

# Emerging Trends Impacting Land Use and Policy

Sharing Economy & Smart Cities

## **Local Control**

- When considering policy implications, don't forget the State has in the past superseded the ability of cities to regulate certain aspects of the Sharing economy and smart city initiatives.
- For example: "House Bill 100 requires ride-hailing companies to have a permit from the Texas Department of Licensing and Regulation and pay an annual fee of \$5,000 to operate throughout the state. It also calls for companies to perform local, state and national criminal background checks on drivers annually but doesn't require drivers to be fingerprinted."





# **Defining Sharing Economy**

## Defined

 The sharing economy is an economic model often defined as a peer-to-peer (P2P) based activity of acquiring, providing or sharing access to goods and services that are facilitated by a community based online platform

## Why Now

- Internet, apps, connectivity, big data easy to access, easy to provide
- Allows monetization of underutilized assets physical assets are Shared as services

## Result

- Cheaper access to a different, potentially better service/experience
- Businesses changing models to better compete

## **Policy Concerns**

- Regulatory uncertainty (land use)
- Private property rights
- Business community concerns





# Pet Care: Watching, Walking, Related Services

- Traditional Economy: board your animal at a kennel
- Sharing Economy: hire a pet sitter to come to your home (multiple apps)
- Sharing Economy: board your pet at a private residence
- Policy Issue Example: barking dogs, smell, regulating (kennels require shot records), defining kennel
- \*In 2016, the pet-care market was estimated at \$103.6 billion globally, and \$44.7 billion in the US.





# **Space Rental**

## Storage

6

- Traditional Economy: rent space at a storage facility or in a container
- Sharing Economy: rent space/garage space from a neighbor
- Policy Implications: increased foot traffic, increased truck traffic, increased noise, defining storage

## Driveway/Garage

- Traditional Economy 1: park your car/RV/boat in your driveway
- Traditional Economy 2: park your car/RV/boat at a storage facility
- Sharing Economy: rent space in your neighbor's driveway or garage to park your car/RV/boat
- Policy implications: maximum number of cars per house, keeping boats/RVs out of locations they are
  prohibited at the expense of saturating an area they are allowed



# **Transportation**

## **Being Driven**

- Traditional Economy: Taxi or public transportation
- Sharing Economy : ride sharing service
- Policy Implications: impacts on public transportation, impact on traditional businesses (taxi), parking (Bubbl)

#### **Drive Yourself**

7

- Traditional Economy: buy, lease, or rent a car
- Sharing Economy: rent someone else's car
- Policy Implications: too many cars parked at one house
  - "Someone's trying to kill peer-to-peer car sharing companies by regulating them."

#### Sharing Economy: Transportation Edition





## Scooters/Bicycles/Hover Boards (applies to almost every tangible asset: boat, RV, ATV, etc.)

- Traditional Economy: walk or buy your own scooter/bicycle/hover board
- Sharing Economy: rent a scooter/bicycle
- Policy Implications: access, clutter, accidents, safety, bike lanes, scooter lanes





# **Social Food**

- Traditional Economy: buy your food at a restaurant or from a grocery store; have your food delivered
- Sharing Economy 1: buy food prepared in a residential kitchen or from a small farm/garden
- Sharing Economy 2: pay to eat in a private residence
- Policy Implications: health and sanitary concerns, lack of regulation



FARMERS

BRANCH

# Lodging

- Traditional Economy: rent a room in a hotel
- Sharing Economy: rent a room(s) at a private residence
- Policy Implications: increased foot traffic, increased noise, neighbor relations, garbage
- \*A Fort Worth developer has proposed a hotel with 19 rooms to compete with Airbnb





# **Defining Smart Cities**

## Defined

 "A smart city is an urban area that uses different types of electronic data collection sensors to supply information which is used to manage assets and resources efficiently."

## Why Now

- New and emerging technologies
- Ease of access to data
- Resident expectations, business expectations

## Result

- Increased efficiency and transparency
- Increased costs in the short run

## **Policy Concerns**

- · How to regulate, when to regulate
- Partnerships versus regulation
- Cost/benefit analysis
- Strategic direction



## **Sensors**

**Policy Implications** 

- Infrastructure to support
- Access (public and private)
- Collocation
- Data security

There are sensors for everything! New technologies are creating pathways for the sensors to work together.



Sensors in San Diego



# **Self-Driving Vehicles**

**Policy Implications** 

- Parking locations
- Charging locations
- Public safety
- Less congestion
- Sustainability personal vehicles are only utilized 3-4% of the day
- Sensor access
- Infrastructure requirements

Multiple companies are currently fine tuning this technology.



Yandex self-driving car



# **Self-Flying Vehicles**

**Policy Implications** 

- Noise
- Landing locations
- Charging locations

But it will never happen...

At CES, Bell indicated 2025 would be the year. Even if they miss by 10 years, 2035 is not too far away.



Bell air taxi, CES 2019



# **6G Wireless**

• What about 5G or 4G?

Technology

&



15

# **Community Sensing**

How do we engage the public with smart city technology and innovation? One example: Long Beach Technology and Innovation Commission.



# Questions & Discussion