# Transportation Improvements:

Transportation improvements referenced from "Traffic Impact Analysis - Ervin Cook Road Site" dated October 7, 2016 prepared by WSP/Parsons Brinckerhoff.

#### Gilead Road and Ervin Cook Road (Phase I Improvements)

- Construct westbound right-turn lane on Gilead Road with at least 100 feet of storage and appropriate taper.
- Construct eastbound left-turn lane on Gilead road with at least 150 feet of storage and appropriate taper.
- Construct southbound right-turn lane on Ervin Cook Road with at least 100 feet of storage and appropriate taper.

#### Gilead Road and Bradford Hill Lane (Phase II Improvements)

 Construct an eastbound right-turn lane on Gilead Road at Bradford Hill Lane with at least 100 feet of storage and appropriate taper.

Note: Due to the close proximity of an existing box culvert and stream crossing on Gilead Road, the available space to construct an eastbound through lane and receiving lane with an appropriate merge taper is limited. Therefore, an eastbound right-turn lane is recommended.

# Gilead Road and Wynfield Creek Parkway (Phase II Improvements)

- Construct an eastbound shared through and right-turn lane on Gilead Road at Wynfield Creek Parkway
  with at least 400 feet of storage and appropriate taper to create an additional through lane at the
  intersection. Continue the eastbound through lane to Ranson Road to create an eastbound exclusive
  left-turn lane and an exclusive eastbound through lane at the intersection of Gilead Road and Ranson
  Road.
- Construct and extend the westbound right-turn lane on Gilead Road at Wynfield Creek Parkway to create a full right-turn only lane between Wynfield Creek Parkway and Ranson Road.
- Roadway improvements will require appropriate signal upgrades at this location.

## Gilead Road and Ranson Road (Phase II Improvements)

- Extend the westbound right-turn lane on Gilead Road (approximately 400') with appropriate storage and taper to create a shared through and right-turn lane. Continue the westbound through lane to Wynfield Road to create a westbound right-turn only lane, through lane and left-turn lane traffic pattern at the intersection of Gilead Road and Wynfield.
- Roadway improvements will require appropriate signal upgrades at this location.

Note: Due to the close proximity of an existing box culvert and headwalls on Gilead Road associated with Torrence/Lower McDowell Creek Greenway, the available space to construct the shared through and right-turn lane with the appropriate taper is limited. Therefore, it is recommended that the length of the shared through and right-turn lane be maximized in the available space required by NCDOT and Town of Huntersville.

# Gilead Road and McCoy Road (Phase II Improvements)

- Reconfigure the westbound approach with a pocket left-turn lane with a minumum 600' storage along
  with two continuous through lanes (one through and one shard through/right). Widen appropriately.
- Construct a full westbound through lane along Gilead Road between McCoy Road and Binnaway Drive that drops with a right-turn only movement at the unsignaled intersection of Gilead Road and Binnaway Drive.
- Roadway improvements will require appropriate signal upgrades at this location.

### Ervin Cook Road and Site Drive #1 (Phase II Improvements)

 Construct a northbound right-turn lane on Ervin Cook Road at Site Drive #1 with a minimum 100 feet storage and appropriate taper.