ARCH 510 GRADUATE SEMINAR DESIGNING FOR SURVIVAL

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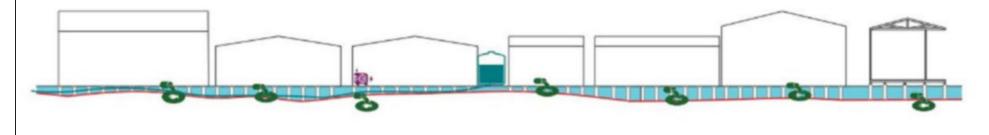


TASTE OF LUXURY WHILE LIVING AFFORDABLY

Let's be honest, we all like to live in luxury in some way even, when we cannot afford the lifestyle of the wealthy or the very rich classy people living in our cities. Well, there is only one way to live life in luxury for those of us whom cannot afford the kind of luxurious home owned by the wealthy: "live according to your means." I know that's probably not what you were expecting to hear, but it's the best and only way to live for a start. I will tell you what—there is actually a way to live like these rich folks. Here incremental housing comes to play a major role.

Statistics show that housing provision and affordability in west Africa remains a big problem and has large loopholes, which is exploited by the rich. The government initiates mass housing projects which in an ideal sense is meant to cater for all the classes of people living in the society, but the housing scheme tends to benefit the wealthy class. Because they have the financial power to pay for these homes on the go as opposed to the other classes of people. Even when the non-wealthy end up affording the houses, they do not get their taste of luxury because most of the houses they can afford are usually mediocre homes built and designed with no regard for taste and unsuitable to the home owners' aspirations to luxury. The whole point of my intervention will be to give the less fortunate home owners the opportunity of remodeling their homes to suit their taste after initially owning them at a lower rate.

—Chimdi Ajaero



Floating community

CONSCIOUS DAMAGE.....

Anyone involved in building design in recent years will have been confronted in one way or another by the term sustainability. The term remains elusive to many, and while a number of definitions exist, they give little indication of how to apply principles of sustainability in practice. Moreover, these definitions differ slightly, one from another, and in any attempt to implement sustainable development it is essential that the meaning of sustainability be understood. It is generally agreed that sustainability fundamentally affects the way we live; consequently, personal ethics will influence the way an individual interprets her/his aims. Like architecture as a whole, sustainability involves addressing a wide spectrum of issues, sometimes, seemingly, conflicting ones. Acquiring a basic knowledge of these issues is the first step towards establishing or clarifying personal values and moving towards a more sustainable future.

Species of plants and animals are disappearing a hundred or more times faster than before the coming of humanity, and as many as half may be gone by the end of this century. An Armageddon is approaching at the beginning of the third millennium. But it is not the cosmic war and fiery collapse of mankind foretold in sacred scripture. It is the wreckage of the planet by an exuberantly plentiful and ingenious humanity.

The present state of our planet and the pressures imposed by human activity on the environment: human-induced global warming, pollution, deforestation, habitat destruction and resource depletion are contributing to an environmental crisis which is threatening the survival of many species, including the human species. The humans are not aliens that colonized the Earth but have evolved on Earth as one of millions of species. Importantly, natural environment we treat with such unnecessary ignorance and recklessness was our cradle and nursery, our school, and remains our one and only home.

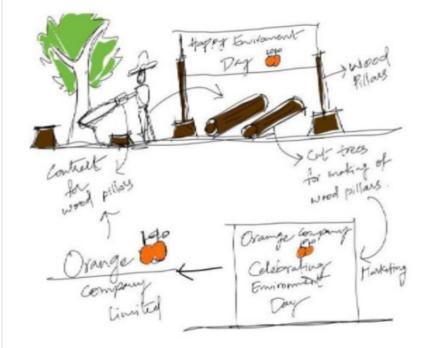
It is not only the nature of human activities that threatens the environment, but also their increasing occurrence. Currently up to two billion humans, without reliable access to safe food, urgently require resources to cover their basic needs, while several billions more are rapidly

increasing their resource use to improve their living standards. Compounding this, the global population is growing currently at 6.2 billion, it is expected to stabilize at around 9 billion by the end of the century. Ninety per cent of this population growth is expected to take place in developing countries. Population growth and the raising of low living standards will require more resources, produce more waste and increase the impact on the natural environment.

However, thinking about and applying sustainable principles are not easily done. Sustainable thinking goes against our primitive instinct of putting ourselves before others in the fight for survival. It rationally prioritizes globally favourable long-term solutions over short-term individual gains; it is, therefore, in contrast to the most primitive survival instincts, which remain powerful despite no longer having a rational basis in today's developed countries.

Sustainability, therefore, necessitates a contemporary way of thinking. It requires the scrutiny of traditional values and economic measures and a definition or perhaps a redefinition of quality of life. Questioning values that are often culturally determined is challenging, and perhaps for this reason definitions of sustainability remain open to interpretation. As part of the process of reviewing values and ethics with respect to sustainability, it is essential to consider their development.

-Mohit Chakravarthy Atchakolu







ARCHITECTURE AND FORD

A CALL FOR THE USE TECHNOLOGIES OF SCALE TO PRODUCE ARCHITECTURE OF MEANING

The world as we know it today has been shaped and formed by integration of technology and processes of mass production. Pioneered and mastered by Henry Ford and the automobile, mass production process has increased the efficiency and the economy of which all things are made. Using the one-track mindedness of humans to focus on a single task in controlled conditions allows for fast and quality production that can produce more than we ever need. One industry keeps its head out of the harnessing of mass production to the detriment of all, and that is the building industry.

The way we build things has largely been the same for 100s of years, but as we move forward the only inspiration the building industry has taken from Fordism efficiency is to increase the amount of specialization of each part of the building process from design to build. The result of this is a bloated building process that results in wastes of time, material, and manpower. As we reach the pinnacle of climate crisis, face shortages of housing, buildings must be designed in built cheaper, faster, and more sustainable. The future of architecture and building lies in the direction of prefabrication, mass production, and mass customization.

Architecture has always been about capturing the single stroke of perfection, and prefabrication seems to go against the very core idea. Architectural design is taught as process of response, each building is supposed to be a perfect response to the place, the client, and craft, the process all articulated meticulously by the architect and built and integrated by master builders and craftsman. Prefabrication is the use of soulless machines, inside a warehouse far away and only limited to producing a handful of different parts and forms. But architecture shouldn't have to be a choice between bespoke and efficient, and prefabrication is able to bridge the gap but architects must embrace the power and the limitations as they have embraced the same of all building materials beforehand.. The technology exists, between building information models that digitize every detail of the project, CNC and Laser cut machines to create the custom parts needed. Prefabrication is just another to be understood and one that must be understood in order for architects to catch up to the modern era.

Embracing prefabrication is only the beginning, the next question is how to use prefabrication and mass customizability to address societal issues that can be solved with architectural solutions. In the past the largest handicap of architecture being able to produce substantial change is a combination of cost and time. By the time the building is designed and built, the problems have either been temporarily solved by a band-aid solution or the problem has already compounded. Prefabrication allows architecture to be produced at a speed and cost that allows it to begin to make the difference it needs to.

The most prominent of the societal struggles that have architectural solutions are the climate crisis and the lack of affordable housing. Integrating prefabrication allows for these to problems to be addressed simultaneously. Prefabrication off site to exact specifications you can cut down on wasted material and use the saved money and time to easily integrate environmentally friendly materials. Housing through prefabrication allows for you to build faster and cheaper which results in more and cheaper housing.

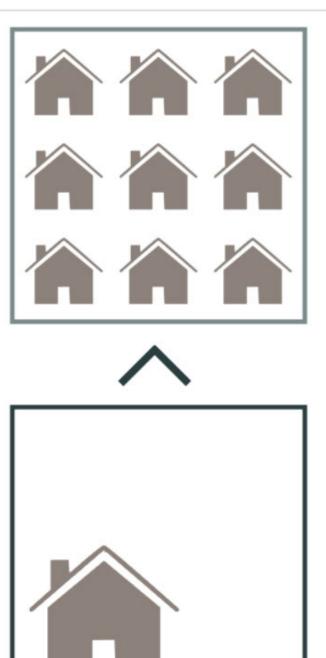
Well believe it or not this is not the first-time housing has been attempted to be solved through prefabrication. Architectural minds of Le Corbusier, Frank Lloyd Wright, Paul Rudolph, and many more have tried to create the perfect form of repeatable housing through prefabrication. But the fact of the manner is producing mass housing through the lenses of prefabrication is a flawed premise because we are focusing on producing Housing not Homes. The most essential building is a person's life is often their home, its where they grow and change and serves as an anchor for the human lifestyle, a physical representation of the soul. Past attempts to mass produce homes results in the home getting swallowed up in the economics of the build not whether people would want to live in the home imposed by housing.

The image Americans hold in their head of home is the classic white picket fence yard with a big lot out in the suburbs, were you exist in your own personal domain out in nature. But this image is ultimately a farce. These homes come at a steep personal cost, including but not limited too expensive price tags, isolated lifestyle, and the tolls of constant long commutes for opportunities to work and play, as well

as the hidden tolls on our mental and physical health. And the imagination of living on your own plot of nature away from is hilarious notion as the production of suburbia devours away at true nature and leaves behind sad facsimiles filled with cookie cutter housing. They also come at a cost of society in the form of greater cost for infrastructure and the environment.

These suburban environments that people flock to show that mass production of homes can be achieved (albeit in a highly decentralized and still wasteful manner). The key to housing lies in producing housing of sufficient density to relive the pressure on our planet and economy, while providing homes quickly and cheaply that give people the sense of domain and control that the imagination of suburbs do without losing the benefits of dense urban ecosystems. people to remain in control of their own private domain. Prefabricated architecture allows for these ideas to be possible at the scales, speed, and price possible, now all it needs is the architect to make the design happen.

—Brett Carter





ON HOMELESSNESS

There are people without homes, who live on the edges of society. They struggle and suffer every day to survive another day. The solution to their suffering is simple: provide them with homes.

The problem is implementation, the funding, the design, the maintenance, the will, the effort. All these things require a collective approach, and perhaps a rethinking of our current social, economic, and political systems. All these things taken together make the solution so monumental that we rarely see it implemented. I cannot solve homelessness. Yet there are humans suffering.

We live in an age of immense wealth, greater than any generation previous. So we are told, taught, and indoctrinated. Yet if that is true, then why does everyone still work an 8-hour workday of almost a hundred years ago? Why do both parents typically have to work to support a family of 4, when the idealized family of the past had only one? Why do we still have people living on the streets?

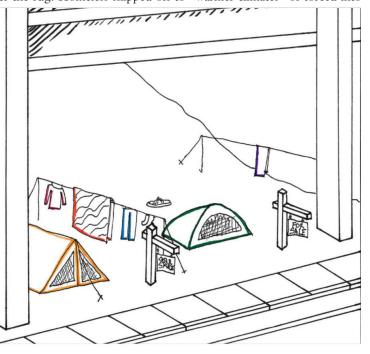
We treat prisoners, wards of the state, to meals, a warm bed, and medicine. People who have broken the laws of society so severely that we have deemed that they must be locked up and put away. People that most would call the worst people we have. It is sometimes said that the measure of a society is how it treats the least of its people. We look at the prisons and call ourselves so nice and benevolent for treating the worst of us with such care and kindness. And yet, we ignore people on the street who lack money and support, and live lives much worse than our prisoners because of it.

I cannot solve homelessness. I can design places for people who are homeless to live that put them at less risk, and that can even help them out of their situation. Places that are safe, with clean running water. Places that are durable, and not as vulnerable to cut funding. Places that, while perhaps similar in design to the sewers and underpasses that many are living in now, present none of the risks. Places that direct a tiny bit of our great societal wealth to reduce the risk and suffering that these people experience regularly. It may be said that such a place is simply a stop-gap measure, a bandage on a festering wound. That it will hide the problem away and reduce the calls for providing solutions. Yet, cities nationwide already sweep the homeless under the rug. Homeless shipped off to "warmer climates" or forced into

overcrowded shelters that are underfunded. Some are forced underground to stormwater systems that periodically flush them out, drowning many. Even the standard architecture in many cities includes elements designed to deter the homeless from setting up.

To provide for the homeless will take time, effort, money, all the things mentioned before. Those things take time, and these people are dealing with this issue now, today. Let's provide these people with shelter, if not homes. Places for them to recover between bouts with the world, to catch their breath, and where services can find and provide for them as they are able. Let's improve their situation, if we cannot solve it.

-Paul Chase



Senior Home

Everyone experiences life from birth to old age. A lot of architectural design focuses on the needs of young people, but how many Architectural designs really focus on the life of the elderly? How should they live after they retire after people have contributed most of their lives to the world? Different cultural backgrounds require different methods to help elderly parents. In China, older prefer to stay at home rather than go to nursing homes. The traditional home care is that the elderly live with their children.

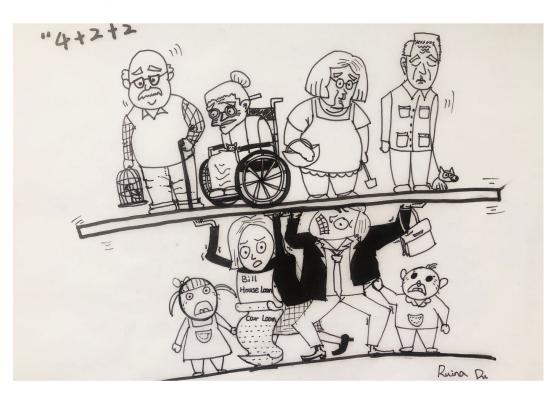
However, in recent years, with the development of society, many adult children go to work in first-tier cities, while their parents are alone at home. These elderly people stay at home alone, If there is an emergency, it is difficult for them to deal with these difficulties alone. In addition, most nursing homes in China have poor facilities, which can only meet the survival problems of the elderly and cannot allow them to enjoy the elderly life. With the process of the aging society, more and more countries have entered the aging society. The population of the elderly over 65 in China will reach 14% in 2027. As early as 2017, Shanghai's elderly population had reached 17.3%. The elderly are not useless to society. They have accumulated wisdom and social experience for the majority of their lives. They are the recorders of history. Just like every time when you went to your grandparent's home, they can't wait to share the past stories with you. You'll always be shocked that life was like this in the past.

The physical and psychological needs of the elderly are different from those of other groups. If the elderly live in an ordinary communities, it will be difficult to meet their needs. For example, most elderly people like to get up early and go to bed early. They like to cook and eat by themselves. Compared with young people, they have a lot of free time... At the same time, the elderly need to have more contact with young people, which is beneficial to their physical and mental health. Therefore, this will be the best solution to create a community of senior citizens that can be established on any land that is connected to ordinary communities.

Only by solving the life problems of the elderly can the younger generation devote themselves to work and family, the birth rate will increase, and the social and economic development will be better.



-Ruina Du





ADDRESSING FAVELAS

For much of the past decade, Brazil has often been touted of as the "country of the future" as President Barack Obama echoed this sentiment of a growing country on his 2011 visit. Economic growth and national production exhibit strong endeavors that the leaders of Brazil are taking to emerge from a struggling third world country, to a central global power on planet earth. However, this growth is very much impeded by Brazil's housing difficulties in its vast urban environments. The notorious informal cities (or favelas) that exist throughout the big cities of Rio and Sao Paulo signify a disconnect between the country's people on multiple different levels. Marred by striking physical contrasts of poverty and wealth, poor infrastructure and luxury; the favelas are a physical manifestation of deep-seated social issues that prevent Brazil's urban fabric from developing into a setting in which its diverse people can thrive. Thus, addressing the problems of Brazil's housing crisis known as the favela becomes a matter of solving Brazil's very future.

In recent times, Brazil has enjoyed the national spot light in its participation of global events such as the 2016 Rio Olympics, as well as the 2014 World Cup. With this increased global attention, more priority was placed in addressing the favela issue. Multiple unsuccessful attempts have been made by the leaders of Sao Paulo and Rio to "clean up" the streets and rid the city of the plague that is the favelas. These policies included ethically questionable actions of forced mass migration of favela dwellers to remote corners of the city, to literally building walls to cover up the undesirable locals of the cities. However, not one of these endeavors bothered to incorporate designers, architects, and urban planners in the process of solving the favelas.

Architecture and urban planning have the potential to be a great avenue of future success in thinking about how to deal with the future settlement of the informal city. For this reason, Brazil must rely on individuals with training and design backgrounds to literally provide the blue print of how the favela can be developed into an urban strength that better connects the informal city to the rest of the city; resulting in a seamless urban environment that begets a strong sense of community, diversity, and cultural harmony.

In accomplishing an ideal built environment by way of improving the favelas of Brazil, it is the firm belief of many that a large portion of the social problems that plague these physical areas—drugs, violence, unsanitary condition—will be mitigated. Architecture and design have a very strong potential in producing a setting in which people depend less on and engage less in risk behaviors that lead to fear, instability, and stunted national growth. Identifying the roles in which design plays in shaping this reality will be absolutely paramount developing a clear path to a better urban environment for Brazil tomorrow.

-Mark Finlinson



DESIGN FOUND IN DEVELOPMENT

With design and development in a competing spectrum, we can find a need for mass development and the solution of how to make money based on that project. However, by maximizing square footage with an experimental balance between developing and designing, the true benefits can be found. I want to explore by a design proposal and set of "rules", what kind of spaces and programming should be on a development, and ask is it a consistent pattern of repetition that can be created, or do those "rules" cancel out architecture in its most vulnerable form and pretence? How can the development be price-friendly while still being considered architecture, can it save money by designing in a modern form with concepts as few walls, maximized living spaces, and connected groups? By connecting the architecture and development, the interfaces are developed and designed to last and prosper, which is critical in the society that pushes for buildings to only last 50 years.

Beginning to think of what architects and developers have in common, both are providing a service to the community, providing shelters for living or working, and sometimes, will even be financially dependent on the community, so it is important to give back in the sense of the long term. Thinking of the spaces that will be built, open spaces, how they connect—separate, put together, etc. Studying the placement and environment that the development will occupy is critical. Residential mixed use housing with long term residence as well as quick leases is worthy of scrutiny. However, the question to ask is whether a strict set of rules that can be applied to every development or should we apply loose guidelines that can help with mass production. Can the same pattern be taken elsewhere?

To start is to define the roles of the architect vs. developer. The architect is the person who designs buildings, spaces, etc working to create the form for which they will be built according to the area of their placement. A developer's responsibility is to build out a project as discussed in the contract, often the design drawings done by the architect. The seamless answer to the friction the two combining forms take is that with one fluid motion the project is designed and in the next breath it is built by the same mind. When a project is designed and then built there is a separation, new ideas come into play part way through, almost as if there is a language barrier. But when the same team/mind is drawing then producing the build the same concepts from the beginning are worked towards, and in the end a complete form of an idea is finished and has the most potential to be successful to the given environment.

So what is an architect's dream for developing out mass plots of land, can this theorem be applied anywhere? Should subdivisions even exist in the world of architecture?

-Catherine Flerchinger







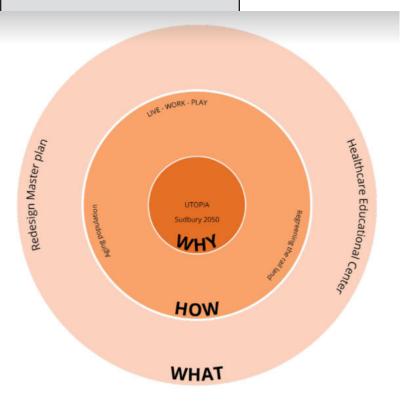
DIALECTICAL UTOPIA: THE ALTERNATIVE REALITY

Current urbanism exposes to us many critical problems: rising population, climate change and uneven urbanization, globally. They not only threaten our current living conditions but also our future. Obviously, incorporating them into future plans is what we are doing right now. Yet, we do it in very practical ways. We get lost in "what it is" instead of "what it could be". We, human beings, always dream about utopia —the perfect imaginative picture of the ideal world. And yet, it is exclusive from architectural education and practice.

"And best of all is finding a place to be in the early years of a better civilisation" —Dennis Lee, Civil Elegies

Establishing cities into multiple compact urban cells helps us to manage density and resources, which further link together by a complex transportation network. On the other hand, sprawls will be minimized and controlled since we develop cell-by-cell, not randomly pick a piece of land. Moving further into building design, vertical expansion seems to be a promising solution in which sprawls and horizontal growth will be managed. In order to do so, each vertical building or a group of interconnected buildings should fulfill the human life concept of Live-Work-Play corresponding to Maslow's Hierarchy of needs. At the same time, there is a thin line between utopia and dystopia. According to Schneekloth, the side effect of the making is replacing the world that is already there and therefore we unmake something else (p.1). Each step, each decision should be considered in the big picture, balancing between pros and cons. Afterall, building a future does not mean we ignore the current, and demolish the past.

While acknowledging the broad and extended topics relating to utopia, I specify the scope of this research limited to urban form issues and their related social behavior. At the very least, this research informs the spatial characteristics of what utopia should look like and their impacts toward human life in general.



While the future is the unknown, architecture works should involve not only in building an improved version of the reality, but also theorizing and conceptualizing. To which, Schneekloth defined as "placemaking", the transition from "the places humans find themselves" into "places where they can truly live" (p.12). That is the difference between surviving and living. Conceptualizing the ideal urban guides our long-term path toward a fulfilled life. This is what exactly architecture does, carrying out "imaginative possibilities of what is not into the concrete realm of what could be" (Bartowski, p.10).

—Nguyet Huynh (William)

AMERICA BACK ON TRACK

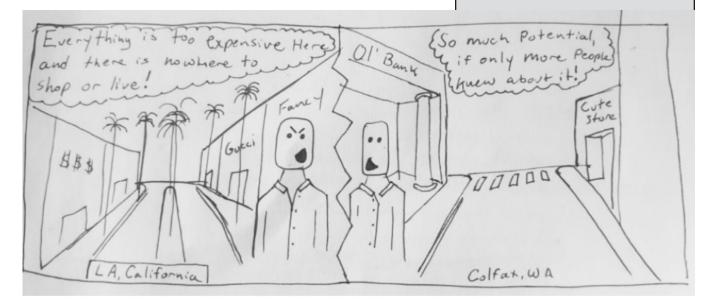
REESTABLISHING A HISTORIC LANDMARK FOR THE BETTERMENT OF THE COMMUNITY

Small town America is home to a lot of citizens who prefer to live away from major cities. However, as America moves forward toward a world that is less reliant on these small agricultural/industrial towns. Their way of life is slowly being robbed from them, and their towns are dying. This is a direct result of Americans' recent fascination with outsourcing business to other countries and larger corporations. The blue collar inhabitants of these towns are being forced to give up their way of life due to economic instability in their field of work. These towns then begin to face societal issues produced by the financial desperation of its inhabitants. It is my belief that today's current societal and political division is the result of America's regressing need for an American blue collar workforce and the slow death of the middle class. The small towns scattered across America that were once cogs in a much larger economic machine have now had their lifelines ripped from them. And as corporate America moves closer and closer to becoming a world economy rather than an American economy.

These small towns will continue to die unless they can develop a local economy that is not reliant on outside forces in order to prosper. Luckily these small towns already possess a tremendous amount of character and potential that can be used to develop their own local economies. Boutiques, cafes, and retailers are the natural advancement of any up and coming hot new Main Street and therefore need little intervention by architects. What we as designers need to do, is light the fire that sparks these communities to take action on their streets. In order to show them that development of their communities can happen and progress can take place. What these small towns need is a symbol of hope that they can cling to when taking the first scary steps into progress. By developing a unique community landmark that puts an otherwise unknown small town on the map. We can begin to show its community members that if we build it they will come. There are very few Americans in this country that do not enjoy a pleasant stroll down a unique and interesting main street town. That foot traffic can bring new money into these small communities and help incentivize small businesses to blossom. All we need to do is take that first step. That first step taken by these towns, acts like a harbinger to others around it that says this town is still alive. We need to look at this problem not as a problem, but as an opportunity for our small communities to band together and thrive together in a new industry that is not reliant on the whims of corporations. But rather uses its own resources to support its progress into the future.



—Dakota Jones





THE AMERICAN DREAM DISEASE



SEQ Figure * ARABIC 1 Which wildfire is spreading faster?

As wildfires burn, their outer edge consumes precious natural resources. It expands rapidly and leaves behind its front line a path of waste and decay. In many ways, the "suburban experiment" has become the same, with the outer edge consuming forests, prairies, and farmland. While the outer edge of suburbia remains healthy and vibrant, the inner core is a decaying wasteland avoided by those who can afford to escape it. Suburbs grow increasingly unaffordable by the day as housing supplies are constrained and demand increases. Many builders and developers enshrine the low-density solutions of the 20th century. In this path of sprawl, farms become parking lots, forests become Costcos, and prairies become cul-de-sacs. area and leaving parking lots, big box stores, and cul-de-sacs in their wake. Is this really the American Dream?

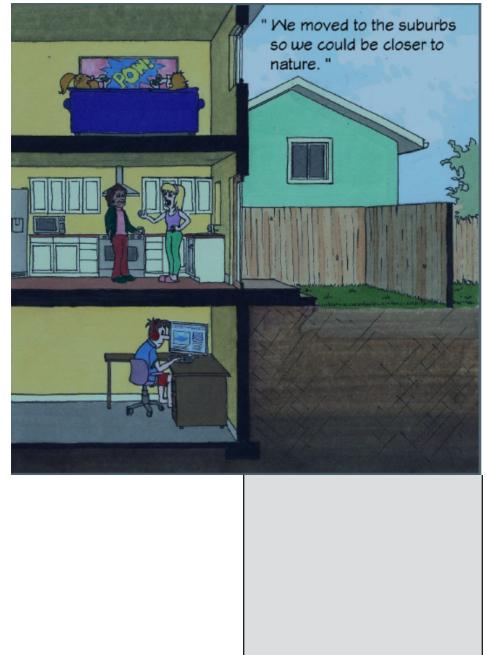
Spokane, Washington is a typical American city. It has experienced boom and bust, prosperity and poverty, suburbanization and inner-city decay. Socio-economic segregation has intensified and left many families with a literal fear of density, associating it with crime, poverty, and the end of freedom. This car-dependent solution is destroying our environment, segregating our communities, and inflating the cost of living throughout the United States. Housing supply truly does need to increase. The solution, however, lies within the city limits, not on its fringe.

A key component to increase housing affordability is decreasing each households' infrastructural burden. The easy but increasingly ineffective solution to meeting demand for housing has been large-scale, car-dependent greenfield development. It worked because land was cheap, labor was cheap, and government subsidies were generous. Developers built millions of miles of roads and utilities knowing that the moment that infrastructure was complete, the financial liabilities were transferred to a city or county. Cities saw this as a great deal. They didn't have to pay to build anything—or so they thought. In reality, the constant maintenance of this spiderweb of infrastructure increasingly strangles city budgets and limits their ability to facilitate solutions to contemporary issues. In the average suburb, there is about 1,000 square feet of road per household (with associated utilities). In Manhattan, there is approximately 50 square feet of road per household. Financial burden per household increases greatly as density decreases and that burden is passed on to homeowners and taxpayers. Higher density housing means more money in the pocket of each household. When average Americans look for a new home, they have priorities: a safe neighborhood, close to schools, shopping, work, and parks, a good investment, an escape from the rat race, and a flexible home that can accommodate their needs (and stuff) over time. These are the traits most referenced during the home-buying search. The suburbs have been marketed as the solution to all these problems. In reality, they fail to achieve most of them. Schools may be good; property values may be increasing, but the suburban environment reinforces dependence on the automobile, increases in commute times, and limits mobility options for community members of all ages. It spreads out amenities, makes it dangerous or unfeasible to commute by foot or bike, decreases accessibility to mass transit, increases social isolation, and creates wide swaths of cultural and economic monotony.

Higher-density development in existing metropolitan areas can make housing more affordable, uproot social and economic segregation, improve community participation, foster stronger local economies, reduce our environmental impact, and provide a better environment for children and families than suburbs.

In order to achieve high quality, denser development in existing cities at a broad scale, policy and zoning need to change drastically. Cities need to make it profitable for developers large and small to increase density in an existing neighborhood to the next level. And crucially, urban development initiatives need to align their priorities with families in order to help American society's shift to a better built environment.

-Kyle Madsen





LOW-COST BUT NOT LOW COST

With the recent development of housing strategies in Nigeria, little or no thought has been put to reduce homelessness or aid potential homeowners. Renting houses is pretty expensive and getting one for yourself and/or family is even more bank breaking. Majority of the housing dilemma in Nigeria, stems from the useless government in power. It is a long list of embezzlement, Fraud, Entitlement, and Stupidity.

The government says they cater for low-income earners but in reality, they do not. They either build temporary shabby constructions made of substandard materials that are practically useless. Or they build expensive estates with taxpayers' money and slap a "Low-cost Housing" tag on it for media purposes. Why bother making disaster relief homes if the homes in question are second disasters waiting to collapse themselves? Why bother calling an estate low-cost if only the crème de la crème of the society can afford it?

The issue stems deep within the government and grows out to construction companies who profit off people. The construction strategies are so outdated, and no one is making any effort to learn new construction methods or implement them. Anything that costs construction companies' money instead as opposed to earning more money is greatly frowned upon!

Architects do their part to implement new construction in their design, but it's hard for clients to get that done if it's too expensive to implement since the construction method is vaguely used.

The housing dilemma in Nigeria runs so deep it is almost impossible to combat it from one source. The average Nigerian lives in a rented apartment with almost no hopes of ever owning a house in their name, while the government just plays around from their high horses making crap homes for people to live in.

—Lami Olorunkosebi



THE HEART OF CITIES

In modern architecture with the rapid growth of globalization, a significant problem to concern is the concept of "urban identity". Many cities have lost their original images, characters and souls that are supposed to be felt and understood, they lost the ability to show people their unique developing timeline and stories, especially those with a heritage, cultural, and historical significance.

Da Lat is a small city of approximately 215,000 residents, but it welcomes over three million tourists every year. For a time, it was the capital of French Indochina. Da Lat in the Central Highlands is home to some of the finest examples of French architecture in Vietnam. When created Da Lat, the French gave the city its wide boulevards, broad roundabouts, and pretty flower gardens, the city didn't have any internal traffic problem without traffic light system. The architecture of Da Lat is dominated by the style of the French colonial period. Unique buildings were created to suit the mild climate. There is also an impressive collection of modernist architecture - much of it by Vietnamese architects. Da Lat is also well known for a series of three Mansions of the Vietnamese Last Emperor. Sadly, to cope with the surge in tourism and demand for housing and new places to meet to need of the huge number of tourists, the pristine forests around the city are increasingly being sacrificed, far less attention is paid to the original beauty and identities of the city. People who try to set up houses in the forests are using acid to kill the tree roots, and then petitioning the government for authorized trees removal. "In Vietnam's battle to balance growth and preservation, the former is clearly winning". Viet Nam's tourism industry is continuing to skyrocket and in order to preserve the natural beauty of historical cities like Da Lat, architects and planners have to be cautious to preserve the initial attractions, the charm and beauty that made them such coveted destinations in the first place. The local people, especially the old generation cannot recognize parts of their beloved city anymore, so do many tourists.





Da Lat's architecture often has a strong sense of harmony with the surrounding nature, from public building to luxurious villas. Many heritage buildings around the city are gradually forgotten and destroyed. With cities like Da Lat, it is important to show and tell the story where the city was formed as an expression of natural, spiritual, material, social and political conditions. A visitor center at the gateway and also located in the city center-where all the main activities take place-which responds to the local culture and landscape, architecture and lifestyle of Da Lat, find a way to connect the past-present and the future development of the city—while also meets the needs of people and bring energy to the site. It is important to design the new buildings and places for this city from a global perspective while still maintaining both the spirit of place and the symbolic identities.

-Mai Pham



GOING FURTHER

WHY, AND HOW, ENVIRONMENTAL ARCHITECTURE CAN, AND SHOULD, DO MORE THAN WE KNOW IT CAN NOW.

Green and sustainable architecture have been necessary movements in making lasting, impactful change in mitigating negative human influences on our environment. However, both these movements haven't done enough. Neither have been able to generate the change needed to negate and sequester carbon emissions, foster community, or harmonize the built environment with the natural one. The construction and built environment contribute to 36% of energy use and 39% of carbon dioxide. (IEA, 2019) To combat this, we need to focus on better establishing architecture's role in both the natural and social environments, and how to create meaningful architecture that is ecologically and environmentally driven by design and supplemented through technology. We need to establish a set of principles that can aid the practice in guiding people through the Environmental Architecture design process. This includes using vernacular expertise, materials, and methods as a base, as well as using the natural environment as model and reference. Additional aspects to include are the use of science and technology to make buildings self-sustainable, and welcoming nature to become a part of the architecture itself. Buildings have the potential to be entirely self-sufficient with water, energy, and clean air, but should be capable of transferring these needs to neighboring buildings, implementing a strategy seen within forest ecosystems. Sustainability needs to be transparent to the everyday person. Hiding environmentally friendly materials, or methods, or technology, does not help the average user learn about or experience what green design can contribute to their daily life. Nature and sustainability, both natural and social, should be the drivers of an environmental practice as they bear the heaviest consequences when ignored. Materials used need to be sustainably sourced, reusable, recyclable, or organic, and should ideally be a combination of these characteristics. Technology and vegetation need to be used to supplement sustainable design, not make up for a lack of it.

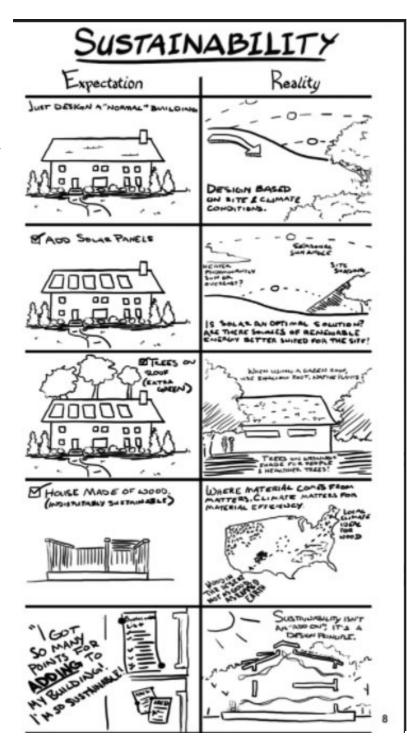
Of course, a lot of these points of eco-design drivers are well known within green architecture systems. Anyone who is passionate about sustainability, is familiar with most, if not all of these common green design principles. And yet, we are arguably still falling short of where we've needed to be since the idea of sustainability started in the 1970s. With our god-like control over a man-made hierarchy of worthy plant and animal species, with our ability to overcome any natural system of balance developed by mother-nature herself, with our ability to alter landscapes completely for better or worse, we could easily call ourselves a super-species. It has become increasingly important that as a super-species, we begin bringing nature back to our built environments, as our continued disconnect has led us to over consume and lose touch with how to better interact with our ecosystems. People have had an odd relationship to their environments, particularly in western cultures, where some plants and animals were welcomed into the built environment and others were dispelled as often as possible. Local landscapes of grasses and trees were replaced with manicured lawns and environmentally hostile buildings. Many plants and animals have been pushed out for their apparent lack of immediate necessity for people. This necessity may be born out of culture, out of aesthetic, or out of perceived usefulness. Regardless of its origin, we need to do better.



Connecting with nature shouldn't require us to spend a weekend camping or going on a day hike. It should be right outside our windows, nested into our walls. Why should I have to live out in the woods to watch the finches scrounge around for seed every morning? Why do I need to travel outside of a town or city to watch local bees collect pollen from native plants, or spot bats catching mosquitos? What if buildings and nature were wrapped up in one another, inseparable, entangled? This isn't to say "pure" nature isn't important for needed escape from the highly urban environment, but that we need another layer of nature that can coexist and better our concrete jungles and pavement microcosms. This layer should fall between the scales of parks and buildings and should bring forth the aspects of the local environment in such a way that we can begin rehabilitating our local ecology. Buildings have provided humans with habitat made for us and us alone, and at the expense of nature's tenants that came before. Sustainability has helped us find more ways of designing locally and with minimal energy use, but I believe we can take this further, that architects can become ecological designers as well as social designers. We ought to be designing for multiple habitats, human and non-human, and begin to weave the needs of the ecosystem in with our own. This might seem a strange, maybe all too eccentric prose at first, but until recently in human history, we've always been closely connected to our environments.

What I am suggesting isn't a return to a lucid "good ol' days," but rather, a re-implementation of what was lost with industrialization and modernism, a solution that has been retrofitted and adapted to the built environment of today and of the future. Perhaps we learn to let things flood, designing so that buildings float or are built with flood-able ground floors, or maybe we just build around flood zones, creating seasonal access to land that won't always be above water. That concrete jungle could become intertwined with mountain-like landscapes, a balancing of towering buildings and towering landscape. Towns might appear as row-houses or quaint downtowns from street-level, but from an aerial view might appear as flowering grassland inlaid with a crisscrossing of streets and people. Whatever the ambition, the goal is to find new ways for people to coexist with nature and to reconnect with it through architecture.

—Jenna Shafer





REFLECTION, REVELATION, AND CONGREGATION

Today, we are in the world of globalization which has affected not only the social, economical lifestyle but it also has brought changes in the field of architecture, especially in the developing countries. We can argue that developing countries have equated their economic success to modern architecture as a form to demonstrate that they are advancing and developing. But, by assuming and accepting a role in globalization, we are neglecting and deconstructing our own cultural identity, what separates us from the rest of the world. As a heterogenous culture we need to fight to avoid the introduction of global culture that would just create a homogenous world with one identity and lifestyle. Global architecture is creating uniformity all around the world. We are forgetting that our cultural identity is a matter of being as well as becoming, and thus belongs to our future as much as our past. Ultimately, our structures are visual narrators of our history and will stand long after we are gone so, we must take a stand and design towards an architecture must go back to its true meaning of expressing the aspects of the local culture. There is the common perception about how much architecture influences culture and how much culture influences architecture can be the major player in rebuilding and reviving the culture and architectural identity in developing countries where their native identity is vanishing.

Nepal is a developing country and especially Kathmandu, the capital of Nepal has been vastly affected by the global architecture. Historically, the valley had Newari town ownership where one could experience an integration of architectural and urban elements such that the design was intricately woven into the urban experience of the valley. The network of winding oblique angled streets and alleys physically rather than visually lead towards a monument, as the visitor sees the important feature only upon entering the space which can be referred as element of surprise or element of discovery, which can be a particularly overwhelming and dramatic spatial experience. Despite the uniform building material, the rows of symmetrical houses, palaces and monuments were never monotonous, mainly because of the level of the carving skills of local artists. These unique and beautifully carved monuments have helped Kathmandu to be enlisted in UNESCO World Heritage Site.

However, the pursuit of modernity in Nepal began with the redevelopment of the entire southern quarters of a prominent street leading to historic Durbar Square in Kathmandu as part of rebuilding after the 1934 earthquake. In 1955, Tribhuvan International Airport was inaugurated, opening Kathmandu to the outside world. Much has changed since then with the city's building and space going through rapid change within a compressed time frame. Current design is dominated by distinctive patterns of the Western suburban ideal comprising the style of detached or semi-detached homes and high-rise tower blocks. Traditionally, private houses were organized around a semi-public square and this housing was clustered around a public space known as Durbar square. The embedded nature of public and private spaces was unique to Nepalese society that accommodated the age of socio-cultural and religious practices. But today, in the process of accepting global architecture, it is not only limiting opportunities for social interaction but also eroding traditional housing forms and spatial systems. Moreover, the recent devastating earthquake of 25 April 2015, which flattened over 600,000 buildings, further placed the new architecture styled structures in core city areas.



Also, we must not forget that Nepal gets a lot of tourist every year as, it is said that Nepal has three religions—Hinduism, Buddhism and Tourism. Recently in 2019, 1.17 million tourists visited Nepal. With this high number of tourists visiting Nepal, the country should aim to provide truth and relevant experience corresponding to the identity of nation. We can also use this tourism to express our culture and maintain it alive, basically providing information to the tourist about the culture and enabling the unique environment that they seek during their visit.

So, I believe a Cultural center in Kathmandu could reinforce native values and revitalize the culture in the valley bringing back the memory to the people. Based on three main principles- Reflection, Revelation and Congregation, the center will help to maintain and stimulate the pride and knowledge of the traditions and will deepen visitors' understanding of native culture and religion and provide spaces for social gathering and functional/festival events. A public space where the culture can prosper and flourish despite the urban sprawl. An architecture that will create a 'sense of place' through traditional values and beliefs, understanding of materials, architecture of the traditional settlement as well as construction methods as, architecture can be a major player in revival of traditional culture and identity.

-Oashan Shrestha

GENERIC ARCHITECTURE

There is a lack of design in the majority of the buildings we experience on a daily basis. We see this in the residential areas of our communities, in the restaurants in our cities, in the hotels on our vacations, and in the grocery stores around the country. It seems that the majority of buildings are designed by engineers, or at least by architects who think like engineers. Designers aren't looking for the creative and innovative solutions, they're just looking for something that simply 'works'. The problem we are left with here is 'copy and pasted' buildings: chain restaurants, retail stores, hotels, and the practically identical homes we see in the suburbs. These 'copy and pasted' designs are what make up generic architecture. There is no unique experience in these buildings, they do not provoke any emotion or meaning, and they feel dull.

The major issue with generic architecture is that we are left with buildings which are irrelevant to their site and destroy the sense of place. We as architects should strive to create architecture which is responsive to the site conditions and reflects the essence of the site. Generic architecture provides a forgettable experience, while site responsive design provides a memorable and unique experience.

In creating site responsive architecture, building materials should be considered. How does the building materials relate to the site? How can the building materials be implemented in a meaningful way? Consider this thought provoking quote from Peter Zumthor:

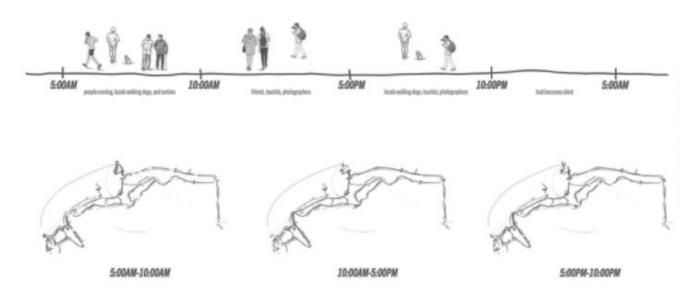
"Materials in themselves are not poetic," but the "meaningful situation" which architects create for the materials is what makes them assume a poetic quality.

There is something about walking down the streets in Rome, where buildings are unique, historic, and significant – where the sole essence of Rome, its history, grandeur and beauty is boasted proudly through the site-relevant and climate-specific building materials. The beauty of Rome comes from its sense of place which is created from the compilation of the architecture in the city.

The solution to the issue of generic architecture is simple: stop creating shitty designs. Start developing heavy research and site analysis in the initial design phase, implement building materials which are relevant to the site, use materials in a meaningful way, and most importantly challenge the boundaries and possibilities of architecture.

-Trista Spence







THE IDEA OF HOPE

"With progress comes sacrifice," or, "with progress comes change." These two phrases are easy to get behind when you are only looking towards the future. And why shouldn't we be looking towards the future? We have climate change to fix, an economy to take care of, technology to indulge ourselves in, and, in some cases, children to raise. The future is all that matters, right?

While progressing, mankind has had a history of being selfish and ignorant with the resources we are given. We did it with the industrial revolution which has lead to the current climate crisis, and as a nation we tend to be ignorant of the cultures we destroy when we gentrify our cities. Part of this gentrification comes on the heels of attempting to build a better and greener city—an apology for the climate crisis—though, ultimately, what is the "greener city?"

Portland, Oregon, for example, has decided that all new construction must be LEED or Earth Advantage certified. In theory this produces "sustainable" buildings, but the fundamental flaw with LEED certification is that these new buildings are only sustainable in theory (not to mention capitalistic corporate greed, but that's another story). And with these "sustainable" buildings, they are attempting to build sustainable neighborhoods. The result? The life of the neighborhoods is dying because the lower classes, the ones who built and curated their own culture(i.e. a resource), are being priced out. Everything that makes a neighborhood unique is ultimately handed over to boring, greenwashed architecture, and boring greenwashed citizens who think they are doing their part because they don't use single use plastics, but they still leave the lights on.

What if the basic code required sustainable building practices? Or what if code, planning, or sustainable certifications weren't the problem? What if a major step in ethical gentrification and environmental sustainability was more about education and less about monetary incentive? What if we accepted and learned from each other—what if the 3rd generation Mexican market in SE Portland wasn't ripped out to be replaced by a Whole Foods? If it were a set of ideals that simply existed and became natural to the collective mindset, we might not have to give our obedience to capitalism, but to each other instead. Finally, what if we could be respectful and responsive with new architecture that acknowledges that we don't have to sacrifice an entire class of people in order to be sustainable?

Don't get me wrong. This isn't an idea of Utopia; this is an idea of hope.

As Paul Feyerabend says, "We need a dream-world in order to discover the features of the real world we think we inhabit."

-Matt Vollendorf



ZERO ENERGY HOMES

Zero energy homes are not a new idea. Since the beginning of time man has developed structures to inhabit and to provide shelter from the elements. Just recently we have developed new technology that allows us to improve the zero-energy home concept. However, with this new technology also comes an increase in cost.

But why rely on expensive technology when we can look to the past?Vernacular architecture is an excellent example in the ways that zero energy homes have been constructed in the past. For example, the Native American Indians in the Southwest of the United States have used cliffsides to create homes and communities that block or capture from sunlight as well as to provide shelter from the elements. Natives of colder climates used animal skins at first to insulate their homes. The use of these inexpensive materials and construction methods allowed these homes and communities to be built with sustainable goals in mind. As technology continues to increase and expand throughout the years, our knowledge of sustainability and zero energy homes needs to change. Why do we constantly focus on photovoltaic panels, water harvesting methods, and wind turbines to power our homes communities when other methods far more cost effective can achieve the same results.

Zero energy homes can be achieved on a budget as well as with the desired goals of the user. Rethinking the term zero-energy home needs to be started. We need to begin to think about sustainable and zero energy homes in a different way.

Have we considered simple design orientation?

What would homes look like if they were designed with vernacular architectural principles instead of technological architectural principles?

Are there more cost-effective ways to capture sunlight, water, wind to provide power to our homes and communities?

Are there better construction methods that we have used in our homes for decades that we can use in our homes now that limit the amount of hazardous materials?

With these questions in mind can we redesign our homes and communities so that they are better in the future for our future generations.

The idea of zero energy homes needs to be reevaluated and re-thought of to provide more affordable homes for the everyday consumer.

Since when have we designed homes for the 1% instead of the 99%.

-Chris Watkins





A DOUBLE-EDGED SWORD

Gentrification is a double-edged sword; while it is used to describe the influx of money into and typically urban renewal of an area, it more often than not is associated with its connotation of kicking out poorer residents and businesses and pricing the revitalized areas for only the elite.

In cities across America, and frankly the world, a diaspora of the lower class is taking place, even when the best intentions are held. Time and time again when cities are needing a boost and revitalization occurs, it is the low-income and less fortunate who are forced to relocate in order to make an area more "tourist friendly" and aesthetically pleasing.

Don't misunderstand, urban renewal is a great thing; but it is only great if it takes into consideration its local population and those that it will impact the most. Unfortunately, rarely are the voices heard of the local population, often spoken over by those wielding money and therefore the decision-making power for the revitalization.

In a world heading toward a majority of urban residents, a projected 6.3 billion in 2050, it is extremely important to find a way to make cities affordable for all classes, and provide housing options for them. No longer can we continue the pace of urban sprawl we once have, pushing those with lower incomes to the edges as city centers become the playground for the rich and elite. No longer can we sustain single-family suburbia lands that segregate classes of people and isolate communities with car-dependent travel.

We must rezone our city centers to include mixed-use facilities, mixed income levels, and provide housing options that allow their original communities to continue to live and contribute to the cities they love. We must encourage urban renewal and sustainable building while avoiding the plagues of gentrification. The way of the future is not to erase the past, but to integrate our history and heritage as we move forward together and build upon our cities, making them a haven for all..

—Alayne Zollinger



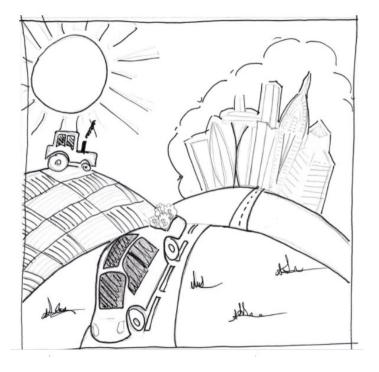
THE GATEWAY TO SMALL TOWN EXPANSION

Urban areas have always sparked culture and economic development, making them attractive areas to live for anyone seeking opportunity. Urban areas also can provide sustainable avenues for living by providing public transit, an abundance of resources and advanced income opportunities. In the recent year urban cities have experienced less and less growth because of overcrowding, cost of living, crime, and other urban issues. The current state of the world has only escalated this decrease in population growth. Jobs no longer are bound to cities as more and more employers are able to communicate with their employees remotely. This poses the question, where are the people migrating too? Many of these people are moving to rural areas known as Gateway Towns. Counter-urbanization, and de-urbanization, were previously what I thought this migration would be classified as; however the reference that encompases this behavior from urban to rural movement I want to focus on is characterized as Amenity Driven Migration.

I want to explore what will happen to the culture of rural areas that experience mass Amenity Migration, and how communities plan for an influx in the population. This is not an issue that was created by the pandemic, some places have been experiencing this growth for years such as; Jackson, Wyoming, Moab, Utah, and Sun Valley, Idaho. Community Officials in these rural areas are experiencing difficulties in the planning and management of this growth and its effect on the culture and resources of their town. A task force has been established to help to understand what is happening in these communities called the GNAR (Gateway and Natural Amenity Region) and according to their findings "80% of respondents reported that housing affordability was moderately or extremely problematic for their community. Respondents also cited traffic congestion and other transportation issues as problems. These issues appear to be more strongly associated with population growth". (Levire) This article also outlines the basics of these problems and the lack of resources available for solving them.

Urban living is changing, and because of that so are these smaller communities. The life blood and culture of these Gateway Towns lies in managing how these changes are handled by local officials and those who call these places home. Managing the need for resources and economic development are needed to maintain these unique communities.





-Karlee Peterson