

CAPITAL REGION Mobility Strategy

# **PREFACE**

Over the past 15 years, the five-parish region centered on Baton Rouge has experienced unprecedented growth—in population, traffic, and frustration. Meanwhile, the forces and trends that influence transportation decision-making have continued to evolve. In the Capital Region, there is an increased need to calibrate our infrastructure priorities to align with a diversity of community objectives. The importance of this coordination is a direct result of the following:

- → **Changing Funding Levels**—Transportation revenues are fluctuating due to changes in travel behavior and enhanced fuel efficiencies of vehicles. With competition for resources at an all-time high, transportation funding programs are unpredictable.
- → **Shifting Demographics**—The region's unprecedented growth—seven years of normal population growth during a single year after Hurricane Katrina—has magnified changes to commuting patterns. The overwhelming demand for transportation is a very visible sign of this growth.
- → **Growing Economy**—The Capital Region offers a competitive business climate, and continued expansion and diversification of its economy is critical. However, even as growth creates opportunity, it compounds many of the challenges facing the region today. While traffic congestion often is mentioned as a barrier for growth and retention, it also is evidence of the region's success.
- → **Rising Expectations**—The people of the Capital Region have high expectations for quality of life, social responsibility, and economic opportunities. It's no surprise that quality of life has become a primary indicator of its economic competitiveness. Quality choices can lead to quality investments by the private sector.
- → Natural Uncertainty—Our transportation system is the single largest contributor to quality of life and economic sustainability. This infrastructure faces significant vulnerabilities in the Capital Region, and its resiliency touches on many issues—economic vitality (how we connect people to opportunity), safety (how we respond in times of emergency), and social justice (how we empower the area's most vulnerable populations).

The Capital Region Mobility Strategy balances these characteristics by taking a deliberate look at the region's transportation system, working in tandem with the Capital Region Planning Commission's Long Range Transportation Plan Update. The goal is to align short- and long-term transportation strategies with broader regional goals and initiatives, including mobility, safety, and the region's economic vitality. This initial briefing is the first step of the CRMS process, which will conclude with a final Strategy Action Plan in 2017.

### CAPITAL REGION INDUSTRY FOR SUSTAINABLE INFRASTRUCTURE SOLUTIONS

The Capital Region Industry for Sustainable Infrastructure Solutions, or CRISIS, supports economic growth and productivity in the region by advocating for the effective movement of employees, customers, and goods. With a focus on funding and data-driven accountability, CRISIS operates with a mission to "provide a leadership voice to address the Baton Rouge Area's transportation crisis, identifying solutions and advocating for their prioritization and funding."



The Capital Region Mobility Strategy is the latest CRISIS initiative. As a follow up to its February 2015 Regional Projects Analysis, the mobility strategy emphasizes many of the organization's priorities:

- → Work cooperatively toward the creation of a comprehensive regional mobility plan
- → Push accelerated action to improve the "I-10 bottleneck"
- → Deliver an additional major alternative route through the region
- → Support multimodal strategies that give citizens greater transportation options
- → Develop comprehensive, fiscally responsible funding strategy to implement the regional pla

The CRISIS Leadership Team is an influential group of industry leaders with a vested interest in the infrastructure of the Capital Region.

Axiall Lard Oil Company

BASF Lyons Specialty Co.

Baton Rouge General Hospital Methanex

Performance Contractors Mexichem Fluor Inc.

CB&I Our Lady of the Lake Regional Medical

Dow Chemical Co. Center

ExxonMobil Baton Rouge SGS Petroleum Service Corp.

Lamar Advertising St. Elizabeth Hospital

L'Auberge Baton Rouge Turner Industries

The CRISIS Coalition was formed by the Baton Rouge Area Chamber, the Greater Baton Rouge Industry Alliance and the Center for Planning Excellence. The development of the CRMS is being supported with funding and technical support from the Baton Rouge Area Chamber, the Louisiana Disaster Recovery Unit, and the U.S. Department of Housing and Urban Development.

### INFORMED DECISION MAKING

CRISIS is committed to a process that involves community and industry leadership, engages the public, and is built on data-based decision-making. It requires a group of stakeholders committed to the process and the ability to effectively mine the wealth of information contained in the region's past and current plans.

In addition, a successful process includes direct coordination with the two major planning activities underway in our region: the Long Range Transportation Plan update and the Governor's Task Force on Infrastructures Investment. The creation of a Regional Mobility Strategy is intended to compliment these two activities by highlighting the connectedness between an effective transportation system and regional economic growth, and by identifying transportation projects, programs, and strategies that advance our region's economic vitality.

## **S**TAKEHOLDERS

The Capital Region Mobility Strategy includes a focused stakeholder engagement process, including an Oversight Committee and two stakeholder events designed to gather input during strategy development. The Strategic Mobility Forum on October 7, 2016 organized stakeholders into one of three groups:

**Elected Officials**—local, parish, and state representatives

**Practitioners**—public sector staff at the local, parish, and state levels

**Private Industry Representatives**—
business leaders from a variety of industry sectors

## **Processes**

The Capital Region Mobility Strategy comes at an opportune time, as officials are working to assign funding for transportation projects in the region and the state is weighing the appetite for sustainable funding sources for the state's most pressing transportation needs.

**Move 2042**—The Capital Region Planning Commission is updating the region's long range transportation plan, which will help identify transportation projects to be funded over the next 25 years.

**Governor's Task Force on Transportation Infrastructure Investment**—Governor
John Bel Edwards appointed this task force to review the state's transportation plans and recommend how to best invest in critical infrastructure opportunities throughout the state.

## **MOBILITY CONSIDERATIONS**

Our region is fortunate to have great plans and studies in place. These documents outline visions and recommendations across a variety of geographies—neighborhood to city to parish to region. As the Capital Region Mobility Strategy takes shape, it's important to capitalize on the value of these plans while continuing find ways to align their outcomes with the things the region has said it values.

The Capital Region Mobility Strategy makes a strong distinction between plans (visionary documents supported by general frameworks for implementation) and studies (detailed solutions for specific transportation issues based on data and analytics). The mobility strategy, in turn, focuses on transportation decisions that balance a broader set of community and region initiatives. The strategy is organized around five overlapping themes:



### INFRASTRUCTURE PERFORMANCE

The condition and effectiveness of existing roads, bridges, and transportation infrastructure.



## LAND USE AND URBAN FORM

The organization and distribution of the built environment.



## RESILIENCE AND PREPAREDNESS

The mitigation of threats to critical infrastructure and emergency response.



## TRAVEL OPTIONS

The provision of transit service, regional bicycle infrastructure, and demand-based solutions.



## REGIONAL COMPETITIVENESS

The Capital Region's ability to attract and retain a competitive workforce.

#### **OUR REGION**

Though the Capital Region can refer to a much larger area, the study area for the mobility strategy touches only five parishes: the entirety of East Baton Rouge Parish and Ascension Parish as well as portions of West Baton Rouge, Iberville, and Livingston Parishes. **Today, the area is home to approximately 14% of the state of Louisiana's population and 19% of the state's workforce, despite being less than 3% of its land area.** 

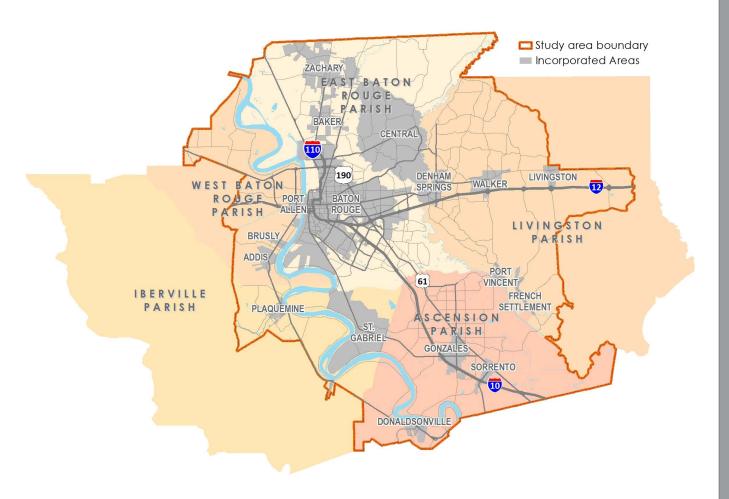
As of 2014, the study area had an estimated populatiown of 721,000 with an additional 24,000 living in the portions West Baton Rouge, Iberville, and Livingston Parishes outside the study area. The total five-parish population is up approximately 13% from 2004. However, **from 2005** 



to 2006, the region experienced an 8% population surge, mostly due to Hurricane Katrina evacuees from neighboring

New Orleans. Though not all of those residents remained in Baton Rouge as permanent residents, the population growth has continued steadily since 2005, with lasting effects on the area's transportation system.

FROM 2005 TO 2006, THE REGION EXPERIENCED AN 8% POPULATION SURGE, MOSTLY DUE TO HURRICANE KATRINA EVACUEES FROM NEIGHBORING NEW ORLEANS.



Square Miles: 1,386

Population (2014): 721,000

Federally Classified Highway miles: 1,837

The Capital Region Mobility Strategy Study Area is based on the Capital Region Metropolitan Planning Organization's study area for their current long range transportation plan update. Though it includes only portions of West Baton Rouge, Livingston and Iberville Parishes, some of the statistics in this briefing cover the entire five-parish area, due to the availability of U.S. Census Bureau data.



A 2014 report from the Texas A&M Transportation Institute named Baton Rouge the 3rd most congested medium-sized metro area in the country based on numerous mobility measures, including hours of yearly delay, wasted fuel due to congestion, and total cost of congestion to consumers. *Infrastructure Performance* speaks to the effect these types of transportation metrics have on quality life.

## In the Capital Region:

Our critical corridors are congested and in need of repair.

Our road congestion and condition is costing us money.

Our response is helping, but the problem isn't going away.

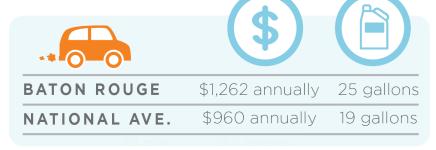
## Our critical corridors are congested and in need of repair.

- → Traffic volumes have increased from 76,000 vehicles per day in 1998 to 106,000 per day in 2013 on the I-10 bridge over the Mississippi River. At the same time, TRIP reports that Baton Rouge has the 11th worst road conditions in the country, with 38% of its major roads in "poor" condition compared to a national average of 28%.
- → According to the Texas A&M Transportation Institute, Baton Rouge has a peak-period planning time index of 2.8, travelers must plan approximately 28 minutes to complete what should normally be a 10-minute trip, due to the unpredictability of traffic conditions.

## Our road congestion and condition are costing us money.

- → According to the Texas A&M Transportation Institute report, commuters waste 25 gallons of fuel and spend an average of \$1,262 per year due to traffic congestion.

  The trucking industry is expected to spend an additional \$189 million annually due to local congestion.
- According to the 2015 report by TRIP, poor road conditions cost local drivers an average of \$705 annually in additional repairs and maintenance.



# Our response is helping but the problem isn't going away.

→ Congestion remains despite the Green Light Plan, a \$700 million capacity-building effort by East Baton Rouge Parish under way since 2006. The plan identified 45 projects of various scales for completion by 2030, with 70% of the projects completed or currently under way.



\$3.3 BILLION IN CAPITAL REGION



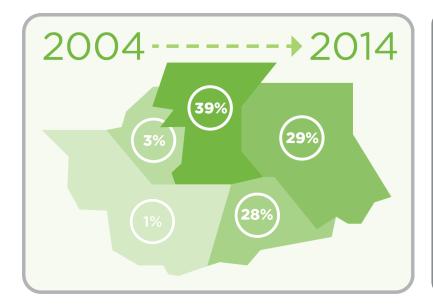
The built environment has a profound impact on how people in the Capital Region experience transportation on a day-to-day basis. According to the U.S. Census Bureau, approximately 25% of all jobs within the study area are concentrated within just 21 square miles along the I-10 corridor in East Baton Rouge. At the same time, population growth has become more decentralized. *Land Use and Urban Form* speaks to this disconnect between where we live and work and the effect it has on mobility.

#### In the Capital Region:

Our growth is occurring farther away from our jobs.

Our commutes are getting longer.

# Our growth is occurring farther away from our jobs.



From 2004 to 2014,
East Baton Rouge Parish
captured 39% of the
region's overall population
growth, Livingston captured
29%, and Ascension Parish
captured 28% of the
growth. West Baton Rouge
and Iberville Parishes
each remained relatively
stagnant.

→ The dispersed growth pattern stresses the transportation network. Because most of the region's jobs are centrally located, travel time and distance increases as workers move farther into the outlying areas. The result is increased traffic congestion. The shift in development patterns has changed commuting in the capital region during the past decade. More than one third of workers live east or southeast of their workplace, following the I-10 and I-12 corridors.

# Our commutes are getting longer.

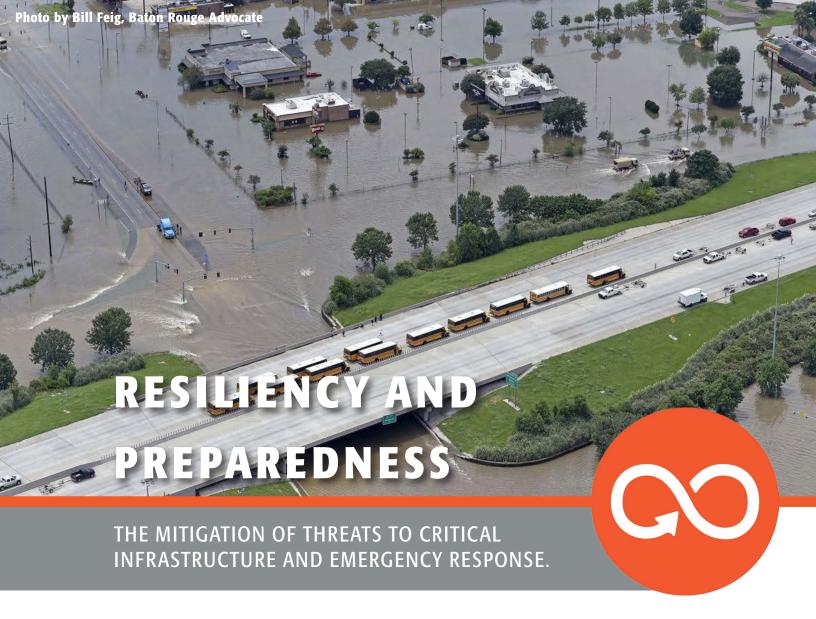
- → Commute distance and time in the region have both increased in recent years. In 2014,
   21% of the area's workers drove 50 miles or more to work each day.
- → The percentage of the region's workforce commuting less than ten miles to work is shrinking (44% in 2014 compared to 49% in 2004). The region's mean travel time to work in 2014 was 26 minutes, and those living in Livingston Parish already have an average travel time of more than 34 minutes.

MORE THAN ONE THIRD OF WORKERS

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The Presidential Policy Directive on Critical Infrastructure Security and Resilience defines resiliency as the ability to prepare for and adapt to changing conditions and withstand and rapidly recover from disruptions. These disruptions, including accidents and naturally occurring threats, can significantly affect the movement of people and goods within and through the region. *Resiliency and Preparedness* speaks to the need to minimize disruptions to mobility before, during, and after these events.

#### In the Capital Region:

Our built environment is susceptible to natural and man-made events.

Our transportation network lacks alternatives when incidents disrupt major corridors.

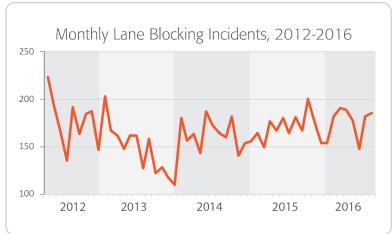
## Our built environment is susceptible to natural and man-made events.

- → The state of Louisiana has experienced two 24+ inch rain events this year alone, including the disastrous flooding in August 2016. This single event had a significant impact on life and property in the Capital Region, with 13 deaths and 60,000 homes damaged.
- → The Capital Region's dual status as an evacuation site and a community vulnerable to large-scale natural disasters makes resiliency particularly important to this region.
- → The recent flooding event took a toll on Louisiana's transportation system, temporarily closing 78 miles if I-10, along with a total of 280 miles of roadway around the region. With few significant arterial options, these closures have the ability to seriously disrupt economic activity and emergency response.
- → In 2015, more than 44,000 crashes occurred throughout the fiveparish region, with 385 causing severe injuries or fatalities. More than half of these crashes occurred in East Baton Rouge, and each severe crash caused a lane to close for an average of 39 minutes.



Our transportation network lacks alternatives when incidents disrupt major corridors.

→ The transportation system in the Capital Region suffers from a lack of predictability. Crashes, weather events, and construction closed interstate lanes in Baton Rouge an average of 169 times per month in 2015, ranging from a low of 149 in April to 200 in November.



With so few travel options available, a lane closure during peak time can cause major backup throughout the region.

→ Baton Rouge's main designated evacuation routes are I-10 and I-12, both prone to closures during major weather events. In addition, a single bridge over the Mississippi River becomes a major chokepoint during high-volume traffic, with no other crossing point within five miles.



Providing reasonable and accessible transportation options helps address limited funding, increased appetite for active living, and strong preferences for healthy communities. Travel choices also contribute to a region's brand. In the Capital Region, recent jumps in transit ridership and an improving bicycle network has failed to keep pace with overall growth. *Travel Options* speaks to this disconnect between where we live and work and the effect it has on mobility.

#### In the Capital Region:

Our opportunities to bike and take transit are limited.

Our workforce lacks access to passenger rail service.

Our region has opportunities to influence transportation demand.

# Our opportunities to bike and take transit are limited.

- The East Baton Rouge Parish has taken great strides in improving bicycle infrastructure in the past 5 years. Since FutureBR's creation in 2011, bicycle infrastructure has grown from 23.4 miles to 59 miles, including bike lanes, shared lanes, and shared use paths.
  The League of American Bicyclists has designated the East Baton Rouge Parish as a Bronze Level Bicycle Friendly Community. However, only 0.3% of commuters bike to work.
- The region's transit options are limited to service provided in Baton Rouge by the Capital Area Transit System (CATS). Currently less than 40% of the population lives within ½-mile of a transit route, compared to an average of almost 48% of the U.S. Population. While ridership increased to an all-time high of 3.9 million rides in 2014, only 1% of commuters in the

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study area use transit as a means of transportation to work.

# Our workforce lacks access to passenger rail service.

- → According to the Baton Rouge Area Chamber, more than 58,000 people commuted between the New Orleans and Baton Rouge metropolitan areas in 2013, accounting for 7% of the Baton Rouge region's workforce. The 11.4% increase in commuters since 2010 is nearly four times the rate of population growth over that same period in the region.
- → Approximately 19,000 commuters travel from Ascension Parish to East Baton Rouge Parish for work. Though no plan for local rail service has been finalized, Ascension already has a site set aside for a commuter rail station, reflecting strong local support for the service.

# Our region has opportunities to influence transportation demand.

→ The centrality of the workforce, presence of large institutional employers, and abundance of shift work could help regional travel demand management efforts be effective in reducing congestion. GeauxRide provides carpool matching and alternative commuting options, and the Capital Region Planning Commission launched a 3-year program aimed at reducing congestion and fuel consumption and improving air quality.



According to the Bureau of Labor Statistics, employment in the Capital Region rose 3.3% in 2015 to its highest-ever level. Since 2013, the region's job growth rate has outperformed the national, state, and peer-cities averages. While these statistics point to a robust economy, job growth continues to lag employment growth, weighed down in part due to worsening travel conditions. *Regional Competitiveness* addresses the role mobility plays in industry recruitment and workforce retention.

#### In the Capital Region:

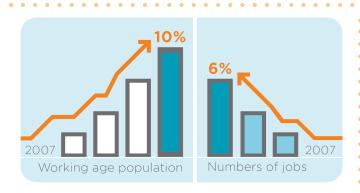
Our region continues to add jobs ... but is that enough?

Our workforce characteristics contribute to our travel trends.

Our transportation challenges are a threat to our economic competitiveness.

# Our region continues to add jobs ... but is that enough?

→ Job growth has been steady but slow over the past decade, increasing by approximately 5% from a total of 345,000 in 2004 to 363,000 in 2014. According to data from the Bureau of Labor Statistics, employment in the region rose 3.3% in 2015, with a growth rate outperforming the national, state, and peer-cities average since 2013. However, job growth has not kept pace with population growth, and the increased competition for available jobs likely contributes to the region's lengthening commute times.



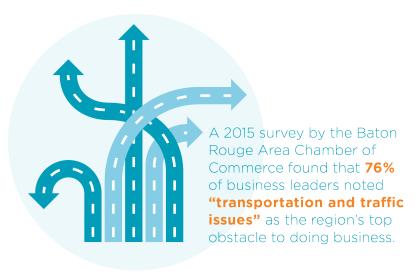
JOB GROWTH
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POPULATION
GROWTH OVER
THE PAST
DECADE.

## Our workforce characteristics contribute to our travel trends.

→ The region's workforce earns high wages (43% earn more than \$39,600 per year compared to the statewide average of \$24,800) and are in the middle of their careers (55% are between 30 and 54 years old). These workers are more likely to choose where to live based on community assets rather than on commute time. This trend contributes to the more dispersed suburbanized development prevalent in the region.

# Our transportation challenges are a threat to our economic competitiveness.

→ Prior to 2004, congestion in the Baton Rouge region mirrored national trends for other medium-sized cities. Based on several measures since 2005, congestion in the region has steadily worsened compared to the national average.





On October 7, a group of local stakeholders gathered together in Baton Rouge for a Strategic Mobility Forum, to discuss the state of transportation in the Capital Region. Approximately 60 people attended the event, representing three groups: elected officials, practitioners, and private industry representatives.

This interactive event allowed attendees to learn more about the Capital Region Mobility Strategy and provide input through a variety of exercises, which asked stakeholders to think about the condition of the regional transportation system, rank the importance of the mobility considerations in reaching regional goals, and describe their preferred course of action.

# **Condition**

How does our regional system currently perform?

# **Importance**

What factors are important when considering our future transportation goals?

## **Action**

What projects, strategies or intiatives would you like to see in the Capital Region?



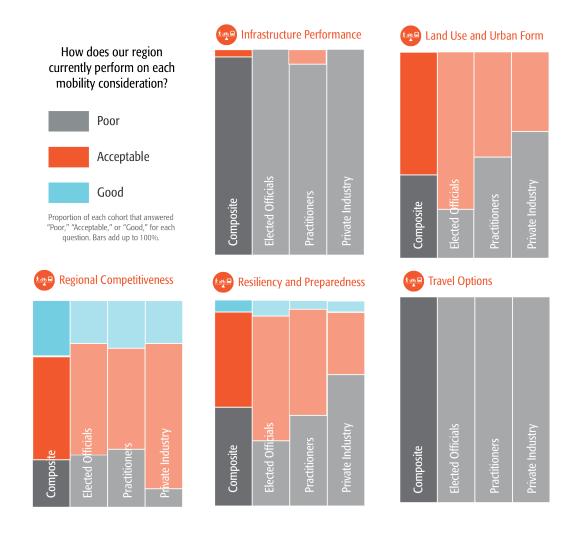
The data collected from these exercises has been analyzed in a variety of ways to examine the important priorities that tie stakeholders together, as well as the disconnects that separate the three cohorts. This information will help inform the development of the Capital Region Mobility Strategy moving forward.

## **CONDITION**

In the "Regional Mobility Dashboard" exercise, participants rated the region's current performance on each mobility consideration as "poor," "acceptable," or "good". The data were then collected and used to compare the group's composite opinion to each individual group and uncover any major disconnects.

# Infrastructure Performance and Travel Options receive poor marks across the board, but opinions are mixed on Land Use, Resiliency, and Regional Competitiveness.

Though the region's Infrastructure Performance and Travel Options were nearly universally rated as "poor," opinions differed on Land Use, Resiliency, and Regional Competitiveness. Overall, elected officials were much more likely than practitioners or private industry representatives to feel the region's land use performance was acceptable. Similarly, private industry ranked the region's Resiliency and Preparedness somewhat lower than other groups, and were more likely to describe the region's competitiveness as "acceptable" or "good."



#### **IMPORTANCE**

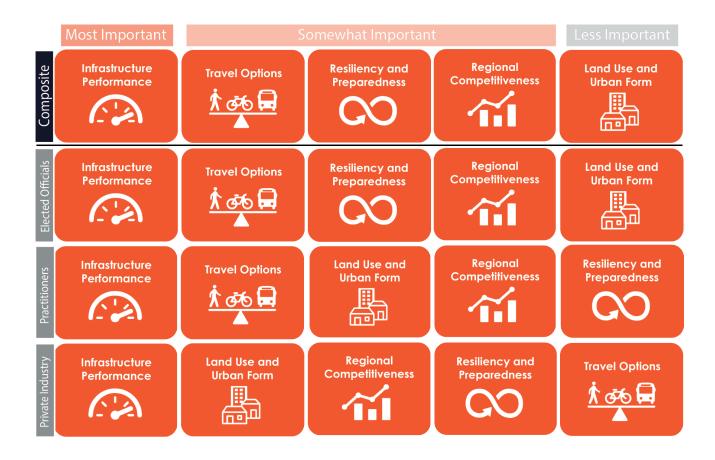
Thinking again about the five mobility considerations, participants were asked to rank these topics in terms of how important they are in planning for the region's future. Again, these responses were broken down based on each participants' role to determine which aspects are most important to certain stakeholder groups.

# Infrastructure Performance ranked as the highest priority across all groups, followed by Travel Options.

When asked to rank the five planning themes in order from most important to least important, Infrastructure Performance vastly outranked all other themes. With a weighted score of 223 (based on the frequency it was chosen as the top-, second-, or third-tier priority) it received nearly double the score of the second-highest ranking theme, Travel Options.

# Not everyone agrees on how important the other mobility considerations are.

While elected officials ranked Resilience and Preparedness as the third priority, followed by Regional Competitiveness and Land Use and Urban Form, practitioners placed Resiliency and Land Use tied for third, followed by Competitiveness. Private industry representatives see Land Use as more important than Competitiveness, followed by Resiliency.



## **ACTION**

Everyone agrees the Capital Region has a mobility problem, but how do we get the job done? Through both keypad polling and a "strategy wall," participants were asked to share their thoughts on the best way to tackle the region's major challenges.

# Participants posted 123 ideas for transportation projects, initiatives or strategies they would like to see implemented.

These ideas included 21 local projects, 23 parish-level projects, and 77 regional projects to improve the larger transportation system. A new bridge over the Mississippi River was the most frequent request, with elected officials being its greatest supporters. The bridge was also the most popular suggestion among private industry representatives.

# Increasing transit options was another popular suggestion.

Thirteen project suggestions at various scales were targeted toward transit, with 85% of these projects posted by practitioners. None of the suggestions came from elected officials. Improvements or expansion of the regional transit system was the most popular suggestion from the practitioner group.

# Funding is by far our greatest barrier, but political will is also a problem.

Ninety-two percent of participants said that more funding for transportation is "absolutely necessary" and that the region cannot be successful without it. However, political will was also considered significant, with 24% of participants ranking it as the greatest barrier.

# Participants want projects that reduce congestion and can be completed quickly.

When asked to select the top three criteria that should be used to identify future projects, congestion reduction and timing rose to the top. Participants also wished to see projects chosen based on identified funding sources and their benefit/cost ratios.

123
projects listed

Other common suggestions:

- Widening I-10 through Baton Rouge
- Improving regional transit options
- Improvements to Highway 30
- 190 Improvements or BUMP project
- Baton Rouge to New Orleans rail line

mentions of a new Mississippi river crossing 92% of participants
said that increased
transportation funding
was "absolutely
necessary" for the region
to be successful.



A coordinated mobility strategy requires a regional approach. By identifying our shared values and priorities for decision-making, we better position our region to be more intentional about what we're asking of each other as well as our regional, state, and federal partners.

Events like the Regional Strategic Mobility Forum provide a place where these ideas can be discussed and offer a platform for highlighting our shared values. Input gathered at the forum offers a few key takeaways:

- → There is consensus that there is a need for action.
- → We're in agreement on the priority of evaluation criteria when seeking to identify regional solutions, and overwhelming agreeing on the need for additional funding.
- → The scale of the desired solutions has been identified as regional.

As simple as these observations may be, they can be used to inform the review and screening of projects that are proposed to respond to our existing transportation deficiencies and future travel demands. By aligning our priorities and expectation for a vibrant region, we have an opportunity to make positive gains at the local and regional scale.

## MOVING FORWARD TOGETHER

When considering the development of Move2042—Capital Region's Long Range Transportation Plan—the Capital Region Mobility Strategy can provide insight on the indicators that can and should be used in the evaluation of projects. The expectation is a set of projects within the financially constrained plan that can be consistently supported. Private industry and public agencies can work together to elevate the importance of these projects and seek partnerships for implementation. Through this process, our long-term strategy will begin to bear lasting impacts to our region's quality of life and economic competitiveness.

While Move2042 will be an expression of our region's long-range strategy, the Governor's Task Force on Transportation Infrastructure Investment considers near-term solutions. This places increased importance on the creation of the CRMS. The results of the Strategic Mobility Forum begin to bring focus on what projects most closely align with these expectations. When coupled with the results of the technical assessment performed by the CRISIS Coalition in February 2015, a set of regional projects that is consistent with the priority criteria as well as the expectations for improved congestion relief begins to emerge. These projects were the result of a screening process that evaluated Capital Region projects from the Louisiana Long Range Transportation Plan. Together, these four projects made up 50% of the project suggestions at the Strategic Mobility Forum:

# **Priority Projects:**

- → New River Crossing South of I-10 Bridge (with LA 30 widening): 39 mentions, including HWY 30 improvements
- → I-10 Widening through Baton Rouge: 7 mentions
- → Ascension Commuter Route (I-10 or Airline): 10 mentions
- → Increased Use of US 190 Bridge (BUMP or North Bypass): 5 mentions

## WHAT'S NEXT

The CRISIS Coalition will continue to collaborate with regional leadership and engage the public on the creation of the CRMS. While recent events have placed a sense of urgency on the identification of congestion relief projects that are often characterized as "mega projects," the CRMS will also include a diversified approach that includes regional projects, programs, and policies that are intended to advance the travel goals and objectives of the broader region. Coordination between the CRMS and the Move2042 process is ongoing and opportunities to advance the community expectations found in Parish plans will also be considered. The Capital Region Mobility Strategy will be published in 2017.







