

Waldo Duplex

Kansas City, Missouri



Waldo is a diverse and dynamic neighborhood in southern Kansas City. In July 2017, a group of fifth-year architecture students from Kansas State University led a project to build a low-income duplex in Waldo through the university's Design+Make Studio. The Waldo Duplex is the largest and most comprehensive project completed by the Design-Make Studio, which is an academic partnership between Kansas State University's capstone design studio and el dorado inc. The goal of the research-based architectural enterprise is for students to develop their passion for innovative problem solving focused on community needs.

Designed and built to be a solution to the growing problem of escalating rent prices in Kansas City, The Waldo Duplex will be home to two moderately low-income families that want to live and work in

Waldo, but otherwise could not afford to. Rent is increasing in the city at a rate higher than the national average, which negatively affects lower-income neighborhoods such as Waldo. Located amid the single-family bungalows and shotgun homes of the Waldo neighborhood, the duplex is targeted at households making less than 80% of the area's median income and implements rent controls. The completed project suggests a duplex can be built affordably without sacrificing architectural integrity.

With a total budget of \$290,000 (not including the cost of land), the project sought to provide affordable rent while satisfying the clients' economic model. The building challenges both the historic and modern typology of the duplex. While developers today use the duplex model in a way that creates suburban neighborhoods with

no identity, the Waldo Duplex inherits the benefits of duplex construction, but works to redefine the building typology. ➡

Galvanizers

Valmont Coatings - Salina

Architects

Design+Make Studio
el dorado inc.

Owner

Botwin Commercial Development

Additional

Studio Build
Foster's Inc.

Civic Contribution

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Traditional duplexes isolate their tenants on either side of a partition wall. The Waldo Duplex unites them through the tradition of the front porch. The interior design provides maximum natural sunlight through an open floor plan and glass partitions. Overall, the students involved in this project sought to understand why affordable housing solutions often fall short. Typical affordable housing design only advances perceptions of inequality rather than fights them. The Waldo Duplex proves affordability and thoughtful architecture are not mutually exclusive.

The front porches became a spotlight of the Waldo Duplex, from an architectural viewpoint as well as for the unity they inspire. Minimal maintenance, durability and long-life span were considerations when specifying materials and protective coatings. The steel components of the porch were therefore galvanized to ensure ultimate protection.

The galvanized steel also contributed to the final aesthetic look and feel of the porch.

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The galvanizer was excited to be part of such an innovative solution to a nation-wide problem and proud to be part of the progression toward higher quality, low-income housing. Therefore, all the galvanizing work was completed free of charge. All the contributing partners involved with this project have certainly made a statement within the architectural and housing industry. Recognition from various local news outlets as well as Architectural Magazine provides the exposure to begin influencing the industry in a new direction. ■



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