# KBP CONSULTING, INC.

June 20, 2017

Albert L. Kelley, P.A. Attorney at Law 926 Truman Avenue Key West, FL 33040

Re: Zapp Rideshare Scooters – Key West, Florida Traffic Memorandum

Dear Al:

Zapp Rideshare is a scooter rental business that is proposing to serve residents and tourists within the City of Key West, Florida. Unlike traditional scooter rental businesses, Zapp Rideshare will ultimately employ a unique delivery method for their scooters that will allow customers to pick-up and drop-off their scooters at numerous designated locations throughout the City. In the meantime, Zapp Rideshare will initiate their Key West service with a single drop-off / pick-up location in the courtyard of Kino Plaza at 107 Fitzpatrick Street. The purpose of this technical memorandum is to document the traffic patterns and impacts associated with this proposed scooter rental operator and location.

### **Proposed Operating Characteristics**

The proposed Zapp Rideshare location at 107 Fitzpatrick Street will have a maximum capacity of 20 scooters. Should all of the scooters at this location be rented, the site can be resupplied with another 20 scooters from their warehouse on Stock Island. It is estimated that, on a typical day, this will not occur. But for the purposes of this analysis, we have assumed that the supply of scooters at this location will be replenished one time per day for a total of 40 scooters.

It is estimated that most of these scooters will be rented on a daily basis. That is, they will be rented in the morning or early afternoon and returned that same evening. As such, most of the scooters will be rented once per day and will result in one (1) exiting trip (leaving the rental station) and one (1) entering trip (returning to the rental station). For analysis purposes, we have assumed that approximately one-third (or, 15 scooters) will be rented twice per day. Therefore, these scooters will account for two (2) entering trips and two (2) exiting trips per day. The total number of scooter trips generated on a daily basis is projected to be 55 inbound trips and 55 outbound trips. The peak hour impact is estimated to be approximately 10% of the daily trips or, 6 inbound trips and 6 outbound trips.

### **Traffic Impacts**

In accordance with Section 18-358 of the City's Code of Ordinances, the traffic impacts associated with this proposed scooter operation must be addressed. More specifically, insignificant (or, "de minimis") impacts are defined as those that constitute an impact of less than three percent (3%) on the local transportation network.

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Based upon the location of the proposed scooter rental facility, it is expected that these scooters will disperse throughout the street grid network in a variety of different directions as to minimize their impacts to any single roadway or intersection. In other words, there are many divergent destinations within the City of Key West that will cause Zapp Rideshare patrons to utilize a variety of different streets when leaving or traveling to this rental station. Within the immediate area, a preliminary estimate of the trip distribution is as follows:

- Fitzpatrick Lane
  - To / From the North: 40%To / From the South: 60%
- Greene Street
  - To / From the East: 50%To / From the West: 10%
- Front Street
  - To / From the North: 30%To / From the South: 10%
- Duval Street
  - To / From the North: 10%To / From the South: 40%

According to the Florida Department of Transportation's (FDOT's) Quality / Level of Service Handbook, in urbanized areas two-lane undivided, class II (35 miles per hour or slower posted speed limit), non-state roadways without exclusive turn lanes have a daily capacity of approximately 10,360 vehicles and a peak hour capacity of approximately 930 vehicles.

With a maximum assignment of 60% of the scooter traffic on a single roadway (i.e. to the south on Fitzpatrick Lane), the maximum impact to the street network will be less than 1%. Even if 100% of the proposed scooter traffic were to be assigned to a single street within the study area, the impact would be less than 1.3%.

### **Conclusions**

Based upon the proposed operational characteristics of Zapp Rideshare Scooters, it is evident that their operations will have little impact on the surrounding transportation network within the City of Key West. If you have any questions or require additional information, please do not hesitate to contact me.

Sincerely,

KBP CONSULTING, INC.

Karl B. Peterson, P.E.

Senior Transportation Engineer