

MIAMI BEACH

COMMISSION MEMORANDUM

TO: Honorable Mayor and Members of the City Commission

FROM: Eric Carpenter, City Manager

DATE: May 21, 2025

TITLE: A RESOLUTION OF THE MAYOR AND CITY COMMISSION OF THE CITY OF MIAMI BEACH, FLORIDA, ACCEPTING THE RECOMMENDATION OF THE PUBLIC SAFETY AND NEIGHBORHOOD QUALITY OF LIFE COMMITTEE AT ITS APRIL 9, 2025 MEETING, TO CONTINUE ITS DISCUSSION REGARDING SERVE ROBOT'S OPERATION IN THE CITY.

RECOMMENDATION

The Administration is supportive of Serve's continuous operation in Miami Beach, as it welcomes innovative technology and ways to assist in making food deliveries sustainable, reliable, and economical. The Administration recommends that the City enter into an agreement with Serve robots to ensure that Serve is fully aware of and in compliance with City of Miami Beach regulations (including not operating Serve robots on sidewalks considered too narrow to fit a robot and a pedestrian or a wheelchair).

BACKGROUND/HISTORY

On February 3, 2025, at the request of Commissioner Laura Dominguez, the Mayor and City Commission ("City Commission") approved a referral to the Public Safety and Neighborhood Quality of Life Committee ("PSNQLC") to discuss the potential deployment and operation of Serve Robotics' AI-powered sidewalk delivery robots in Miami Beach.

Serve Robotics, Inc. ("Serve") are advanced, AI-powered, low-emission sidewalk delivery robots that endeavor to make deliveries sustainable, reliable, and economical. Since 2021, Serve has completed tens of thousands of deliveries in cities including West Hollywood, Los Angeles, and San Francisco for enterprise partners such as Uber Eats and 7-Eleven. These sidewalk delivery robots have also made their way to Miami Beach, making deliveries for Uber Eats, and Shake Shack among others. Serve robots are allowed to operate in South Florida, pursuant to Florida Statute ("FS") 316.540 Motor Vehicles.

ANALYSIS

There are approximately 20-25, Gen3 robot models operating in South Beach, within "hot spot" areas (areas most frequently used via the Uber Eats app and associated restaurants). The number of robots are expected to increase to about 50 by June 2025, and even more so by the end of the year, as the Serve robot's popularity increases.

Gen3 Robot Model Specifications

Speed: average speed of 3 miles per hour when driving through sidewalks and about 5-6 miles per hour when crossing the streets.

Weather: can drive through moderate rain (will stop in heavy weather)

Radius: 1.5 miles (as a way to keep food orders warm)

Cargo: 15 gal, or 4"x16" size pizzas

Delivery: it can only be opened by a customer or the merchant via a unique passcode.

Navigation: serve robots use a range of sensors to identify the objects around them and to avoid obstacles

Maintenance: robots are taken once a day to a container (trailer) to have them charged, cleaned up, and data download.

How they operate

Due to their low speed, these robots are only able to operate on sidewalks, and have their own individual pilot. Each robot is covered by Serve's insurance policy.

Should the City and Serve agree to collaborate, the City can provide the usage of a permanent parking spot for Serve robots to operate to and from. A parking lot that would fit the needs of the robots is Parking Lot P27, located on Meridian Avenue and Lincoln Lane North, next to Cafecito, due to its vicinity to the various restaurants on Lincoln Road.

If in agreement, a contract would need to be drafted (similar to Deco Bike, LLC.), based on the City's needs and regulations. Language of the agreement would include:

- Insurance that would protect the City from liability: Serve currently operates under an umbrella policy
- Speed regulation (limit of 10 MPH): Robots are currently regulated to operate 5-6 MPH
- Ability to maneuver through cracked sidewalks or obstructions: Robots stay 5 feet back from curb and sense activity on the sidewalk. Serve robot wheels can turn sharp corners, can backup, drive in circles and sideways
- Vandalism protection: each robot has a tag with an individual ID number, contact phone number and email address. Robots are equipped with cameras, Laser Detection And Ranging (LADAR), and GPS, which allows for their immediate location under any circumstances. They also have an alert system to let the pilot know where the cause of a disturbance is coming from. Serve robots will 'play dead' if vandalized and/or play a sounding alarm. Serve robots are supervised at all times during their operation, and the field operation staff can be reached and on site in 15 minutes
- If desired, Serve robots can be prevented from operating on certain sidewalks (sidewalks that are too narrow to fit a robot and a pedestrian, a robot and a wheelchair or any type of sidewalk blockage)
- Profit share, for the use of proposed Parking Lot P27
- It will require a Business Tax Receipt depending on where the Serve's office is located
- City Commission approval, should the threshold of the pilot exceed \$100,000, as well as a bid waiver should Serve be considered as the sole vendor
- These robots are not considered micromobility, as they do not transport people. Since there are currently about 25 units, it would not require an immediate traffic study, however, as the number of operating robots increase, and selected areas of operation expand, a study may be required

On March 12, 2025, PSNQLC members discussed the proposed operation of Serve robots, concluding with a motion for the Administration to consult with the Miami Beach Police Department about any potential risks associated with having the robots operating in the City, and to come back to the next meeting with an update.

On April 9, 2025, PSNQLC members were presented the requested feedback, concluding with a motion to bring the item to the full Commission to continue the discussion on how the Serve robots would continue to operate in the City. It was understood that Serve robots will still operate in Miami Beach under FS 316.540 Motor Vehicles, whether or not an agreement is signed with the City. If approved, this would be the first signed contract between Serve and a governmental agency.

FISCAL IMPACT STATEMENT

No fiscal impact.

CONCLUSION

The Administration is supportive of Serve's continuous operation in Miami Beach, as it welcomes innovative technology and ways to assist in making food deliveries sustainable, reliable, and economical. The Administration recommends that the City enter into an agreement with Serve robots to ensure that Serve is fully aware of and in compliance with City of Miami Beach regulations (including not operating Serve robots in sidewalks considered too narrow to fit a robot and a pedestrian or a wheelchair).

Applicable Area

South Beach

Is this a "Residents Right to Know" item, pursuant to City Code Section 2-17?

Yes

Is this item related to a G.O. Bond Project?

No

Department

Public Works

Sponsor(s)

Commissioner Laura Dominguez

Condensed Title

Accept Rec/Proceed w/ Pilot Program, Serve Robotics, Inc. to Operate in MB. (Dominguez) PW

Previous Action (For City Clerk Use Only)