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Costs of Government Regulation on the Construction of Single-Family Homes in the Omaha Metropolitan Area

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Introduction

This study examines the cost of government regulation on the cost of construction of new single-family homes in the Omaha metropolitan area. Data are drawn primarily from a survey of homebuilders administered in November 2022. This study replicates a study done by the National Association of Home Builders (NAHB) in 2021 (Emrath, 2021), and compares the costs for the Omaha metropolitan area to the national costs. We estimate that the regulatory costs in the Omaha metropolitan area are 32.8% of construction costs compared to the national average of 21.5%, mostly due to changes in building codes and architectural standards. In dollar values, costs of regulation in the Omaha area are \$94,834 compared to \$52,540 nationally. Survey respondents suggest code changes that they believe could reduce costs without harm, and express concerns about delays in providing power to new real estate developments. Increasing staffing levels at OPPD, MUD, city planning offices and state agencies should be considered.

Methodology

The survey is attached as Appendix A. The survey had a response rate of 14.7% compared to the response rate for the NAHB survey, which was 2.75%.¹ The data reported here is for all responses, including those who said there was no cost for a particular regulation.

The average value of the sales price for a new construction single-family home in the Omaha metropolitan area in November 2022 was \$467,162 (Great Plains Regional MLS, 2022). In the NAHB study, the national average new construction single-family home price was \$394,300 and they found the average ratio of construction cost to home price was 62%. We apply this ratio to the \$467,162 home value to derive a construction cost of \$289,640. The survey asks respondents the cost of regulation in various phases of construction and determines the cost of regulation as a percentage of total construction cost, and then we calculate the cost of regulation as a percentage of home price and in dollars.

In developing residential properties there are two phases, the development of lots, and the construction of the structure. In both phases, government regulation can affect the cost of construction, and therefore the price of the new home. In this study we focus on the second phase, the construction of the structure.

Federal, state, and local regulations all affect the costs of construction. It is difficult to break down these regulatory costs by type of government, and so we only do so for the costs of labor safety standards which are mainly imposed by the federal Occupational Safety and Health Administration (OSHA). We ask respondents opinions on which local government regulations could be revoked with little harm, and which state and local entities slow down or increase the cost of bringing a new home to the market.

Costs of Regulation

Table 1 shows the average costs from the survey for five parts of the construction process:

1. Fees paid by the builder after acquiring the lot. This might include costs for permits, inspections, and utility hookup fees.
2. Cost of the changes in building codes over the past ten years. This represents the cost of updates and revisions to building codes.
3. Architectural design standards beyond standard practice. This may include the costs of standards for siding, windows, landscaping, garage orientation, fence or shutter materials, and window size.
4. Compliance with OSHA or other labor regulation costs, including the cost of delays to comply with regulation. In addition to the costs of labor this might include the costs for sub-contractors, and materials and fees.
5. The cost of delay in complying with regulations beyond normal costs, such as obtaining permits or inspections. This is estimated in the number of weeks of delay and converted to a cost as a percentage of the construction cost.

Table 1: Average Regulatory Cost During Construction of the Structure (Percentages)

	Regulation as a % of Construction Cost		Regulation as a % of House Price	
	National Average ¹	Omaha Metro Average	National Average ¹	Omaha Metro Average
Fees paid by the builder after purchasing the lot	5.0%	2.7% ²	3.1%	1.7%
Changes in construction codes and standards	9.9%	19.0% ³	6.1%	11.8%
Architectural design standards beyond the ordinary	4.4%	8.9% ⁴	2.7%	5.5%
Complying with OSHA/other labor requirements	1.8%	2.0% ⁵	1.1%	1.2%
Delay cost for complying with regulations	0.4%	0.2% ⁶	0.2%	0.1%
Total Regulation Cost During Construction of the Structure	21.5%	32.8%	13.3%	20.3%

¹ Emrath (2021).

² Two respondents reported the actual cost in dollars. We used data on the average sales price of a home and the associated construction costs to convert these dollar amounts into percentages. A reliable estimate of the average sales price of a home in the Omaha metro area is \$467,162 (Great Plains Regional MLS, 2022). Emrath (2021) finds construction costs on average are 62% of new residential sales price. Applying this ratio to the sales value of \$467,162 determines the estimated construction costs for the Omaha metro area to be \$289,640.

³ Two respondents reported that they either were not in business ten years ago or did not know the cost of changes in construction codes and standards during this period.

⁴ One respondent reported 0% which was included in the average. One respondent reported the actual cost in dollars. We use the same approach described in footnote 2 to convert this value into a percentage.

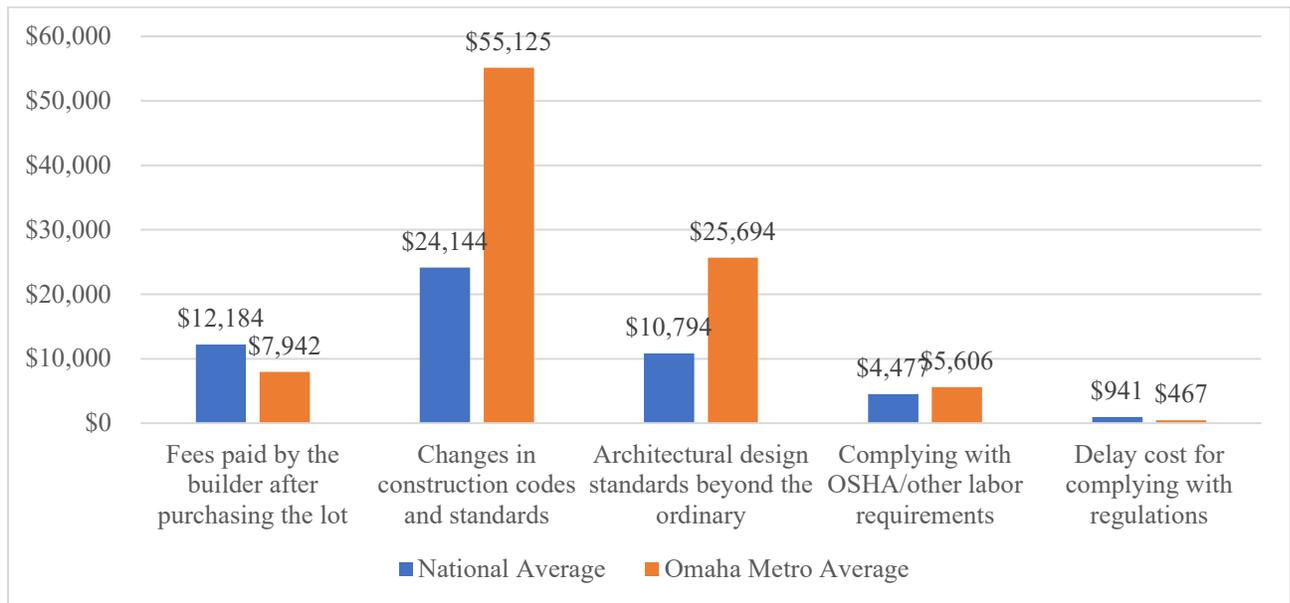
⁵ One respondent selected the option, "Don't know/use of subs makes it impossible to estimate".

⁶ We used the formula used by Emrath (2021) to convert the delay cost in weeks into a percentage of cost.

Table 2: Average Regulatory Cost in the Price of a Home During Construction (Dollars)

	National Average ¹	Omaha Metro Average
Fees paid by the builder after purchasing the lot	\$12,184	\$7,942
Changes in construction codes and standards	\$24,144	\$55,125
Architectural design standards beyond the ordinary	\$10,794	\$25,694
Complying with OSHA/other labor requirements	\$4,477	\$5,606
Delay cost for complying with regulations	\$941	\$467
Total Regulation Cost During Construction of the Structure	\$52,540	\$94,834

Figure 1: Comparison of Regulatory Cost in the Price of a Home During Construction



The costs for fees in the Omaha metropolitan area was estimated to be 2.7% of construction cost, compared to the national average of 5% (Table 1). This equated to an additional 1.7% cost of the house price, or \$7,942 (Table 2 and Figure 1).

The average construction cost for changes to building codes in the Omaha area was 19.0%. The highest costs reported were for builders operating in one community, compared to other builders operating in multiple communities. This compared to the national average of 9.9%. These regulatory costs increased home prices by \$55,125, or 11.8%.

The average construction costs for additional architectural design standards were 8.9% compared to the national average of 4.4%. In dollars, this average is \$25,694, or 5.5% of the home price, compared to the national percentage of 2.7%.

Compliance with labor regulations increased construction costs an average of 2% compared to the national average of 1.8%. This amounted to \$5,606, or 1.2% of the home sales price.

The additional time to comply with regulation beyond normal in the Omaha metropolitan area was estimated to be 2.29 weeks, compared to 5 weeks for the national average. The Omaha value equates to

\$467 in additional construction cost, or 0.2%. This is estimated to increase the home price by 0.1%. The national values are higher: 0.4% for construction cost and 0.2% for the home price.

In total, regulation is estimated to add an average of 32.8% to the cost of construction of a new home in the Omaha metropolitan area in 2022. This is 52.6% higher than the 2021 national average of 21.5% of the cost. The cost of regulation as a percentage of home price in Omaha was 20.3% compared to the national average of 13.3%. Table 2 presents the cost in dollars, which shows that the dollar cost of regulation in the Omaha area is 80.5% higher than the national figure.

The two components that had the largest effect on the differential between Omaha and the national average were the cost for changes in building codes and the cost for additional architectural design. Caution should be exercised in interpreting these values, as there was a wide range in the values of these responses for both components, and these averages are affected by the outlier values. Nevertheless, the difference between the Omaha values and the national values raises questions about local regulation. Regulations are not necessarily bad, and in some cases may be well worth the cost. However, if costs can be reduced while still achieving regulatory goals, governments should consider reform. For these two components, cities may want to consider recent regulatory changes and architectural design standards. If these changes affect aesthetics but not safety, there might be a good reason to re-evaluate the regulation. For instance, cities may consider whether higher standards for items such as siding, windows, landscaping, or shutter materials are worth the additional \$25,000 added to the home price.

Local Regulatory Issues

To go deeper, the survey asks more detailed questions about local government regulations. Table 3 shows that respondents worked in five different communities in the Omaha metropolitan area: Omaha, Gretna, Bellevue, Papillion, and La Vista. (Some builders work in more than one community).

Table 3: Communities in Which Builders Work

Communities	Count
Gretna	4
Omaha	3
Papillion	3
Bellevue	2
La Vista	2

The survey asks which local government regulations could be revoked without harming the environment or the integrity of the structure and reduce the cost of new construction. The respondents identified these regulations:

- Basement ceiling paint and insulation factors.
- OSHA being reasonable on fines.
- Fire code for drywalling the basement ceiling.
- “Increasing energy code requirements have changed the way we are required to build each house. We use ResChecks to permit houses for energy code compliance. We have been required to change our house plans to meet these energy requirements.”

- “The best way to provide more affordable housing would be to focus on zoning. Allowing accessory dwelling units (ADU) to be built on areas deemed for single family homes would allow higher density to exist on land. This would lead to more multigenerational living among families. This would also allow ADUs to be built to provide opportunity spaces for offsetting costs to homeowners' payments.”
- Remove zinc-coated underground infrastructure.
- Allow smaller lots.
- Better use of capital for finished lot development.

Finally, the survey asked which governmental entities tend to slow down or increase the cost of bringing new housing to the market (Table 4). The most common response was Omaha Public Power District (OPPD), followed by city planning departments, then one each for Metropolitan Utilities District (MUD), state entities (state fire marshall, state electric division) and sanitary improvement districts (SID).

Table 4: Which Entities Most Often Slow Down or Increase the Cost of Bringing New Housing to Market?

Government entity	Count	Concerns
OPPD	4	<ul style="list-style-type: none"> • Delays in developments • Takes too long to install new subdivision transformers • Slow to provide live power to make lot sites buildable. • According to developers OPPD “run on their own schedule,” often months behind.
City planning departments	2	<ul style="list-style-type: none"> • Building permits take 3-7 weeks depending on the municipality. • Processing final plats can string out for months longer than needed.
MUD	1	“Running on their own schedule and being slow to provide live piping to make lot sites buildable (often months behind)”
State entities	1	Available inspectors
Other	1	Sanitary and Improvement District (SID)
City Councils	0	

These concerns in Table 4 suggest policies that Nebraska governments should re-examine. Some of the changes suggested are major code provisions, while others are more minor and perhaps can be done with little controversy. Other concerns are about staffing and delays in the issuance of permits, and the installation of infrastructure and utilities. Many of the concerns about OPPD, MUD and city planning departments were focused on schedule delays, which could be addressed by increased staffing or perhaps more efficient staff scheduling. While increased staffing would increase costs to OPPD, MUD, and cities, the reduced delay will reduce costs for builders, and in turn homeowners. The benefits to both builders and buyers of homes may be more than the increased staffing costs. These governments should consider these issues.

Conclusion

This survey finds that the average costs of regulation of new single family home construction in the Omaha metropolitan area is significantly higher than the national average. The two major factors explaining this differential are the cost for changes in building codes and the cost for additional architectural design. The cost for compliance with labor regulations is slightly higher, and the average cost for fees and for delays in the Omaha area are lower than the national average. Omaha area cities should consider if these regulations are worth the cost.

Survey respondents suggest several code changes, both major and minor, that they believe could be changed with little effect on the environment or the integrity of the structure. They also expressed concerns about delays. While the cost of delays was found to be less than the national average, and relatively small in dollar value, OPPD and other entities may want to consider increasing staff levels to reduce construction costs.

References

Emrath, Paul (2021). "Government Regulation in the Price of a New Home: 2021," Washington, DC: National Association of Home Builders, <https://www.nahb.org/-/media/NAHB/news-and-economics/docs/housing-economics-plus/special-studies/2021/special-study-government-regulation-in-the-price-of-a-new-home-may-2021.pdf>

Great Plains Regional MLS (2022), https://gprmlsdocs.com/stats/2022/omaha_11.pdf

Appendix A: 2022 Single-Family Builder Survey on Regulatory Costs

Q1. After a lot is finished and can be built on, how much on average do you pay for permit, hookup, inspection, impact or other government fees as a percent of total construction costs (total construction costs include all costs for labor, subs, materials and fees, but exclude all costs associated with the finished lot)? *(Please estimate your responses to the best of your ability. Please exclude any fees associated with the lot before the building permit is pulled. Please enter "0" if fees paid during or after construction are negligible.)*

_____ % of total construction costs

Q2. Over the past 10 years, how much have changes in construction codes and standards added to your cost, as a percent of total construction costs (total construction costs include all costs for labor, subs, materials and fees, but exclude all costs associated with the finished lot)? *(Please estimate your responses to the best of your ability. Please enter "0" if code changes have had minimal impact on construction costs.)*

% of total construction costs (please fill in the blank): _____

Don't know/was not building homes 10 years ago

Q3. How much do architectural design standards (requirements for siding materials, windows, landscaping, etc.) that go beyond what you would otherwise do (and are not related to building codes) add to your cost, as a percent of total construction costs (total construction costs include all costs for labor, subs, materials and fees, but exclude all costs associated with the finished lot)? *(Please estimate your responses to the best of your ability. Please enter "0" if the jurisdiction's requirements don't go substantially beyond what you would normally do.)*

_____ % of total construction costs

Q4. How much does complying with OSHA or other labor regulations cost, as a percent of total construction costs (total construction costs include all costs for labor, subs, materials and fees, but exclude all costs associated with the finished lot)? *(Please estimate your responses to the best of your ability. Please enter "0" if labor regulations have no substantial impact on development costs.)*

% of total construction costs (please fill in the blank): _____

Don't know/use of subs makes it impossible to estimate

Q5. How much extra time (in weeks) does complying with regulations (including unreasonable delays in obtaining permits or inspections) add to the construction process? *(Please enter "0" if regulations typically cause no substantial delay.)*

_____ weeks

Q6. Of the below listed communities, which ones do you do business in? *(Please select all that apply.)*

- Omaha
- Gretna
- Bellevue
- Papillion

La Vista

Q7. What two or three LOCAL government regulations could be revoked without harm to the environment or the integrity of the structure that would make it easier and cheaper to bring starter housing to the market?

Q8. What entities most often slow down and/or increase the cost of bringing starter housing to the market? *(Please select all that apply.)*

OPPD (Please explain): _____

MUD (Please explain): _____

Planning Departments (Please explain): _____

City Councils (Please explain): _____

Planning Departments (Please explain): _____

State Entities (State Fire Marshal, State Electrical Division, etc.) (Please explain):

Other (Please specify and explain): _____

ⁱ The survey was sent to 34 builders and five responded for a response rate of 14.7%.