

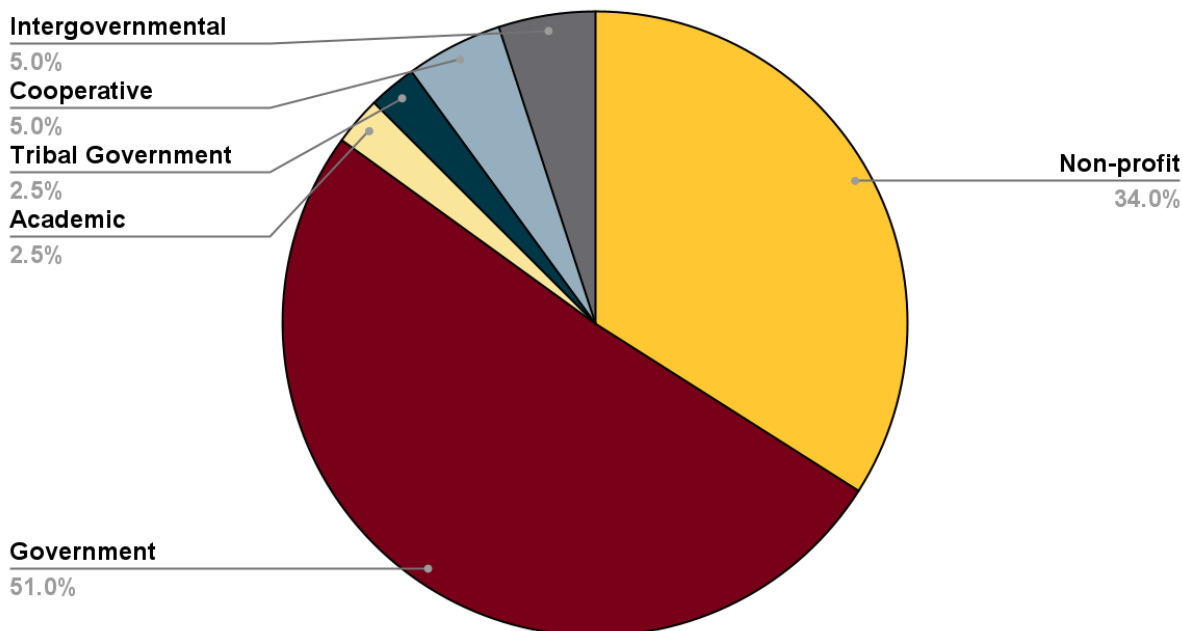
2022-2023 Capstone Project List

Summary:

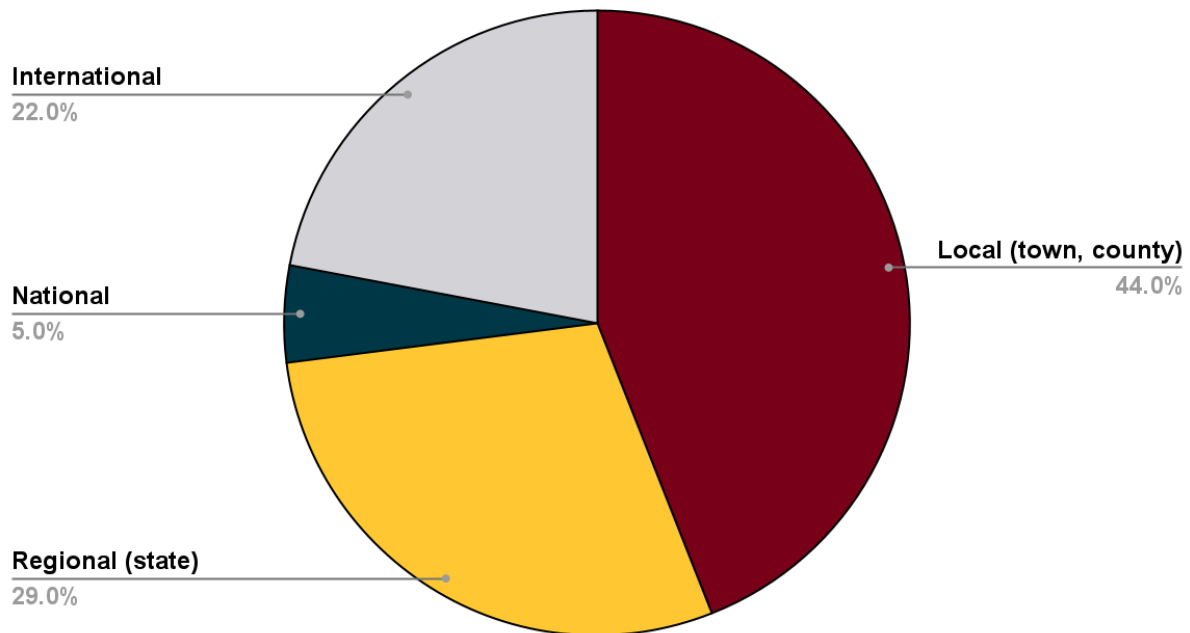
The Capstone Program at the Humphrey School in academic year 2022-2023 (spring & summer)

- involved **9** HHH faculty,
- overseeing **40** capstones,
- involving **134** students,
- collaborating with **32** distinct partners.

Capstone Partners by Sector



Capstone Partners by Scope



The following Capstone Projects encompassed a minimum of **16,884** hours of student-led work.

Spring 2023

Human Rights

Faculty: Amelia Schindelar

Projects: (3)

Sovereign Debt Negotiations, and the International Covenant on Economic, Social and Cultural Rights (ICESCR): A Case Study on Zambia

At the request of the Office of the United Nations High Commissioner for Human Rights (OHCHR), we have undertaken a study looking at why countries, when requesting loans from International Financial Institutions (IFIs), do not use their domestic laws and International treaty obligations to enhance Economic, Social and Cultural Rights (ESCR) in their country and to strengthen their loan requests. This report summarizes the findings of our research. Using Zambia as a case study we will be analyzing the challenges and or opportunities for countries that want to use their domestic and international legal obligations under the International Covenant on Economic, Social and Cultural Rights (ICESCR) to better position themselves when negotiating loan terms with IFIs and to ringfence investment on ESCR.

Community Partner: United Nations Human Rights Office of the High Commissioner

Team: Adam Arrays (MPA), Madonna Ebied (MDP), Mahdi Surosh (MPP)

Labor Rights of Undocumented Agricultural Workers in Rural Minnesota: Building Capacity, Facilitating Access and Bridging Information

Our project specifically focused on agricultural workers' rights in Minnesota. We became more aware of the serious violation of rights agriculture workers suffer through in the state of Minnesota. Some of these violations include forced overtime, wage theft, employer harassment/abuse, and child labor. In the St. Cloud area, many of the workers facing these issues worked as migrant undocumented agricultural workers; in factories, farms, and production plants. Collaboratively we saw this capstone project as an opportunity to help Fe y Justicia build capacity with individuals and surrounding organizations who were also working in the field of worker's rights. We saw this as especially important due to Fe y Justicia's limited funding, staff members, and partnerships to respond to the immense needs of workers whose rights are being violated. To focus our goals, we focused directly on the interests and priorities of Fe y Justicia discussing options such as material production, facebook lives, and social media strategies to get information out to workers.

Community Partner: Fe Y Justicia

Team: Yadira Guzman (MHR), Siyu Samantha Ng (MHR), Monica Yanez (MPP), Marvail Distant (MHR)

Examining Prison Nursery Programs Around the Globe

Around the world, numerous countries operate prison nursery programs to keep babies and, in some cases, children with their caregivers who are incarcerated. There's a lack of comprehensive information and public awareness about these programs, their risks and benefits, and alternatives to children and their parents living in a prison setting. In partnership with Children of Incarcerated Caregivers (CIC), we've provided preliminary research and crafted country reports about domestic and global prison nursery programs to better understand their prevalence, structure, and impact, as well as the laws and policies that guide their use.

Community Partner: Children of Incarcerated Caregivers

Team: Angela Rose Myers (MHR), Arshia Hussain (MPP), Carley Mossbrook Addy (MPP)

Examining the Link Between Women's Political and Economic Empowerment: A Comparative Analysis of Success Case Studies and the MENA Region

In the Middle East and North Africa (MENA) region, women's empowerment is improving in some aspects, but examining the relationship between women's political and economic empowerment is essential to the creation and implementation of future female engagement strategies. Although women's empowerment continues to evolve in the MENA region, common themes of concern that jeopardize its progress are still present and are found in the form of harassment and discrimination due to patriarchal systems and customs. This report seeks to evaluate the linkage between political and economic empowerment and concludes that political empowerment is the leading factor in closing gender gaps. Conducting further research, our case studies investigate the countries of Bangladesh, Namibia, Rwanda, Argentina, and Iceland, where the rates of women's political and economic empowerment are high. The research findings are broad and address key issue areas such as unpaid care, education, land ownership, inheritance, and civil participation. Additionally, it emphasizes that male support is necessary to promote successful campaigns of equality on both the political and economic fronts.

Community Partner: International Republican Institute (IRI)

Team: Zoe Betancourt (MPP), Lily Booker (MPP), Olivia Huber (MPP), Kathleen Lee (MPP)

Immigrant and Refugee Communities in the Twin Cities: Assessing the Reception of Afghan and Ukrainian Arrivals

As of this report's publishing, the United States is undertaking an effort to receive hundreds of thousands of Ukrainians who are fleeing the Russian invasion of their country. This effort began just months after a similar initiative to welcome tens of thousands of Afghans who were evacuated during the U.S. withdrawal from Afghanistan. As one of the most prominent states for humanitarian immigration, Minnesota - and in particular the Twin Cities metropolitan area - experienced an influx of new arrivals from these two countries, posing a challenge to the local network which supports immigrants and refugees. The purpose of this report is to inform the reader of how this network - which includes local organizations, agencies, and individuals - responded to the arrival of Afghans and Ukrainians, and to consider how that response can inform future policy choices.

Community Partner: Minneapolis Office of Immigrant and Refugee Affairs

Team: Alyssa Fabia (MDP), Joshua Fabos (MDP), Mahad Gelle (MPP), Avo Markarian (MPP), Brennan McCabe (MPP)

Keeping the Heat off of the Street: Trends in Radiological Material Security Legislation

The Stimson Center is developing the Radiological Source Security Legal Index and Online Tool (RadSecLexis), an online database aiming to measure countries' efforts to implement IAEA guidance and publicly make measurements, laws, and regulations available to those seeking examples of national implementing measures. This research project aims to assist the Partnerships in Proliferation Prevention Program in gathering quantitative data on United Nations member state legislation promulgated from December 2018 to September 2021 concerning the physical protection of radioactive and nuclear materials. This study examines the relationship between international radiological and nuclear security events and the implementation of national radiological security measures, exploring whether there is a correlation or causation between these events and subsequent policy changes. In our findings,

we can identify trends in regional cooperation and similar attitudes toward implementing international guidelines. However, it is still being determined if there is a correlation or causation between international incidents and the passing of national security measures due to gaps in data and analytics we could not access. In addition, there are disparities in implementing these measures. Regional challenges involve international cooperation in nuclear and radiological security due to a need for more resources or access to technology and funding. The paper will review the foundation of our methodology, which elaborates on the experimentation of different data collection methods, including utilizing Google Search and Artificial Intelligence. A streamlined process was developed for the collection, cleaning, cross-referencing, and organization of data most efficiently due to the time constraints of this project. However, our data collection operations needed to be improved with the accuracy of the gathered information. Using the Multiple Case Sampling Method, we gathered multiple sources of information. We developed databases from the IAEA's June 2022 Conference on Safety and Security of Radiological Sources, the Incident Trafficking Database, and the James Martin Center for Nuclear Studies reports drawing connections to global trends in national laws and regulations related to radioactive materials. Our qualitative and quantitative section overviews identified global trends such as the collective concerns on the security of radioactive and nuclear materials in Ukraine and challenges with implementing IAEA guidelines in select nations from the Global South.

Community Partner: The Stimson Center

Team: Samuel Benda (MPP), Skylor Boualaphanh (MPP), Han Gao (MPP)

Science, Technology and Environmental Policy (STEP)

Faculty: Steve Kelley

Projects: (6)

The Roles Generation and Transmission Cooperatives Play In DER Implementation

Distributed energy resources have large and increasing potential to contribute to a renewable and resilient energy grid in the United States. Great River Energy, a generation and transmission electric cooperative in Minnesota, is interested in helping to expand distributed energy resources within its service territory and that of its member-owner distribution cooperatives.

In this report, we analyze and describe the part that U.S. generation and transmission cooperatives have in expanding distributed energy resources, applied to the case of Great River Energy. Through literature review, analysis of case studies, conversations with referred experts and our capstone partner, and data analysis, we synthesize and give a set of recommendations for Great River Energy to consider investigating to meet its goal for increasing its generation of and support for renewable energy.

Community Partner: Great River Energy

Team: Brandon Henke-Fiedler (MPP), Jiaqun Wang (MPP), Kayla Southwick (MPP), Monika Vadali, Ph.D. (MPA)

Increasing Participation in the Minnesota Agricultural Water Quality Certification Program (MAWQCP)

Since 2012, the Minnesota Department of Agriculture (MDA) has operated the Minnesota Agricultural Water Quality Certification Program (MAWQCP) for farmers in the state. This voluntary program certifies farmers who implement certain conservation practices that aim to improve soil and water quality. Participation in the program has slowed since its inception and remains lower than the MDA would like. This report explores methods to increase participation in the program, evaluates environmental impacts the program has delivered thus far, analyzes the costs and benefits of the program, and assesses stakeholder views of the program.

Methods included utilizing available data, outreach to stakeholders, information gathering from various program meetings, and a literature review of relevant research. Our findings indicate a need for more robust data collection regarding the benefits of the program and non-participant insights, more collaboration with industry and similar programs in other states, and marketing of the program on a watershed-level basis and as one of a stack of programs available to farmers. These findings directly support our offered recommendations and other considerations to work towards the goal of improving water quality and growing conservation minded practices.

Community Partner: Minnesota Department of Agriculture

Team: Grace Greene (MPP), Peter Gross (STEP), Grant Kaste (MPP)

[Low-Income Energy Efficiency Programs for Connexus Energy](#)

This report explores Connexus Energy's low-income spending requirement as part of Minnesota's Conservation Improvement Program (CIP). The paper reviews the current landscape of Connexus' low-income programs and offers recommendations to increase direct spending, energy savings, and program participation. Our research consisted of a mix of general literature review, demographic data analysis, creation of spatial maps, and direct interviews with Connexus' partners and other relevant organizations. We emphasize the importance of dedicated low-income programs in overcoming the barriers that prevent low-income households from engaging in energy efficiency programs. The report focuses on single-family households, which constitute the majority of homes in Connexus' service territory. We recommend Connexus pursue a comprehensive home energy audit program, build more robust relationships with Community Action Agencies, and raise the visibility of all their low-income programs. By implementing these recommendations, Connexus can meet their low-income spending requirement while improving the quality of life for their most vulnerable members.

Community Partner: Connexus Energy

Team: Cory Hetchler (STEP), Carl Knetsch (STEP), Sarah Komoroski (STEP), Conor McKenzie (STEP)

[City-School Collaboration for Tree Canopy Enhancement: A Report for the City of Minnetonka to Partner With its Local Schools](#)

This capstone project comes at the request of the City of Minnetonka and its Forestry Office, which is looking to partner with its local schools to enhance tree canopy coverage. In order to accomplish this overarching goal, the particular objective for this capstone was to create an engagement plan for the City to effectively communicate with its public schools in order to develop relationships between various schools and the City, as well as understand the opportunities and challenges of planting trees on various school grounds. Firstly, our team conducted a literature review to understand the benefits of expanded tree canopy coverage and found particular benefits related to community health, ecological health, academic success, and energy savings. Secondly, our team conducted six interviews with Minnetonka-area principals to understand each school's particular interests, opportunities, and challenges in partnering with the City to plant more trees.

Community Partner: City of Minnetonka

Team: Chris Kwapick (MPA), Caleb Sebora (MPP), Eidan Silver (MPP), Yiyang (Olivia) Sun (MPP)

[City of Minnetonka Wood Utilization Program](#)

This report serves as research and recommendations for the City of Minnetonka's wood utilization program. The report consists of market research conducted to identify the most viable and highest-value wood products that could be produced from Minnetonka's wood

utilization program. Wood processing equipment pricing was also analyzed to provide accurate cost estimates for establishing a wood utilization program. To ensure a comprehensive understanding of the industry and current landscape, interviews were conducted with a diverse group of stakeholders, including industry experts, forestry specialists, and professionals involved in wood utilization. Their insights were used to develop multiple scenarios for the program, which were developed through interviews with city staff, industry professionals, and cities with successful wood utilization practices. These scenarios were analyzed against criteria that included the city of Minnetonka's Strategic Priorities, ensuring that the final recommendations were well-informed, practical, and consistent with the city's long-term goals.

Community Partner: City of Minnetonka

Team: Will Hagen (MPP), Laura Krause (MURP), John Ponder White (MPP)

Social Policy

Faculty: Maria Hanratty

Projects: (5)

Gun Violence Prevention in Hennepin County

Through Hennepin County's newly created Safe Communities Division, the County partnered with a team of graduate researchers from the University of Minnesota's Humphrey School of Public Affairs to better understand gun violence within the County, as well as strengthening gun violence prevention and

intervention work. Our team's research consists of an extensive literature review that details root causes of gun violence along with current gun violence prevention and intervention methods across the country. The research incorporates a mixed-methods approach of quantitative data to identify disproportionately affected areas of gun violence in the County, as well as qualitative data vis-à-vis interviews with community leaders, nonprofit representatives, local government officials, and law enforcement officers. These data work in tandem to improve the Safe Communities Division's work by aligning its resources with highly successful and innovative strategies. The findings suggest that the County could support several effective solutions based on the qualitative data: leverage partnerships with community partners, convene community organizations, diversify funding strategy, and build capacity.

Community Partner: Hennepin County Safe Communities Division

Team: Kya Concepcion (MPP), Sean McGee (MPA), Ben Pults (MPP), Maia Wahlberg (MPP/MBA)

Addressing Barriers to Extended Foster Care

Fifteen years ago, federal legislation was passed which provided states with the option of allowing eligible individuals to remain in foster care beyond age 18, paving the way for Minnesota to establish its Extended Foster Care program in 2011. Through this program participants receive monthly stipends and case management support. Research indicates lasting positive effects for participants, as time spent in EFC is associated with positive outcomes such as decreased instances of homelessness and involvement in the criminal justice system. Still, little has been known about the utilization of the program in Minnesota. Our team sought to fill this gap in research by investigating the current utilization rate and factors that affect participation. To do so, we utilized a mixed-methods approach which included interviews with systems actors, summary statistics of program data, and a review of program documents. Through this process, our team identified key strengths, weaknesses, and barriers present in

Minnesota's. Ultimately, we propose recommendations related to data and evaluation, service delivery, program design, and investment in resources to remove barriers and increase participation.

Community Partner: Foster Advocates

Team: Christina Luna (MPP), Emily Olinger (MPP), Evelyn Weiner (MPP)

Investing in Ending Single Adult Homelessness: Analyzing the Shift Toward 24/7 Shelter Models

The purpose of this project was to assess the expansion of 24/7 emergency shelters - locations where individuals experiencing homelessness can stay temporarily - that occurred as part of Hennepin County's COVID-19 response. Our research focused on single adults experiencing homelessness, and we sought to answer three primary questions. First, how has Hennepin County's expansion of 24/7 emergency shelters compared to that of similarly sized Continuums of Care? Second, how has the shift to a 24/7 model impacted shelter utilization and client outcomes? And third, how have changes to the shelter model affected the subjective experience of working in and with emergency shelters, and what effects do staff perceive on the experience of clients utilizing shelter services?

Community Partner: Hennepin County Office to End Homelessness

Team: Connor Breese (MPP), Emily Broeker (MPP), Corrine Gardner (MPP), Ron Sullivan (MPP)

Ramsey County Rule 20 Assessment

There has been a recent increase of Rule 20s in Ramsey County, Minnesota. A Rule 20 is an assessment conducted by a psychiatrist or psychologist in criminal court that determines a defendant's competency to stand trial. If the defendant is found incompetent, criminal proceedings are paused until competency can be restored. There are challenges for competency restoration due to limited access to mental health services and lack of incentive for competency restoration among defendants. Additionally, there are an increasing number of individuals who have repeatedly gone through the Rule 20 process and continue to re-offend. This increase in Rule 20 assessments and subsequent restoration services are becoming more costly while service providers struggle to keep up with demand.

Community Partner: Ramsey County

Team: Amira Carter (MPP), Madeline Goebel (MPP), Sara Kasel (MPP), Jennifer Schneider (MPP)

Program Evaluation for the Alongside Network Wellbeing Groups

The Alongside Network is a national start-up based in Minneapolis, MN. The Alongside Network "works to shift the system of care for families who have a child with a life-threatening illness or injury" by offering mental health support to caregivers, and working with hospital systems to integrate mental health best practices into the hospital and recovery experience, using a Whole Child, Whole Family framework. In particular, the Alongside Network offers Wellbeing Groups, which are mental health support groups specifically for caregivers of children affected with severe illness or injury. The Wellbeing Groups use cognitive behavior therapy concepts and are co-facilitated by a licensed mental health counselor, as well as a "lived experience" facilitator who has been a caregiver to a child with illness or injury and completed the Wellbeing Group curriculum. For this program evaluation, we aimed to assess the effectiveness of the Wellbeing Groups, as well as investigate further opportunities for The Alongside Network to collaborate with healthcare systems.

Community Partner: Alongside Network

Team: Hannah Dalsheim (MPP), Aimee Gillespie (MPP), Dr. Jamie Lohr (MPA)

Transportation Planning and Policy

Faculty: Lyssa Leitner

Projects: (3)

OnePass: A Vision for a Modern and Equitable Pass System

The ways people are living and working in the Twin Cities are changing, which brings both uncertainty and opportunity to Metro Transit. This report explores how commuting patterns have changed during the Pandemic and beyond. Due largely to the Pandemic and the rise of telework, Metropass, the employer subsidized transit program has declined heavily. It is known, however, that transit is still needed and used by some of the region's most vulnerable communities who are not currently served by the Metropass product. This report analyzes Metropass as a fare product in the context of the new normal due to the COVID-19 pandemic. The recommendations in this report cover equity, ridership, and finance/resilience themes and goals. These recommendations provide a baseline for how to modify the Metropass product to meet the changing needs of Twin Cities residents today. Our recommendation, OnePass, has the potential to incentivize greater transit ridership, making transit safer and providing increased accessibility for all.

Community Partner: Metro Transit

Team: Kaitlyn Denten (MURP), Joseph Lehman (MURP), Kribashini Narayana Moorthy (MURP)

Electric Car-Share Feasibility Study

There is an excess of single occupancy vehicles and a deficit of public transportation, active transportation, and shared mobility in the City of Edina, which has resulted in negative impacts on the environment and limited mobility for those who do not own a car. The city has identified an opportunity to address both problems by evaluating the feasibility of an electric vehicle (EV) car-sharing model in the first ring suburb of Edina. To study the feasibility of an EV car-share program's success in the City of Edina, our team synthesized and pulled key results from past research, completed a literature review of other car-share programs, calculated potential greenhouse gas emissions (GHG) reduction, interviewed stakeholders, conducted community focus groups, and mapped out best locations for potential hubs. Through these actions, we established that an EV car-share program in a hybrid model would be feasible to increase access to key residents of the City of Edina who are lacking transportation options now. While the EV car share program will reduce GHG, it has the potential to have a much larger positive impact on transportation accessibility. There are other solutions and policies that would have a greater impact on GHG emissions reductions for the City of Edina. An EV car-share program can serve as an equitable form of transportation for those that do not have access to single-occupancy vehicles, as well as a key piece to expanding other forms of transportation in the City of Edina such as active transportation and public transit.

Community Partner: City of Edina

Team: Jackson Cade (MPP), Lexie Lyng (STEP), Nelima Sitati Munene (MPA), Gustave Stewart (MURP)

Proactive Traffic Safety Improvements

The City of Minneapolis has adopted a Vision Zero goal, committing to eliminate traffic deaths and severe injuries on streets in Minneapolis by 2027. City officials have focused on seven specific street modifications that can encourage motorists to drive more slowly and increase their ability to see pedestrians, thus reducing the likelihood of a crash. These treatments are safe lane conversions, pedestrian safety islands, curb extensions, curb protected bike lanes, bikeway medians, raised crossings, and hardened centerlines.

Using criteria from the City of Minneapolis, Hennepin County, and Minnesota's Department of Transportation, the Proactive Traffic Safety Treatments Tool ("the tool") identifies which treatments are feasible across intersections and streets on Minneapolis's most crash-prone streets. The tool assigns relevant criteria to each treatment and then imports existing street data to nearly automatically assess the feasibility of each treatment in each location (1,940 target segments total). While some data points - such as the presence of buildings or businesses that generate pedestrian traffic (e.g. schools) - require human judgment to identify, and final design decisions require engineering and planning expertise, the tool automatizes portions of the planning process. In addition to making the decision-making process more efficient, the tool also reduces potential friction between staff, residents, and other agencies. This report details the benefits of and criteria for each of the proposed traffic safety treatments; the tool's development, characteristics, use, and limitations; and models the tool's use for a sample of Minneapolis streets.

Community Partner: Minneapolis Public Works

Team: Mark Christianson (MURP), Sebastian Coll (MURP), Jenna Hoge (MPP), Elias Miller (MPP)

Urban and Regional Planning

Faculty: Peter Brown

Project: (6)

[A Study of Affordable Housing in the City of Bloomington, Minnesota](#)

This study examines resident experiences of the City of Bloomington's investments in subsidized affordable housing projects. Through a mixed-methods approach, we assessed the benefits and challenges of affordable housing initiatives by analyzing residents' perspectives on housing stability, mental health, safety, security, and happiness. Our findings reveal that affordable housing investments have led to positive outcomes for residents, contributing to improved well-being and social cohesion. However, several challenges were identified, including the need for better management and maintenance processes at NOAH-type properties and enhanced communication between residents, housing providers, and the City of Bloomington.

Community Partner: City of Bloomington

Team: Joseph Amrhein (MPP), Jamila Boudlali (MURP), Alexandra Griffin (MPP), Michael Honer (MURP)

Old Cottage Grove Small Area Study

Due to increasing development pushing east in the City of Cottage Grove, Minnesota, government officials determined a need to evaluate the characteristics of a geographically secluded area known as Old Cottage Grove. This report comprises historical context, population demographics, zoning, the current housing stock, and community input via a survey and engagement event to provide recommendations to the city on approaching the region. It contains a relatively small total population compared to the entire city. It is comprised mainly of families who have lived in the area for over twenty years, inspiring pride and passion for the community. This passion shone through in both the survey responses and the engagement event, with the majority of residents reporting they valued the small-town, rural character of the area and desired little to no change. Based on these findings, we recommend the city rezone the Retail Business District (B-2) to Limited Business District (B-1) to restrict new businesses that may inhibit the area's character. We also recommend establishing neighborhood business and residential standards to ensure the benefits of potential development benefit local residents.

Community Partner: City of Cottage Grove

Team: Madeline Bergum (MURP), Elena Fransen (MURP), William Harris (MURP), Lily Heiting (MURP), Riley Rooney (MURP)

Mixing Expectations: Examining the Fiscal Impacts of Mixed Use Development in Bloomington, Minnesota

Bloomington has been promoting mixed-use development in a few specific development districts. As redevelopment of these districts takes place, the City of Bloomington hopes to understand and analyze the impacts of its investments in these mixed-use development projects. Are mixed-use developments a financial benefit or a financial cost for Bloomington? There's a small but growing literature exploring the impacts of mixed-use development and density. Research shows that density, an intrinsic feature of mixed-use development, is financially efficient for municipalities. To study revenue, property tax revenue, both current and over time, were analyzed, particularly revenue per acre to compare revenue between different land uses. To study expenses, the Bloomington budget was analyzed to identify which expenses could be allocated geographically to compare expenses between different land uses. Mixed-use development generates more tax revenue per acre than nearly any other land use type or development type within the City of Bloomington and mixed-use is not more expensive to service than other development types. Our analysis indicates annual street maintenance costs for mixed-use developments are similar to other development types. Dense mixed-use development is good for a city's financial stability. Mixed-use development is also environmentally friendly and creates strong places for City residents. However, equitable mixed-use development requires support. The literature and interviews with practitioners both identified government support and direction as a key factor for mixed-use developments that support social equity. Mixed-use development provides clear financial benefits and additional social and environmental benefits.

Community Partner: City of Bloomington

Team: Brian Call (MURP), Linnea Goderstad (MURP), Maxwell Lohse (MURP), Alex Menke (MURP)

From Ripples To Waves: Exploring Ripple Effects of the Bloomington Leadership Program

This project utilized Ripple Effects Mapping (REM) as a qualitative evaluation method to assess the Bloomington Leadership Program (BLP) in Bloomington, Minnesota. Bloomington sought to document and measure the impacts of their strategic plan, Bloomington. Tomorrow. Together. (BTT), the main objectives of which are to create a more welcoming, healthy, and economically equitable community. In utilizing REM, four main themes of the BLP emerged: (1) strengthening community involvement, (2) deepening engagement with local government, (3) energizing new leaders, and (4) gaining knowledge. Applying the community capitals and BTT framework, we found the BLP significantly builds human and social capital for the City and contributes toward their goal of creating a more welcoming community. A geographical participation map was also created to visualize where BLP alumni were making impacts across Bloomington. We recommend that the BLP aim to bolster programming to increase impacts in the least prominent community capital categories (financial, built, and natural). Additionally, we recommend that the City of Bloomington utilize REM as an evaluation metric for other city-led participatory programs in their effort to measure the impacts of their strategic plan.

Community Partner: City of Bloomington

Team: Rachel Benson (MURP), Ruby DeBellis (STEP), Annika Johnson (MURP), Jason Paschall (MPA)

Keeping Our Cool with the Metropolitan Council: Extreme Heat Through Storytelling

This project will accompany the Metropolitan Council's updated Extreme Heat Map Tool by providing a qualitative and human-centered focus on how extreme heat is impacting residents around the metro. The report discusses ways in which our built and natural environment can improve the lives of urban residents through more intentional planning, design, and regulation requirements. Previous quantitative data depicts where heat impacts our urban environments, but little has been done to provide decision makers with a human-level perspective from experts who see it impacting people in the metro in different ways, specifically those living in areas that have been historically disinvested in. We use the knowledge of selected experts and their experiences combined with existing energy burden, public health, and built infrastructure data to depict the severity of extreme heat in the metro, pointing out systemic issues that need to be addressed in order to fully solve the problem.

Community Partner: Metropolitan Council

Team: Mattie Anders (STEP), Alice Hewitt (MPP), Catie McDonald (MURP)

Meet the Moment: Activating Internal Capacity Building Opportunities to Respond to Climate Change in Ramsey County

This project worked with Ramsey County, Minnesota government to examine department goals and identify steps to plan for and address the future work needed to respond to the impacts of climate change. Students used a longitudinal qualitative research approach to perform gap analysis processes to highlight existing internal climate resilience work and identify places of improvement. The project illustrates different paths Ramsey County could take to add climate change adaptation responses for these specific departments, but the format of this work serves as a guide for integrating similar processes to all departments within Ramsey County.

Community Partner: Ramsey County

Team: Kajsa Beatty (MURP), Arianna Bower (MPP), Michael Randle (MPP), Carmel San Juan (MURP)

Urban and Regional Planning

Faculty: Greg Lindsey

Project: (3)

Red Lake Nation: Enhancing Community Connections Through Trails and Parks

The Red Lake Band of Chippewa Indians (or Red Lake Nation), in collaboration with the Minnesota Department of Transportation (MnDOT), is engaged in ongoing efforts to increase livability and safety through the reconstruction of a 4-mile stretch of Highway 1, which connects the communities of Red Lake and Redby. The reconstruction project will include a separated, paved, multi-use trail parallel to Highway 1 to enhance safety for all road users; as well as seven small pocket parks and one larger park along the corridor. The Red Lake Nation has previously collaborated with the University of Minnesota Humphrey School of Public Affairs and asked for assistance to gather community feedback for physical amenities and cultural features that could be incorporated into the parks.

The goal of the project was to provide background data, evidence, maps, and designs to guide Tribal decisions about future infrastructure projects, and support future grant proposals and community visioning work. Community preferences for cultural features and physical amenities were captured through a community preferences survey. Quantitative and qualitative survey results were used to create community-informed, data-driven design principles and elements, which were visualized through sketches. These sketches and StoryMap can be used by the Red Lake Nation in ongoing community engagement efforts. A people-centered Highway 1 trail

corridor and park system which incorporates Red Lake Nation history, traditions, values, culture, and Ojibwe language can further language revitalization efforts, community belonging, and sovereignty within the Red Lake Nation.

Community Partner: Red Lake Nation

Team: Katlyn Flannery (MPH/MURP), Kevin Phan (MURP), Anna Turner (MURP), Maya Sheikh (MPH/MURP)

Hennepin County Pedestrian Crash Study

Our study analyzed historical pedestrian crashes throughout Hennepin County and ranked crash locations based on crash occurrence over a ten-year period (2012-2021). For analysis purposes, crashes were split into two categories: intersections and midblocks. Crashes primarily occurred in urban areas, and collisions resulting in fatal injuries were rare. We created a tiered ranking system to group together locations with similar levels of crash occurrence to guide potential county improvement projects. Using ArcGIS Pro, we developed crash point maps to spatially represent crash locations and severity in each Hennepin County Commissioner District. We then created Safety Performance Functions (SPFs) by conducting a statistical analysis of crash data using a Negative Binomial Regression model. The variables we chose for statistical analysis were identified in previous studies as statistically significant variables that influenced pedestrian crashes. We used our SPFs to predict future crash locations and crash severity at intersections and midblocks over the next ten years. Our SPFs predicted fewer crashes at intersections and midblocks over the next ten years than the actual number of crashes over the ten-year study period. This can be partially attributed to our model, which was relatively weak, but can also be attributed to a lack of data. In particular, pedestrian count data would likely have increased the accuracy of our model, but this is not easily accessible. Our study opens the door to future research by transportation planning professionals who can make proactive, informed decisions about reducing pedestrian crash risk throughout Hennepin County based on our research.

Community Partner: Hennepin County Public Works

Team: Ryan Ackerman (MURP), Isak Johnson (MURP), Daniel Murphy (MPP), Tristan Trejo (MURP)

Planning for Redby's future: Improving the Highway 1 corridor and developing a land use inventory

The Red Lake Band of Chippewa Indians (RLBCI or Red Lake Nation) is engaged in ongoing efforts to increase livability, with a focus in the downtown area of the community of Redby. RLBCI has collaborated with the University of Minnesota Humphrey School of Public Affairs on transportation-related projects since 2016 and asked for assistance from a team of students at the Humphrey School to further address pedestrian safety needs in the Highway 1 corridor and create a land use inventory of Redby. The Red Lake Nation is also working with MnDOT on planning upcoming Highway 1 roadway improvements. The goal of the project was to provide background data, evidence, maps, and designs to guide tribal decisions about future infrastructure projects, and support future grant proposals and community visioning work. The project coalesced around two research topics: the first focused on community preferences for improving pedestrian safety and livability in the downtown corridor of Redby, and the second on existing land use in the community. As such, the report consists of two parts that correspond to those research topics. Part I provides key context on current conditions in Downtown Redby and then explains the development, implementation, and results of a community preferences survey. Part II provides context on the history of land use inventories in Redby, details the methodology behind developing an existing land use inventory of Redby, and includes the results of that inventory - a series of maps generated with GIS mapping software.

Community Partner: Red Lake Nation

Team: Noelle Bakken (MURP), Laura Bretheim (MURP), George Drometer (MPP), Revée Needham (MURP)

Capstone in Development Practice (MDP 5200)

Faculty: David Wilsey

Projects: (6)

IISD ASEAN RAI Evaluation

The International Institute for Sustainable Development (IISD) is a leader in the responsible agricultural investment space. IISD was engaged by the Association of Southeast Asian Nations -ASEAN - to draft the ASEAN-RAI Guidelines. The ASEAN-RAI Guidelines are "the first regional iteration of the Committee on World Food Security's Principles for Responsible Agriculture and Food Systems (CFS-RAI) and are designed to help ensure that investments in agriculture meet global standards and promote responsible and sustainable development in the region." This report evaluates IISD's interventions pertaining to the ASEAN-RAI guidelines and the technical assistance programs. The team designed an evaluation that would answer three questions that broadly engaged an impact evaluation, developmental evaluation, and scalability framework. By interviewing key stakeholders the team generated findings to guide IISD as it improves and expands its services in the ASEAN region and potentially in other regions.

Community Partner: International Institute for Sustainable Development (IISD)

Team: Abigail Condie (MDP), Amany Abdelnour (MDP), Dalila Hussein (MDP), Marian Candil (MDP), Nathan Jeide-Detweiler (MDP)

Report on plastic waste in Mogadishu, Somalia

Plastic waste is a huge problem for the City of Mogadishu with residents and businesses alike complaining about the excess level of plastic waste in the city. Multiple stakeholders attempted to engage in efforts to either institute a zero plastic ban or policy to reduce plastic waste in the capital; with zero luck. City University of Mogadishu (CU), a not-for-profit institution, was interested in figuring out what steps either policy or not can be taken to address the issue of plastic waste in Mogadishu. To explore these questions, our team conducted a literature review of existing literature on the topic, conducted ten key informant interviews and created a survey that received 73 responses.

Community Partner: City University of Mogadishu

Team: Zakariya Abdullahi (MDP), Asia Tamaami (MDP), Abdulahi Sahal (MPP)

Investment Capacity Building Program In Southern African Development Community

This capstone involved conducting a program evaluation on behalf of a Canadian international development think tank. The program evaluated is directed at investment capacity building in member states of the Southern African Development Community (SADC) and is operated by the project client's Economic development division (EDD) which deals with advising SADC countries with issues around economic laws and policies. The project is intended to answer a variety of evaluation questions and to generate insights on the perceptions of the client's programming as described by program recipients in SADC member countries.

Community Partner: International Institute for Sustainable Development (IISD)

Team: Sydney Kloster (MPP), Elie Farhat (MPA), Alexander Lee (MPP), Douglas Kleemeier (MPA)

Documenting and Understanding the Link between Climate Change and Sexual and Reproductive Health Rights Using a Case Study in Buikwe District, Uganda

The University of Minnesota Humphrey School of Public Affairs, in partnership with Regenerate Africa, collaborated on a study with two main objectives. 1. Conduct an assessment of Uganda's capacity for integration of Sexual and Reproductive Health and Rights in the National Adaptation Plan processes 2. Document and understand the linkage and interconnectedness of Sexual and Reproductive Health and Rights/Family Planning and climate change.

Community Partner: Regenerate Africa

Team: Kristyn Buetow (STEP), Selam Kubrom (MDP), Sisay Shannon-Tamrat (MHR), Megan Walkenhorst (STEP)

Report on Development of the Honduran Rambutan Value Chain

Rambutan production in Honduras has become a means of sustaining a livelihood for producers and their families. Rainforest Alliance has been instrumental in organizing rambutan production and striving to improve the livelihoods of its producers. This project has sought to identify pathways that will help expand the value chain and diversify the rambutan market such that producers will have more options to sell their rambutan and improve livelihoods.

Community Partner: Rainforest Alliance

Team: Calvin Moschkau (MDP), Kathy Evenson-McDermott (MDP)

Independent Study Section

Faculty: Ed Goetz

Project: (1)

The Case for Community Owned Housing Models

In Minneapolis, there are too few public investments in community ownership housing models that ensure long-term affordability. The Minneapolis housing market, historically and presently, restricts access to marginalized communities creating racial inequities and unaffordability (City of Minneapolis, n.d.). Development pressure and the activities of investors have further contributed to this problem (Emerson, D, 2021). Using the owner-occupied land trust model, Hope Community's Ownership Program advocates for public investment at the State, Metropolitan Council, County, and City levels to preserve the long-term affordability of community-controlled housing. An investment shift to community-controlled housing transfers property from the speculative to the affordable housing market, which allows marginalized communities to access the affordable housing market, and prevents the overall displacement of community members (Ferrer, 2021).

Community Partner: Hope Community

Team: Libby Logsdon (MPP), Lindsey Erdmann (MPP), Ruthvin Gardiner (MPP), Krystin Eldridge (MURP)

Summer 2023

Leading Organizational and Community Change

Faculty: Mitchell Berg

Projects: (4)

Community Violence Prevention: Measuring Impact

Through Hennepin County's newly created Safe Communities, the County partnered with a team of graduate researchers from the University of Minnesota's Humphrey School of Public Affairs to develop goals and measurements around community violence prevention. Our team's research consists of a literature review that details a systems level approach to community violence using community violence intervention, as well as participatory grantmaking process. The research incorporates a mixed-methods approach of quantitative data to identify trends in violence prevention strategies and outcomes reported by grantees, as well as qualitative data vis-à-vis interviews with representatives from local community organizations and foundations. The findings suggest that the County should improve trust and connection with community organizations, utilize strategic planning to identify goals around violence prevention, and center equity in the grantmaking process.

Community Partner: Hennepin County Safe Communities

Team: Carrie Bush (MPA), Clare Pillsbury (MPA), Kuverua Kuverua (MPP), Tyler Roosden (MPA)

Crafting Model Legislation to Promote Post-Secondary Enrollment Options Nationwide

People for PSEO (PPSEO) is a Minnesota-based nonprofit that advocates specifically for programs that provide dual enrollment classes delivered on post-secondary campuses. They acknowledge the benefit of all dual enrollment programs, while highlighting that a certain portion of high school students are better served by attending classes at the post-secondary institutions than those offered within the high schools. PPSEO recently widened its scope beyond Minnesota and hopes to assist similar organizations nationwide in promoting PSEO programs. To that end, they engaged a team of graduate students from the Humphrey School of Public Affairs at the University of Minnesota to craft model legislation that can be used everywhere.

Community Partner: People for PSEO

Team: Dabora Mayen (MPA), Nhia Chang (MPA), Shannon Petersen (MPA), Thomas Melton (MPP)

Barriers and Solutions to Increasing Farmland Access for Emerging Small-Scale Farmers in Minnesota

The primary objective of our research was to better understand the issues that emerging, small-scale farmers in Minnesota face; specifically, the barriers and potential solutions to accessing farmland. We explored alternative agricultural land uses, such as collaborative and shared land-use models as possibilities to best meet the needs of emerging farmers who tend to look for small acre plots, multi-farmer run operations, or land sharing initiatives. Our research focused on legislative policies and resources for emerging farmers and we address those areas in our findings and recommendations of this paper.

Community Partner: Renewing The Countryside

Team: Jacob Ciuraru (MPA), Libby London (MPA), Diana Tastad-Damer (MPA)