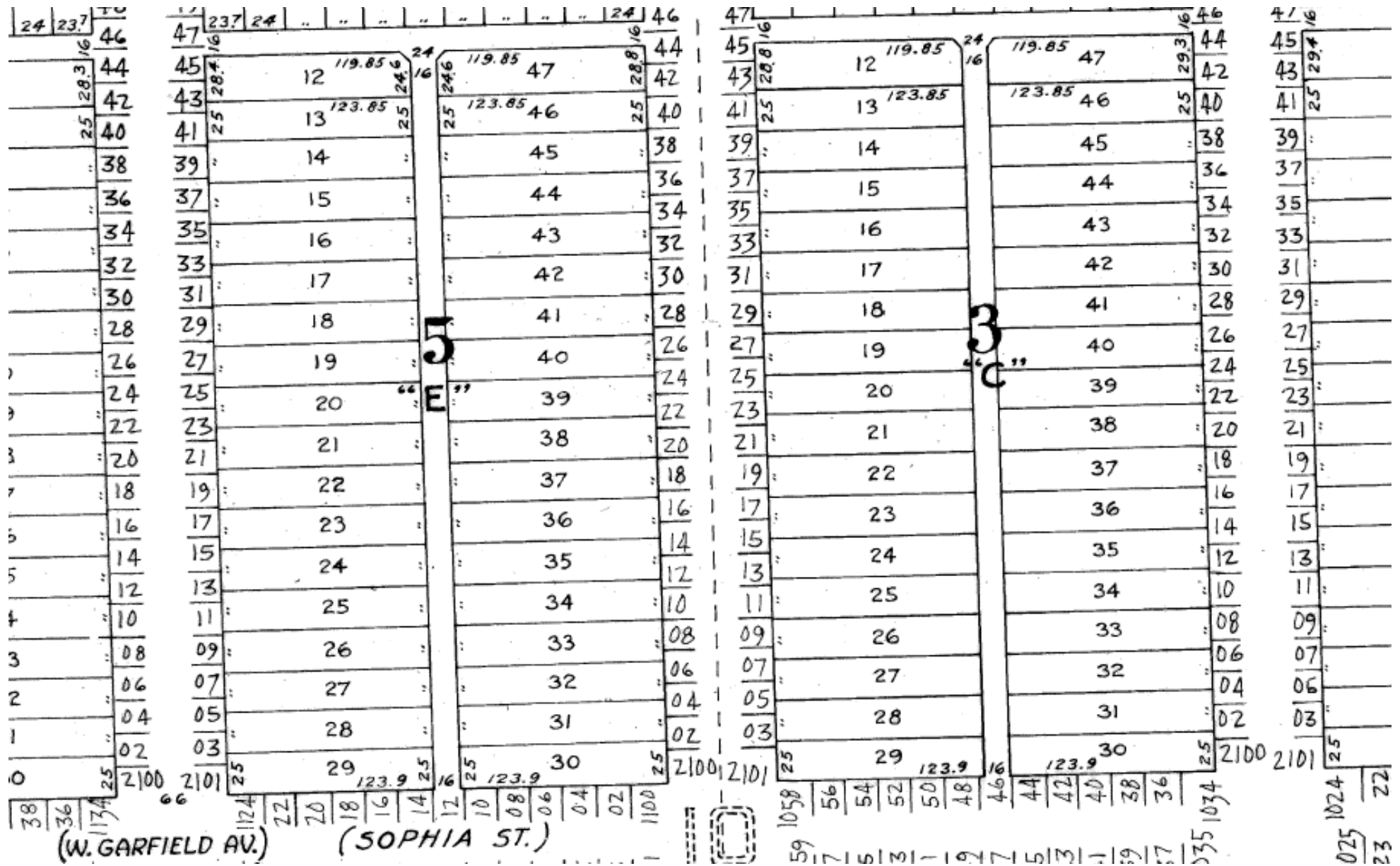


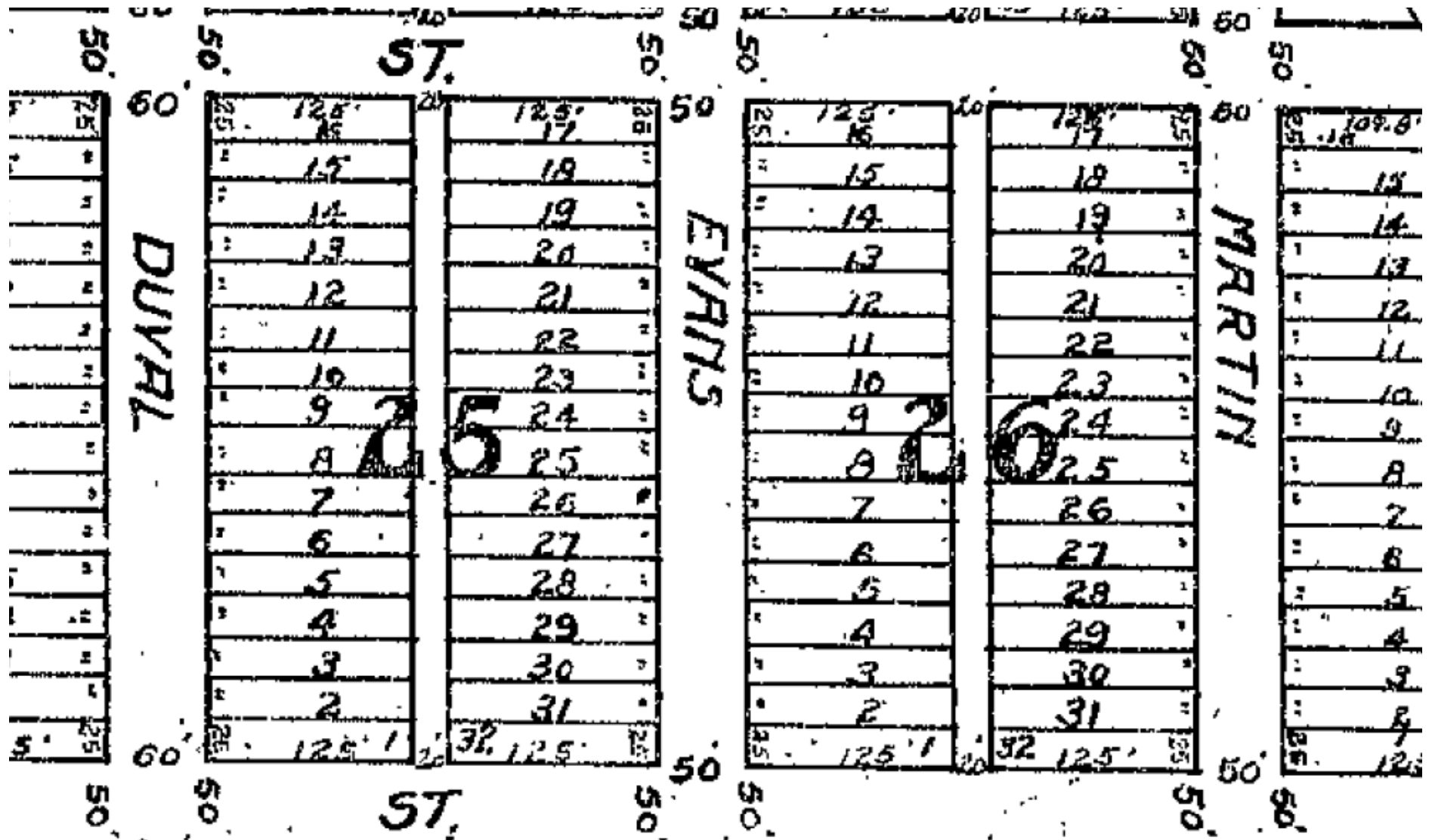
IDENTICAL LAND PLANS
AND THE EFFECT OF ZONING ON HOUSING
AVAILABILITY & TRAFFIC

By: Infill Builder David Whitworth

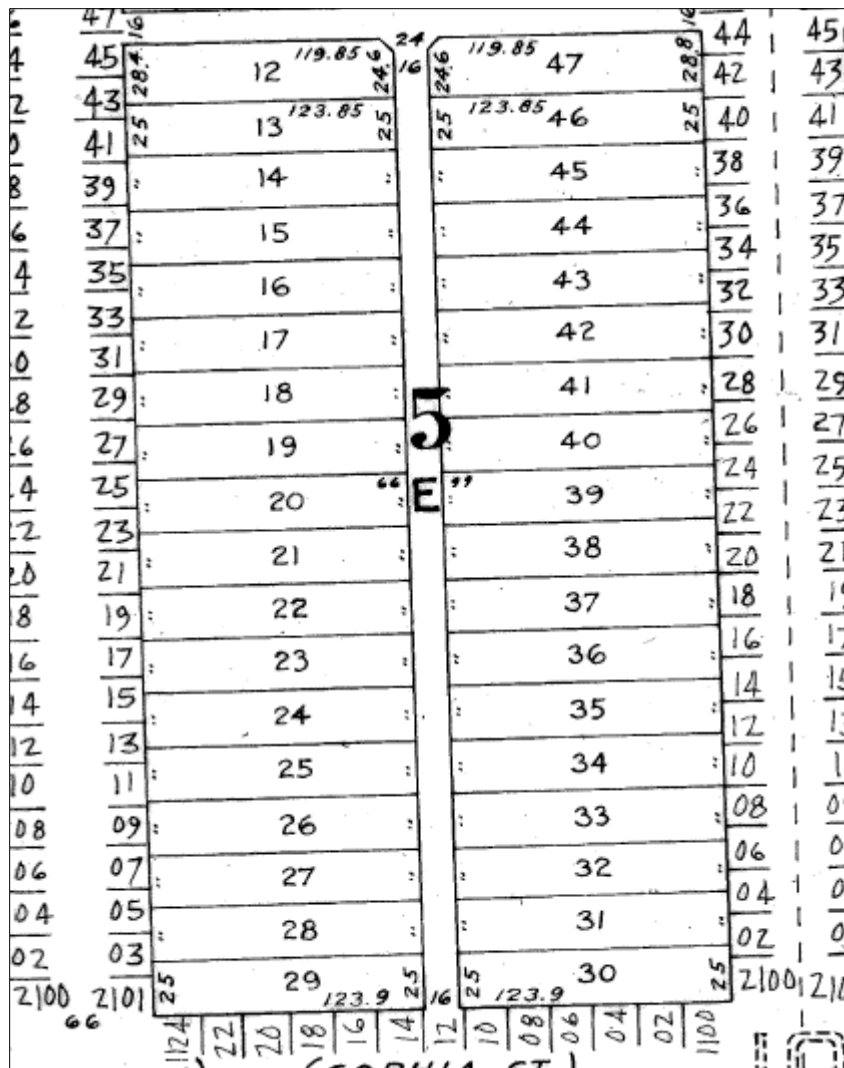
2015



CHICAGO-TYPICAL RESIDENTIAL NEIGHBORHOOD PLAT

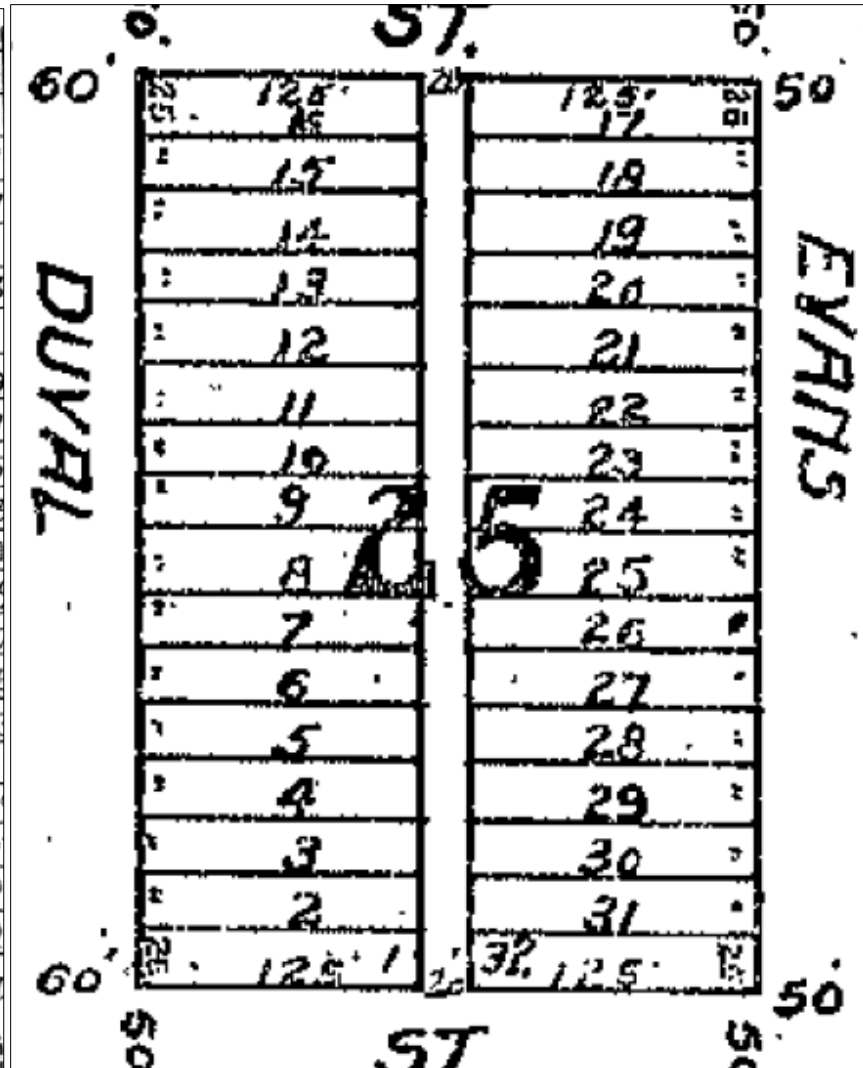


SAME LAND PLAN- WHAT CITY?



CHICAGO

Side by side the land plans are almost identical with 25ft wide lots serviced by alleys. Austin allows a single home for every two lots while Chicago allows "3 flat" housing on each single lot. Chicago instantly has 6 times as much housing availability on a block.



AUSTIN (North Loop Neighborhood)



Chicago



Austin

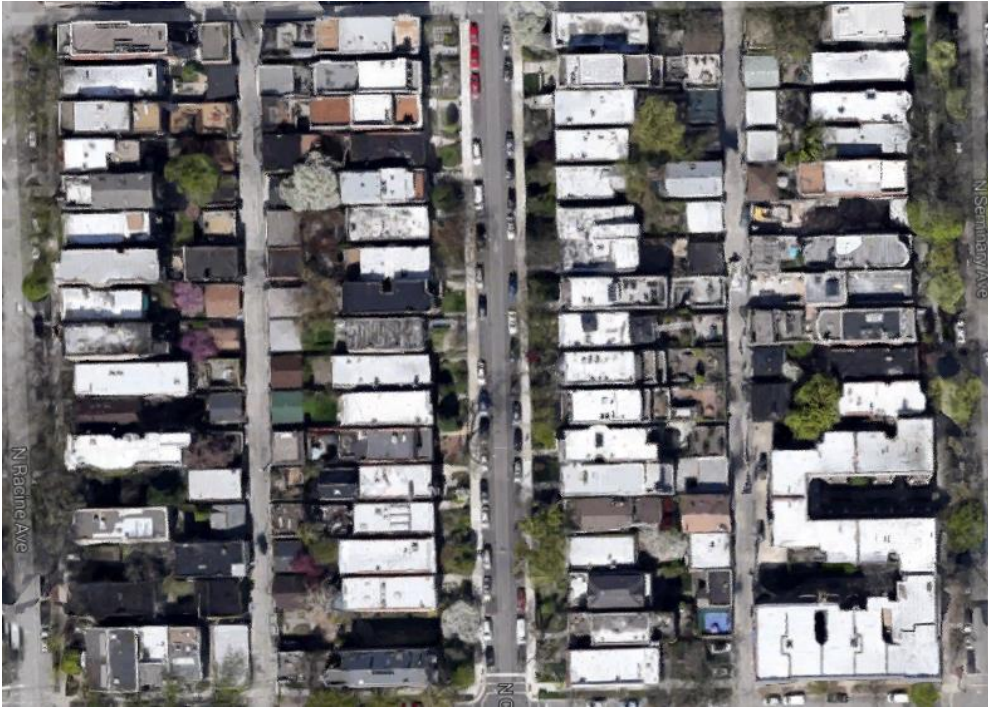
You can see Chicago enjoys sidewalks and landscaping/trees within the right of way for a pleasant streetscape. Chicago zoning supports local neighborhood businesses along the corridors because there are more people living in the walkable community that can patronize non-destination type businesses. Chicago also has a functional mass transit system for two reasons: 1) This is a much healthier tax base for city revenue 2) The proximity of citizens and businesses makes ridership feasible. The problem in Austin currently, is that our zoning does not accommodate people in the urban core while we have an affordability crisis. We also don't want to build a bridge over the river to serve everyone who had to move South to Circle C. Austin has some serious planning decisions to make with CodeNext. Important Note: The picture above shows 6 times as many residents paying property taxes for the same linear foot of public infrastructure (road, water, sewer etc.).



Chicago Residential Building Footprints.



Austin Residential Building Footprints.



Chicago Residential Building Foot Prints (Note: They still have trees!)



Austin Residential Building Foot Prints (Note: We don't have sidewalks)



Chicago Alleys are a functional & utilized element of public infrastructure. You can get the cars away from the front of the homes (no snout houses), and alleys are an important place for infrastructure such as utilities, trash truck routes etc.



Austin Alleys are completely forgotten to time and haven't been paved after a century. Homes are fenced off completely from the forgotten alleys. This detached garage doesn't even open to the alley. Amazing missed opportunity in Austin alleys.

(becomes a great place to dump mattresses)



Austin Transit (Mopac)



Chicago Transit (Train)

Austin has hit a tipping point in terms of traffic. Maybe Uber or Google driven automobiles will help, but the task of paving our way out of congestion is daunting and it may not even help if our zoning and increased road capacity incentivizes even more sprawl that will fill these roadways. We could find ourselves at the same place. Mass transit in Chicago works. People can get a little work done, and I personally see something positive about interacting with fellow citizens.



Just being a tourist here walking under the “L” which was something I had never seen outside of TV or the Movies. Interestingly, the “L” was privately owned until 1947. It is amazing to think it was ever a viable for-profit endeavor.



Pacing off the 25 foot wide lots and probably having some kind of epiphany about it.



My sister lived in Chicago on a modest income and without the expense of a car. Loved it. Excellent quality of life. The pictures above are of us getting around to all the cool places in Chicago without a car. You can't live in central Austin on a modest income at this point. Few can do it without a car.



Lake Michigan. Still not convinced it isn't saltwater. Keep clicking to get back to the meat of this presentation.



Museum of Science and Industry. Last standing building from the 1893 Chicago World's Fair (Read Devil in the White City!) Keep clicking.



The “Rookery”. World’s first skyscraper at a whopping 12 stories. Designed by Burnham and Root. Burnham also prepared the 1909 Chicago City Plan that had a positive impact on Chicago as well as city planning in general. Austin currently has an architect Daniel Parolek of Opticos revising our land development code to implement the goals of our comprehensive plan “Imagine Austin”. Keep clicking!!



Austin does not have an advantage on “weird” or hipsterism.

Above: A Chicago pizzeria features live entertainment by hipster tap dancers.

Below: At a neighborhood bar, Captain Chicago and the Mayor of Guytown do a bit on local politics and the perils of development. Some things are the same everywhere, if only they knew how lucky they are!





More examples of homes on 25 foot wide lots. Chicago's zoning designation "RT-4" (residential three flat) makes use of old urbanism.



More examples of homes on 25 foot wide lots. Chicago's zoning designation "RT-4" (residential three flat) makes use of old urbanism.



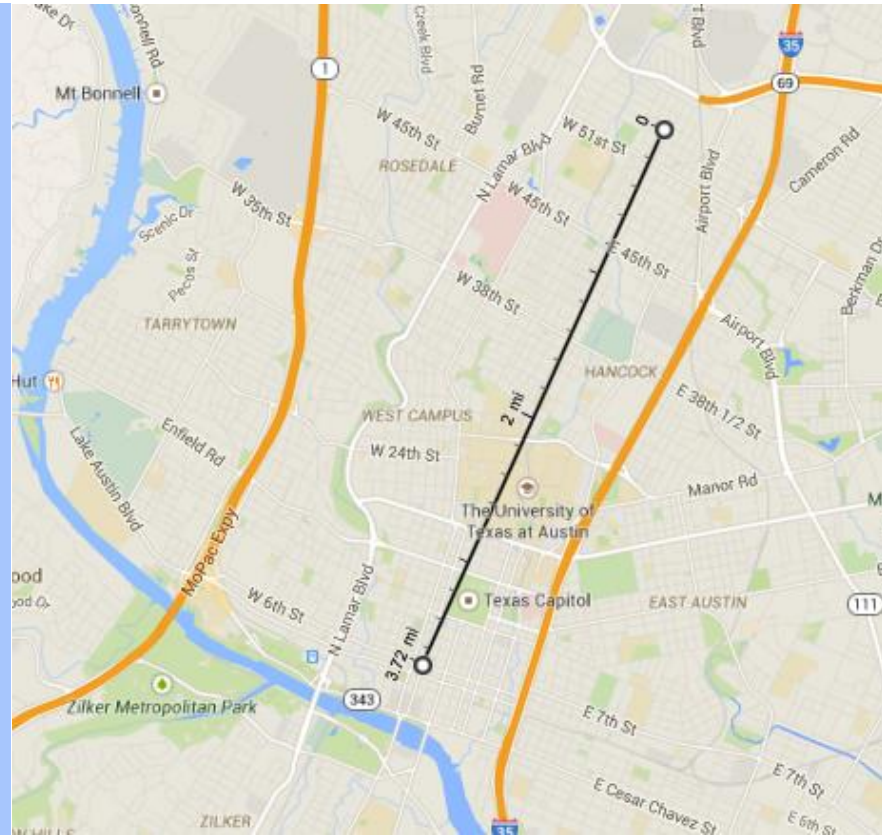
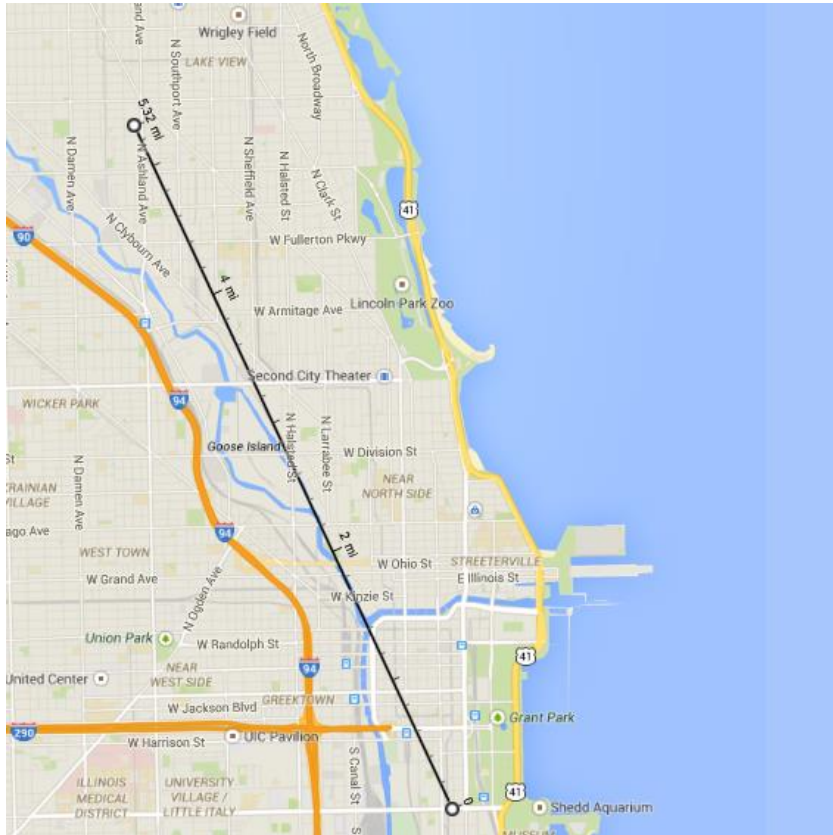
More examples of homes on 25 foot wide lots. Chicago's zoning designation "RT-4" (residential three flat) makes use of old urbanism.



More examples of homes on 25 foot wide lots. Chicago's zoning designation "RT-4" (residential three flat) makes use of old urbanism.



Even when they build new, they follow the same basic principles of old city building. These are probably expensive new homes.



Lincoln Park: 5 miles from downtown

North Loop: 4 miles from downtown

Chicago Incorporated 1837

Austin Incorporated 1840

Here you can see that the two neighborhoods being compared are very similar in proximity to downtown. However, Chicago surpassed 1M population in the late 1800s whereas Austin will likely do so shortly. Chicago had to build in a more compact and connected fashion utilizing mass transit out of necessity because they hit 1M in population before the car. Austin was still only 42,174 population in 1925 and was in a position to stray from traditional city building patterns as the automobile became more and more prominent.

2013 rank ↕	City ↕	State ^[5] ↕	2013 estimate ↕	2010 Census ↕	Change ↕	2013 land area ↕	2013 population density ↕
1	New York^[6]	New York	8,405,837	8,175,133	+2.82%	302.6 sq mi 783.8 km ²	27,012 per sq mi 10,430 km ⁻²
2	Los Angeles	California	3,884,307	3,792,621	+2.42%	468.7 sq mi 1,213.9 km ²	8,092 per sq mi 3,124 km ⁻²
3	Chicago	Illinois	2,718,782	2,695,598	+0.86%	227.6 sq mi 589.6 km ²	11,842 per sq mi 4,572 km ⁻²
4	Houston^[7]	Texas	2,195,914	2,100,263	+4.55%	599.6 sq mi 1,552.9 km ²	3,501 per sq mi 1,352 km ⁻²
5	Philadelphia^[8]	Pennsylvania	1,553,165	1,526,006	+1.78%	134.1 sq mi 347.3 km ²	11,379 per sq mi 4,394 km ⁻²
6	Phoenix	Arizona	1,513,367	1,445,632	+4.69%	516.7 sq mi 1,338.3 km ²	2,798 per sq mi 1,080 km ⁻²
7	San Antonio	Texas	1,409,019	1,327,407	+6.15%	460.9 sq mi 1,193.8 km ²	2,880 per sq mi 1,112 km ⁻²
8	San Diego	California	1,355,896	1,307,402	+3.71%	325.2 sq mi 842.2 km ²	4,020 per sq mi 1,552 km ⁻²
9	Dallas	Texas	1,257,676	1,197,816	+5.00%	340.5 sq mi 881.9 km ²	3,518 per sq mi 1,358 km ⁻²
10	San Jose	California	998,537	945,942	+5.56%	176.5 sq mi 457.2 km ²	5,359 per sq mi 2,069 km ⁻²
11	Austin	Texas	885,400	790,390	+12.02%	297.9 sq mi 771.5 km ²	2,653 per sq mi 1,024 km ⁻²
12	Indianapolis^[9]	Indiana	843,393	820,445	+2.80%	361.4 sq mi 936.1 km ²	2,270 per sq mi 876 km ⁻²
13	Jacksonville^[10]	Florida	842,583	821,784	+2.53%	747.0 sq mi 1,934.7 km ²	1,120 per sq mi 433 km ⁻²
14	San Francisco^[11]	California	837,442	805,235	+4.00%	46.9 sq mi 121.4 km ²	17,179 per sq mi 6,633 km ⁻²
15	Columbus	Ohio	822,553	787,033	+4.51%	217.2 sq mi 562.5 km ²	3,624 per sq mi 1,399 km ⁻²
16	Charlotte	North Carolina	792,862	731,424	+8.40%	297.7 sq mi 771.0 km ²	2,457 per sq mi 949 km ⁻²
17	Fort Worth	Texas	792,727	741,206	+6.95%	339.8 sq mi 880.1 km ²	2,181 per sq mi 842 km ⁻²
18	Detroit	Michigan	688,701	713,777	-3.51%	138.8 sq mi 359.4 km ²	5,144 per sq mi 1,986 km ⁻²

Chart from Wikipedia

Austin is the 11th most populated city in the nation and growing faster than any city on this list. Austin already takes up the same land area as New York with only a tenth the population. Yet Austinites currently struggle to find housing. Austin can accommodate further growth by increasing land area or by increasing density. Increasing land area will put pressure on the environment and our highways. Increasing density will help municipal tax revenue, decrease urban housing costs relative to non-dense urban housing, and make transit alternatives more viable. Not to mention a whole generation of new homeowners can no longer afford to live near Central Austin which is troubling. We are losing families. We are losing the the creative people that put Austin on the map.



In 2012 I realized the original 25 foot wide lots had become viable again through a neighborhood plan infill tool called “small lot amnesty”. The only problem was Austin had 10ft worth of sideyard setbacks which left only a 15 foot strip for homes. Doing what anybody else would do in this situation, my wife and I headed to New Orleans. To the left you can see me standing in front of a home with my 6ft wingspan. With the viability of narrow homes thus verified, we again did what anybody would do in this situation and we ducked into the French Quarter district for a Ramos Gin Fizz and a Sazerac.



It was time to bring the small lot home back to Austin! Here you can see our version of the Austin Small Lot Home under construction in North Loop. Since such an old concept was essentially new again, it took a little work with city staff to get on the same page and set things up correctly.



And the lesson learned was that by better distributing the land cost component of a home we were able to build the 6 most affordable new homes in MLS area 4 last year by more than \$200k below average sales price. These homes also came in slightly below the average sales price of all homes new and old in MLS area 4 last year (MLS area 4 generally coincides with the area in Central Austin where Districts 4,7,9 &10 meet). This brought young families back to the neighborhood. This also represents a three times increase in city tax revenue while these individual owners are paying less than the average property tax. Now we have three tax payers contributing to the same 75feet of public infrastructure in front of these homes. These homes also have rear detached studios that if rented represent an opportunity for a market affordable housing component that further decreases the cost of ownership .
PS. The original home at this site was relocated out the county and not sent to the landfill.



Context



Context



Context



Context



Look for two more small lot homes under construction this year directly behind Drinkwell. And stay tuned to see if Austin retains this zoning tool or removes this zoning tool. This location is close to an excellent bus line, near the red-line urban rail, and close to downtown & campus. Owners can frequent nearby shops, businesses, restaurants, and even a corner store so they don't have to get the in the car for a gallon of milk. This neighborhood has really come to life with people biking and walking to and from all the local establishments.



We opted for an old “main street” style here playing off the North Loop business district nearby. Homes feature detailed parapet roofs and metal awnings.



Here you see a small lot home next to a small home on a large lot. Both are single family detached housing and within the context of single-family neighborhood character. One thing to think about during CodeNext is that Austin has an ordinance that limits the allowable building envelope, and another ordinance that limits the allowable occupancy. Why not allow architects to accommodate a 4-plex within the structure to the right if it would look exactly the same? Four 700sf 1-bedroom units could be good for the young first time buyers at about \$198k or 80% MFI. Could also be good for the older owner to the left should she choose to sell her home and reap the equity of her nest egg but stay in her original neighborhood. Currently she has no cost effective downsizing options as an owner that would allow her to stay in her neighborhood.





Elvis Summers befriended a woman in his Los Angeles neighborhood only to discover later that she was homeless. Upset, Summers took \$500 to the building supply store and built her a home. This will not solve Austin's problems, but the point is a whole world of housing options exist between this \$500 structure and a \$400k home in central Austin. Freezing existing zoning in place is not successfully freezing the pricing of the existing housing stock. Again, Mueller is a good example of ways to lower housing prices through better land planning. Currently, townhomes are being built in Mueller on 20x40 lots. 5,750sf minimum lots sizes in central Austin are too large and an anomaly to other cities. The natural way to decrease housing costs in central austin is to think about the land plan.

How Los Angeles Engineered a Housing Crisis:

http://www.salon.com/2015/04/05/the_incredible_shrinking_megacity_how_los_angeles_engineered_a_housing_crisis/



Missing Middle Ideas- Stacked Duplexes



Missing Middle Ideas- Four Plex

This is located in the Bishop Arts District in the Dallas neighborhood of Oak Cliff. These 1-bedroom units rent at \$800/mo. This fits in with the general mass and scale of the single family homes in the neighborhood. We could build these 700sf units in Austin at around \$198k per unit which is below 80% MFI. Young married couples or retiring boomer couples could enjoy this lifestyle. Or with our visitability ordinance, older people could “age in place” and move into the first floor. Plus they have neighbors to check in on them.



Bishop Arts District (Oak Cliff Neighborhood) – Dallas Texas

This is what a neighborhood looks like when there are abundant housing options at various price points. A community.



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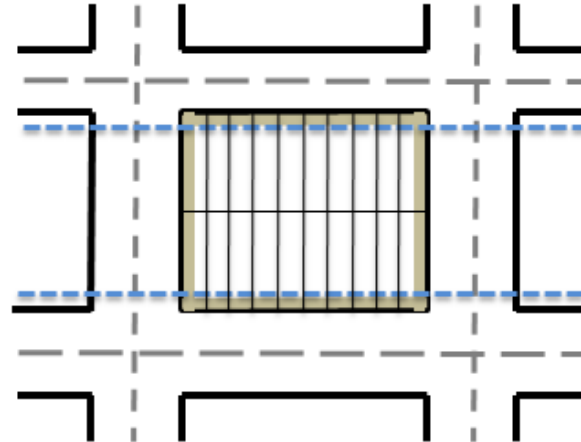
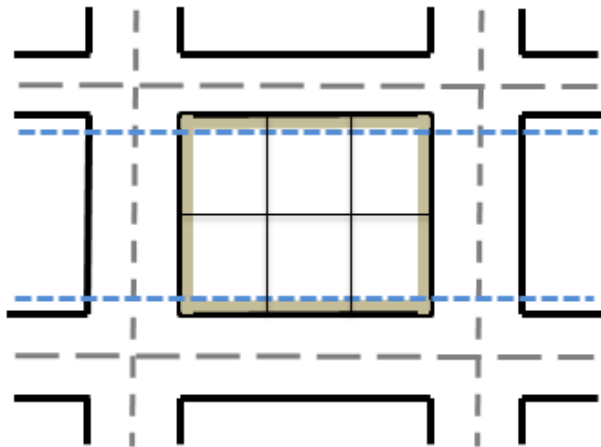
Bishop Arts District (Oak Cliff Neighborhood) – Dallas Texas

This is what a neighborhood looks like when there are abundant housing options at various price points. A community.

Affordability and Infrastructure How Missing-Middle Housing Helps

Suburban Density
~6 units/acre

Missing-Middle Density
~20 units / acre



800' Roads
800' Sidewalks
400'
Water/Wastewater

Cost Per Home:

\$775,000

\$355,000

Total Annual Infrastructure Maintenance Cost to City/acre

[]

[]

Total Annual Taxes Collected/acre

\$110,670

\$168,980

Total Annual Tax Burden/Household

\$18,445

\$8,449



This graphic shows two conceptual levels of density and how the cost of homeownership can decrease while increasing the total tax revenue to the city through better land use. Note: the city provides more infrastructure per home in a less dense model while collecting less in taxes.