



Pedestrian Lighting

Charlotte Coon

Policy Research Fellow

Office of the City Clerk

Pedestrian Lighting

- Past Projects and Initiatives
- Street vs Outdoor/Site Lighting
- Current Pedestrian Lighting
- Advantages and Disadvantages of Increased Lighting
- Case Studies
 - Orlando, Florida
 - Key West, Florida
 - Sydney, Australia
- Risk/Benefit Analysis
- Recommended Points for Further Research

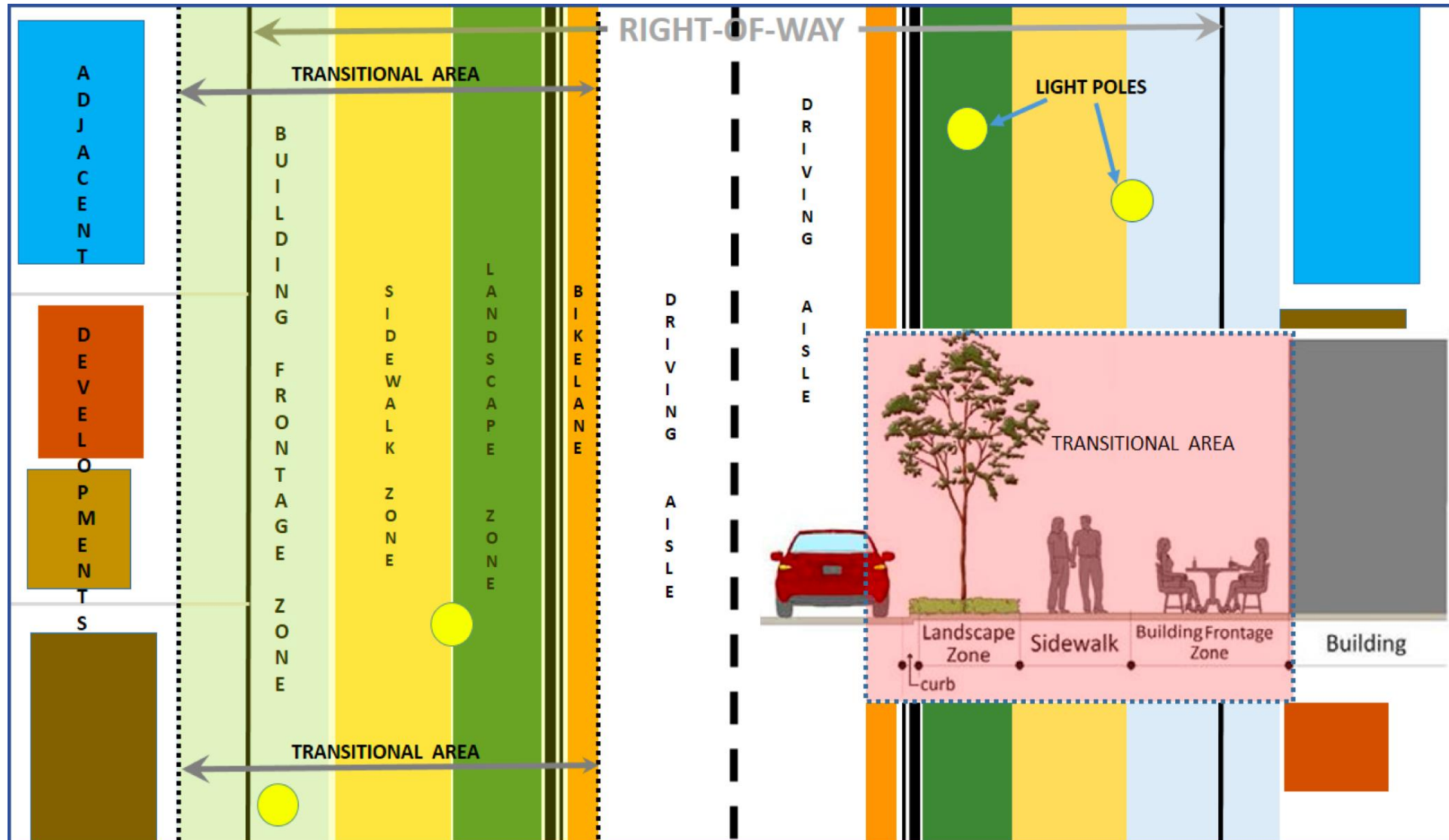
Gainesville Initiatives

- Focus has been on sufficient and environmentally friendly lighting.
- 2013 Pilot Program to replace outdated sodium lights with new LED technology
- 2016 collaboration with UF to upgrade lighting around the university with the aim of increasing pedestrian safety and decreasing crime.
- Response to outdoor dining due to the Sars-CoV-2 pandemic

Street Lighting vs Outdoor Site Lighting

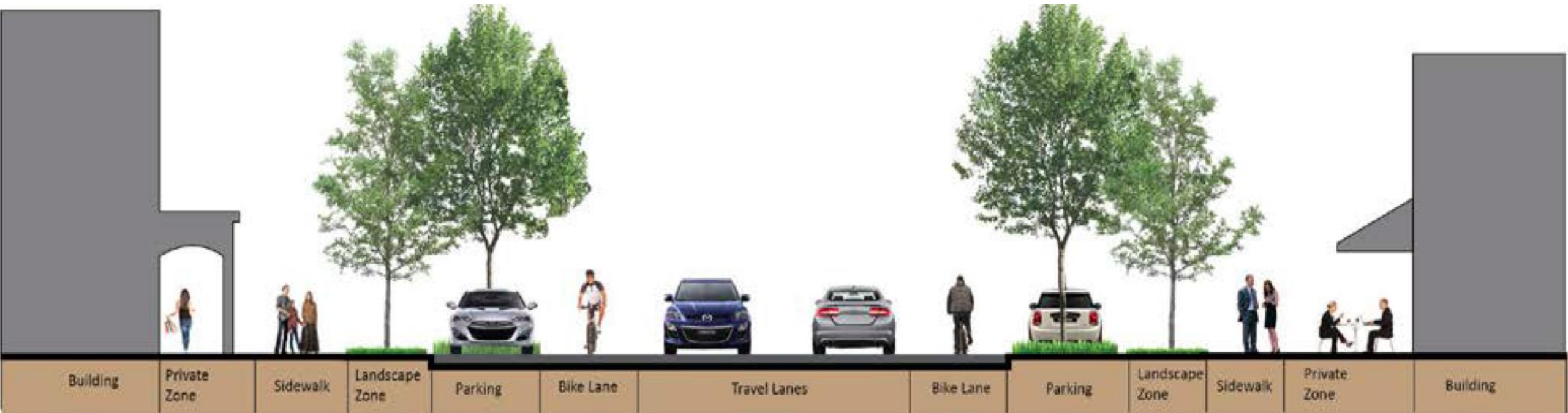
- **Street Lighting** – lights installed along major thoroughfares, most common type of lighting in downtown, responsibility of GRU and the Public Works Department
- **Outdoor Site Lighting** – refers to lighting on private and public sites and can interact with street lighting, responsibility of the Department of Sustainable Development, designed to protect and promote the public health, safety, and welfare; promotes safety and security in vehicular use areas; protects properties, the environment, and the night sky from adverse lighting impacts.

Current Gainesville Lighting



Transitional Activity Area between Adjacent Development and Driving Aisle

Streetscape Zones in the Transect Zones




Transitional Activity Area between Adjacent Development and Driving Aisle

Advantages of Increased Lighting



CPTED – Crime Prevention Through Environmental Design

- Positively impact both the perceptions and reality of safety
 - Perceived Greater Safety
 - Reduction in Potential for Crime
 - Potential Increase in Traffic for Local Businesses
 - More important social effects beyond direct health effects
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Disadvantages of Increased Lighting

- Glare and other Ambient Light
- Dark Sky – light pollution, environmental disturbances
- Effect on Bats – increase in light pollution disrupts feeding patterns and results in a decline in population.
- Increase in blue light from LED equipped streetlights has been shown to affect the ability of the human brain to fall into a deep sleep

Orlando, Florida

What is the Same?

- Similar focus as Gainesville
- No lighting zones

What is Different?

- Regulations apply to all exterior lighting with minimal exceptions
- Before installation, all exterior lighting must be approved by the Planning Department through an official Photometric Plan during development plan review

Key West, Florida

What is the Same?

- Robust downtown area
- Similar departments in charge of lighting
- No classification of streetlights into categories
- Presence of wildlife susceptible to light pollution

What is Different?

- Streetlights are regulated under Exterior Lighting
- Regulations on how lights must be shielded
- Requirements for where and how frequently streetlights must be placed

Sydney, Australia

What is the Same?

- Environmental focus

What is Different?

- Extensive classification system aimed at identifying the appropriate intensity and color of public lighting for different areas of the city

Risks / Benefits Analysis

- **Risks**

- Potential for increased light pollution
- Monetary costs for upgraded lights
- Monetary costs for installation and ongoing maintenance

- **Benefits**

- Identification of high pedestrian trafficked areas
- May improve pedestrian safety
- May increase pedestrian visibility in high vehicular traffic areas
- Potential for reduction in crime rates
- May encourage restaurants to implement outdoor or open-air dining

Recommended Points for Further Research

Further consideration should be given to:

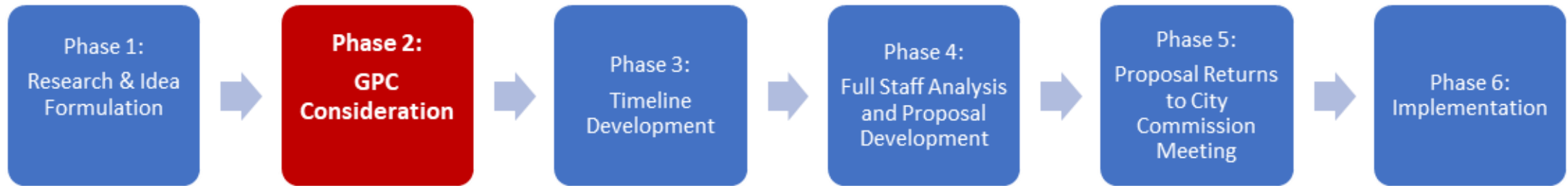


Identifying high pedestrian areas of the City of Gainesville



Development of a Pedestrian Lighting Plan in the identified high pedestrian areas

Recommended Next Steps



We are here!

If the General Policy Committee wishes to proceed, the next step is to move this project to Phase 3 of the Policy Process.

Discussion?