Reprogramming Denver’s Streets in Times of Need
2020 COVID-19 Pandemic

Overview

In April, we were one month into the Stay at Home order in response to the COVID-19 pandemic, the City and County of Denver implemented a program to put our biggest public assets—our streets—to work. Denver’s Department of Transportation and Infrastructure (DOIT) closed down twelve streets, 16 miles or roadway, citywide to vehicle thru-traffic to create more space for residents to walk, bike and run amid social distancing rules and to help people feel more comfortable getting out for a walk, bike ride or fresh air during this time.

By May, the City was able to allow restaurants to resume limited sit-down service. So DOTI decided to leverage our streets again with a temporary program for restaurants and bars to use City right-of-way as outdoor patio extensions of their service. Through the program, City staff approved dozens of proposals from food establishments to expand into the public right of way, including sidewalks, parking and travel lanes, in order to use these spaces for socially distant outdoor dining. Here’s a look at how our City developed these two Shared Street programs in just a few short months...
With many working from home at the height of the pandemic, vehicle trips in Denver dropped by nearly 70% by May of 2020. Lower vehicle numbers, in combination with demand for more outdoor space for both recreating and dining, made switching up use of street space an obvious opportunity.

But the City wanted to make sure that any program using public space met these goals.

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Objectives

Meet the Current Need
Provide more recreational space near overcrowding parks and in park deserts; and provide more patio space for restaurants, breweries, and bars to help sustain them during indoor capacity limitations.

Street Safety and Mobility
Ensure ability to get around the city is not compromised, with a special eye to emergency vehicle access, disabled individuals’ needs, and avoiding crashes.

Equity
Rather than serve a single neighborhood or just the downtown core, create a program that reaches all parts of the city and a process that can be easily navigated by all users.

Speedy Implementation
Get these programs up and running fast! Programs that might usually take a few years to develop, pilot, and implement needed to go online in just a few weeks or months because of the pandemic.

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GIS mapping shows streets with highest density adjacent to parks.

As this news story shows, indoor occupancy limits meant restaurants needed extra space to stay open.
In less than a month, five City departments quickly developed processes to close select streets for recreation and dining out.

**Shared Street Selection**

To identify potential shared streets, our staff used GIS to identify streets in park ‘deserts’ as well as streets adjacent to parks, (i.e. limited open space access). These streets were prioritized based on the surrounding residential density and the City’s Equity Index. The recently adopted Denver Moves plans identified bike or pedestrian focused streets that were also prioritized. To ensure safety, only local and collector streets could be made recreational streets.

To help with a smooth transition, the recreational streets were put in place in phases. After developing a traffic control plan for each street, our operations teams put out temporary signage denoting the shared streets purpose and rules. Temporary barriers diverted all non-local car traffic, and opened the entire street to walking, jogging, and biking!

**Temporary Outdoor Expansion Permit Process**

Through an incredible collaboration of five city departments, business owners, and external organizations like the Downtown Denver Partnership, a permit process was set up for outdoor expansion spaces in just a matter of weeks.

Restaurants applied through an online portal. Our Special Events team were the first to review each application, and then routed them for additional reviews by health, fire, traffic safety, right-of-way inspection, or excise and license depending on the elements of the proposal.

Restaurant owners are experts in food and good service, and shouldn’t be expected to be expert in traffic safety. So, each applicant was assigned a city staff "navigator" to help them through the permit process, and each was also given the opportunity have a pre-inspection of the site during which, City staff and the owner could discuss what site layouts would work within the City’s safety requirements.
Recreational Streets

On average...

12mph

is the average vehicle speed

287%

increase in non-vehicle use compared to baseline

10,000

people use them each day

“I was working COVID ward almost every day, and I can honestly say biking without having to worry about cars was probably the only stress-free part of the day for me.”

-Denver resident and 11th Ave Shared Street commuter

Recreational Streets Highlight: 11th Ave

E. 11th Ave, between Lincoln St and Humboldt St, was closed in the first phase of the project and has been one of the most heavily used. Thousands of bicyclists and pedestrians now make up more than 85% of street traffic every day. Not previously planned as a bikeway, it now may be in the future.

Results

The Shared Streets programs are now in full swing.

The success of these programs is apparent by the increase in people using these newly created pedestrian spaces.

Food establishments report that customers returning to use these outdoor spaces are helping keep them afloat.

Our recreational streets have seen more than 500,000 non-vehicle users in the last 6 months. In September, both programs won 'best of' awards from the APWA Colorado Chapter.

Restaurant Outdoor Expansion

As of August...

313

Patio expansions have been approved

195

Patio expansions have closed all or part of the street or sidewalk

"This program has been a lifesaver for many restaurants."

-Downtown Denver Partnership

Restaurant Outdoor Expansion Highlight: Denver Central Market

Denver Central Market, in the River North Art District, now has three outdoor dining areas: front patio, alley and parking lot. They also hired local artists and muralists to brighten the building.

Like several other of the most successful patio expansions, Denver Central Market had previous experience utilizing outdoor space for special events in the past, and knew what could work in the space.

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As many as 12 businesses cooperated to create mutually shared patio space.

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### Challenges

**Equity:** While shared streets have been implemented in most parts of the city, recreational streets in more urban and dense areas have generally performed better, and we received fewer patio applications outside core commercial areas.

**Winter Weather:** Snow and cold will pose new challenges for snow plowing on sidewalks and streets and maintaining spaces that aren't too chilly and unpleasant to use.

**Maintenance:** As both shared streets types were designed to be temporary, maintaining street barriers and signage has proved an enormous draw on City resources; they are frequently moved or stolen.

### Solutions

Future efforts will focus on more robust engagement in equity communities, to confirm where shared streets are of most value, as well as educate members of their purpose.

To support businesses to take advantage of the patio program, we applied for and received grants to help fund street barriers and outdoor furniture.

With the right equipment, such as lamps and shelters, businesses may be able to warm and cover spaces to encourage use. Specific snow clearing regulations could be developed to ensure sidewalks and streets are plowed properly.

If the programs are extended, new materials will have to be considered as barriers and signage that is more hardened.

Similarly, as the economy recovers, we may consider introducing fees to support staff time in evaluating patio applications.

### What's Next?

The City continues to collect data to measure overall effectiveness of our shared streets, including vehicle and pedestrian volumes, enforcement records, 311 reports, field checks, social media and community feedback.

Both programs are currently expected to continue operation through the fall of this year. With winter approaching, we see opportunities to learn from and possibly continue these programs into the future. Data and feedback collected today are helping the City to determine next steps in the coming months.