

Acutely angled, metal-clad forms on a building exterior express **Broken Arrow Wear LLC's** branding and company culture in **Urbandale**, **Iowa**. The T-shirt printing and embroidery business was created with an addition to, and retrofit of, a former fast-food restaurant.

Brent Schipper, AIA, LEED AP, IIDA, principal at ASK Studio, says, "The structure remains simple, a continuation of a humble wood frame. The envelope is a combination of new and existing, but the form is a derivation of the company's name: Broken Arrow. The street façade is an exclusive narrative conveyed through an amalgam of angles with conspicuous breaks. The angular planes are fashioned from curtainwall, stainless steel shingles and metal panels."

The metal envelope was selected to advance the drama of the geometry, Schipper says. "This is done through color, texture and reflectivity. The black corrugated panels are used as a frame for the other metals. The highly regulated and repetitive lines fix the points of the orthogonal building, while the contrasting texture and glimmer of the stainless steel is applied in a canted fashion, and the soffit aspires to an even more complex warped plane. The three metal components of the building skin each serve a particular element of the structure's expression. Each represent plane and light uniquely, while remaining in concert."

The owners, Mari Coppola and Kortni Remer, wanted the design to communicate company culture and branding. "The clients, a mother and daughter, wanted the building to convey the creativity and fun of their business and its culture," Schipper says. "They wanted to be seen in a building which had a narrative based solely on their business and their successes. Metal allows an inimitable form with a complex alchemy of materials, all of which are metal. The form represents the company and the seemingly disparate materials that work in concert represent the mother/daughter duo. The building represents extraordinary women, their business and its brand through architecture that aspires to be more than a decorated shed."

The floorplan of the 5,500-square-foot building is based on an open office, and sales and meeting spaces in the taller addition portion of the building. "Private offices, break areas and building necessities are fit into the existing volume," Schipper says. "The views of green space and thoroughfares to the south and east are exploited, while the fenestration oriented toward neighboring auto dealerships and auto repair facilities are minimized and controlled. The organization is a public to private datum from front to back, which is mirrored in the hierarchy of space in analogous order."

For the black corrugated, concealed fastener metal panels, Exterior Sheet Metal Inc. installed Berridge Manufacturing Co.'s HC-16 panels. For the stainless steel shingles, Exterior Sheet Metal fabricated and installed custom 24-gauge shingles. For soffits, Exterior Sheet Metal installed Longboard Products' V-Groove metal panels in Dark Fir.



Architect: ASK Studio, Des Moines, Iowa, www.askstudio.com

General contractor: Venter Spooner Inc., Johnston, Iowa, venterspooner.com

Fabricator/installer/metal wall panels: Exterior Sheet Metal Inc., Grimes, Iowa, www.exteriorsheetmetal.com. Circle #32

Metal wall panels: Berridge Manufacturing Co., San Antonio, www.berridge.com, Circle #33; and Longboard Products, Abbotsford, British Columbia, Canada, www.longboardproducts.com, Circle #34

Metal panels modernize office building

A 1950s car dealership building that was repurposed for factory use in the 1980s was then retrofit into an office building with retail space in Norwich, N.Y. The 6,500-squarefoot East Main Business Park houses

Principle Design and Engineering PLLC's office and three retail units. The design engineering firm served as general contractor and self-performed metal roof and metal wall panel installations.

Metal wall panels were used to maintain and modernize the building's 1950s car



dealership appearance. At the portion of the building on East Main Street where the design engineering company's offices are located, Principle Design and Engineering installed 1,600 square feet of MBCI's 24-gauge steel Designer Series wall panels in Solar White. The panels are horizontal on flat surfaces and vertical around a curved corner of the building. To underscore the car dealership appearance, a band of bright red LED lighting that looks like neon lighting wraps around the top of the white walls.

On the retail shop side of the building, Principle Design and Engineering installed horizontally 750 square feet of MBCI's 24-gauge steel ShadowRib wall panels in Slate Gray

Mike and Dan O'Reilly are brothers and owners at Principle Design and Engineering. Mike O'Reilly, PE, managing partner at the company, says, "We chose to readapt and reimagine what this building could be for our office. Holding true to its roots and for our automotive passion, from East Main it looks like a 1950s dealership with a modern twist. From the Midland Drive side, it looks like a building possibly built in 2021. I'm a car guy, so this was the perfect building

for us. We use a lot of metal and metal was the obvious choice because it was cost effective and it gave us the modern aesthetic we were looking for."

To build the bowed roof, first, on the backside of it, Principle Design and Engineering and James R. Denekamp Framing installed American Building Components' 29-gauge steel Perma-Clad roof panels in Coal Black. Then, on the front of the roof, panels were installed overlapping the backside panels by about 6 feet to hide the lap from street view. Large gutters were over-framed to accommodate 36-inch-wide, exposed fastener panels with 5/8-inch-tall ribs. Coal Black coil was used to press-brake caps for the parapet walls.



30 METAL ARCHITECTURE November 2022 metalarchitecture.com November 2022 METAL ARCHITECTURE 31