconferences, face-to-face meetings, and workshops, the treatment brings together several people with similar conditions under the guidance of a care provider.

Psychogenic Illness Care
Care aims to help patients to handle stress, manage relationships, treat depression and make choices.

Biological Illness Care
Treatment of internal cause problems focuses on biological factors such as genes or brain chemistry.

Trauma-Focused Care
A specific approach care that know how the traumatic experience impacts a patient’s emotional, physical, mental, behavioral, and spiritual well-being.

Addiction Care/Rehabilitation
Treatment of internal cause problems focuses on biological factors such as genes or brain chemistry.
Mental Health Issues and their symptoms

Author: Ujjwala Anand

**Description**
Mental health issues can be highly deceptive because it's not evident most of the time. Hence it's essential to understand the nature of its symptoms and predict situations from the behaviour and lifestyle of the individuals. The data and information on Mental health is highly fragmented and not well understood and hence this visualisation fuses and consolidates the information related to mental health issues.

**Intent**
This visualisation intends to uncover patterns by putting the mental health disorders in a chronology based on prevalence in the United States as well as simplify the understanding of mental health categories and its symptoms by building relationships between them. (Refer link on extreme right to see relationships between disorder and symptoms).

**Use case**
This visualisation can be used by anybody ranging from care providers and counselors, all the way till individuals who are suspecting mental health issues. It could be used by parents and friends of individuals who are showing signs of mental health issues to intervene proactively before the symptoms aggravate. Hence this visualisation becomes an effective tool to address mental health awareness and education.

**Data or Research Needed**
Current the chronology has been created based on data gathered from different sources (both government and non-government). To make this visualisation more accurate a research to assess the prevalence of mental health issues in the USA needs to be conducted and also studies to understand the most common mental health issues among the teenager children and elderly can be done.

This visualization shows the most prevalent mental health disorder among the US population in a chronological order. To understand the presence of disorders categorically one can refer to the image below, which shows which disorders are most prevalent among the teenage population.

This visualization shows the most common disorder among children. To get further details of the percentage of the US population affected by these disorders and what are the relevant symptoms, one can refer to the image on the bottom right.

This controller helps you sort the mental health issues categorically between general prevalence of the issues, issues which are most common among teens and the ones which are common among the old age population.
Health of a Neighborhood

Author: Urvi Bidasaria

Description

This interactive visualization is a tool for assessing a neighborhood. Social and environmental factors have an impact on mental health and illness. As a result, this visualization is an attempt to comprehend environmental aspects in Chicago’s top 10 most vulnerable neighborhoods in order to evaluate their well-being over time.

Intent

This visualization aims to unravel multiple layers of what makes a healthy community, and poses concerns such as:
- Have there been enough job investments in the recent decade?
- In this neighborhood, how many high school graduates live?
- Is public transportation available in this neighborhood?

Use case

This will be used by a variety of mental health service providers, clinicians, and government authorities to make essential interventions in these neighborhoods.

Data or Research Needed

Data describing environmental elements that have an impact on mental health. Statistics on crime rates, sexual abuse, drug misuse, poverty, and the causes of the aforementioned...
**Sentiments in Music Streams Across Neighborhoods**

**Author:** Aamena Ansari

### Intent

This approach is intended to start conversations on influences on our inner lives. Music is something we share with others, but also that influences us in our time alone. The intent is for music and the sentiments found in it to be an avenue through which to talk about emotional or reflective experiences.

### Use case

After compiling neighborhood stream data, this visualization is best shared openly. Painted as a mural along roads in the communities featured, on the side of a popular restaurant, common meeting ground, safe space, or other prominent spots.

### Data or Research Needed

Music streaming data from YouTube, Spotify, Amazon Music, and other platforms localized to neighborhoods. What color key connects best with the young adult community?

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### Description

Music streaming data is collected by neighborhood, and coded for the sentiments that come up through lyrics. This is used to help reveal the tones and messages shared within communities as a way to engage in how those sentiments show up in individual and communal lives.

#### AUSTIN 2019

- **Mellow Ace**
- **J. Cole**
- **Travis Scott**
- **Sheck Wes**
- **Dreamers & Nightmares**
- **Chicago Sonshine**

#### BACK OF THE YARDS 2019

- **Streets**
- **Monaco**
- **Snoop**
- **Denzel Curry**
- **Tyler, The Creator**

#### ENGLEWOOD 2019

- **Cheeky**
- **Twinkle Boot**
- **Smoke**
- **Papa T**
- **Mr. Forevermore Feat. Jody J**

### Allegory

- Celebration
- Death
- Freedom
- History
- Home
- Love
- Personal History
- Reflection
- Religion
- Success

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### Allegory

- **Celebration**
- **Death**
- **Freedom**
- **History**
- **Home**
- **Love**
- **Personal History**
- **Reflection**
- **Religion**
- **Success**

### Instrumental

- **Back up singer**
A timeline of historical events that have occurred in the world with a focus on Chicago, and how those events impacted the study and state of mental health and its progression throughout the decades.

Visualizing the progression and the impactful events that shaped mental health care in Chicago can help the viewer understand how the mental health space and resources got to where they are today, and envision what may be coming in the future.

This timeline can serve as education material in psychology classes and training for therapists. It can be used as a launching pad for additional information to probe further and prompt deeper conversation. It also helps to contextualize a topic that typically has a stigma associated with it.

Research on historical events related to mental health in Chicago.

Events we see...
- Neurology is introduced into medical school curricula
- Juvenile delinquency becomes a rampant problem in Chicago
- World War II causes a spike in emotional trauma
- Previous inmates don’t have resources to support their needs reentering society
- Federal spending is scaled back, mental health centers are shut down
- COVID-19 causes a spike in mental health symptoms

How they impact...
- Neurology
  - Psychiatry is embedded within neurology. The focus is on managing symptoms, diagnosis and treatment was rare
  - Edward Mead founded the Chicago-Cleveland Mental Hospital for the Insane in 1846
  - Illinois State Hospital for the Insane is the first state-sponsored institution
- Mental “Hygiene”
  - Developed along with the “guidance movement” for children’s emotional problems and juvenile delinquency
  - At the Institute of Juvenile Research, William Healy started an era of organized interest in child and adolescent behaviors
- Hospitals set up Psychiatric units
  - Psychiatsrists in the medical corps treated large numbers of emotional casualties among the troops. About 10% of WWII soldiers had PTSD at some point
  - Psychology separates from neurology; training and clinics become active at Medical schools
- Establishment of a Chicago mental health system
  - Lack of resources for individuals returning to the community led to untreated conditions, homelessness and substance abuse
  - Chicago develops a system of 19 community mental health centers covering nearly the entire city
- Fight for mental health centers to stay open
  - Mayor Rahm Emanuel shut down 50% of Chicago’s mental health clinics; critical patients are forced to drive over an hour to get the care they need
  - The Coalition to Save our Mental Health Centers works to develop a community-centered model of mental healthcare
- Remote Mental Health Care
  - Pandemic leads to more virtual resources, Illinois expands access to telehealth services
  - 44% of Chicago youth experienced an increase in at least one mental or behavioral health symptom during the pandemic compared to before
Engaging History for the Future

Description
For this Mental Health and History applet, we employed two modes of engaging a timeline of important moments in Cook County and America’s understanding of mental health. Connecting ways mental health was progressively viewed at the federal, state, municipal levels through fact sets and vocabulary and relating that to understanding of neighborhood geography.

Intent
With this suite of information we hope to educate users from late high school to young adulthood about the history of mental health in the different Chicago neighborhoods in order to give them a window into where we are now, what we have done well and what needs to be fixed. Hopefully, understanding this will help us sharpen the actions we take in our future.

Use case
For websites, it can mainly be used for researching purposes. For example, psychology and medical students who are interested in mental health history can find related resources and research directions on this website.

Data or Research Needed
- Collaboration with historians to collect historical mental health data.
- Demographic understanding of mental health
- Knowledge on how the CMHA affected Chicago
- Historical knowledge of legacy mental health institutions in Chicago and their urban footprint.

Mobile Applet

Psychoanalysis
1930 1945
In the 1920s training and treatment clinics were becoming active at Chicago's medical schools. The University of Chicago, Loyola, and the University of Illinois all had different methods of preparing their psychopathic and neurological departments.

Term Tags
Dr. Frederick Ruge, flagship
Psychoanalysis
Franz Alexander

Expanded Practice
1930 1945 1953
World War II occasioned a major shift. In the 1930s, general hospitals in Chicago began to set up psychiatric units. Psychiatrists in the medical corps treated large numbers of troops returning as soldiers in the state hospital’s medical schools, and in private practice.

Term Tags
World War II
Psychotherapy
Private Practice

Community Mental Health Act
1945
1953 1972
The purpose of the CMHA was to provide for community-based mental health services which were to be funded by the Federal Government. The transition away from state-run institutions, that were leaving, left mental health services in a vulnerable spot as costs would shift to communities if govt. funds stopped.

Term Tags
CMHA
Community-Based Care

Community-Based Care
1963 1972
In 1972 the Woodlawn Mental Health Clinic was opened in the predominantly black neighborhood of Woodlawn Chicago, pop. 82,000. This community had in the past been a but was at this time hampered by declining infrastructure and socioeconomic shifts.

Term Tags
MHC Community-Based Care

Onus of Funding
2012
In 2012 half of the cities public MH clinics were closed including those in areas where there is a lower average income and less suitable in-home care options.

Term Tags
Ralph Emanuel
MH Regulation Reform
Community-Based Care

Website

In 1847, Edward Mead, a general practitioner trained in Ohio, came to Chicago and founded the Chicago Retreat for the Insane.

Recommended Topics
- Chicago Psychoanalytic Institute
- Dr. Frederick Ruge
- Psychoanalysis
- Rockefeller Foundation

Nearby Terms
- Psychosynthesis
- Psychologist
- George Keith
- The American Psychoanalytic Association
- The American Psychiatric Association

In Fall 2021 + IIT Institute of Design + Socialworks + Mental Health Data Visualization Project
Chapter 1: Myself


You’re Not Alone / Sami Cohanim


Understanding My Brain / Gauri Bhatt


“Mental health is biologically based.” https://totalmindcare.com/science/

What Kinds of Support Do I Have Available To Me? / Kavya Rai, Urvi Bidasaria


Stories About Living With Mental Disorders / Minky Zhang


Tracking My Music History / Rameena Ansari


Trauma Symptoms and Coping Methods for Self Awareness and Management / Ruhua Huang


Chapter 2: My Social Circle

How Can I Help As a Parent? / Kavya Rai


How To Have a Safe Conversation? / Elizabeth Engle


References
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Illinois Institute of Technology

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