Preserving Baton Rouge Bridges

THE CONDITION AND FUNDING NEEDS OF BATON ROUGE'S AGING BRIDGE SYSTEM

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Louisiana's bridges are a critical element of the state's transportation system, which supports commerce, economic vitality and personal mobility. The state's transportation system is literally the backbone of Louisiana's economy. Louisiana's transportation system enables the state's residents and visitors to travel to work and school, visit family and friends, and frequent tourist and recreation attractions, while providing its businesses with reliable access to customers, materials, suppliers and employees.

To retain businesses, accommodate population and economic growth, maintain economic competitiveness, and achieve further economic growth, Louisiana will need to maintain and modernize its bridges by repairing or replacing deficient bridges and providing needed maintenance on other bridges to ensure that they remain in good condition as long as possible. Making needed improvements to Louisiana's bridges will require increased and reliable funding from local, state and federal governments, which will also provide a significant boost to the state's economy by creating jobs in the short term and stimulating long term economic growth as a result of preserved and enhanced mobility and access.

BATON ROUGE BRIDGE CONDITIONS

Twenty percent of locally and state-maintained bridges in the Baton Rouge area, which includes East Baton Rouge and West Baton Rouge Parishes, are structurally deficient, meaning there is significant deterioration to the major components of the bridge.

- There are a total of 613 bridges in the Baton Rouge area that are 20 feet or longer. These bridges are maintained by local and state agencies.
- Twenty percent (122 bridges) of state-and locally maintained bridges in the Baton Rouge area are structurally deficient.
- Bridges in the Baton Rouge area that are structurally deficient carry approximately 419,000 vehicles each day.
- Bridges that are structurally deficient may be posted for lower weight limits or closed if their condition warrants such action. Deteriorated bridges can have a significant impact on daily life. Restrictions on vehicle weight may cause many vehicles – especially emergency vehicles, commercial trucks, school buses and farm equipment – to use alternate routes to avoid weight-restricted bridges. Redirected trips also lengthen travel time, waste fuel and reduce the efficiency of the local economy.

- The list below details the 25 most heavily traveled structurally deficient bridges in the Baton Rouge area. ADT is average daily traffic.

Rank	Parish	Location	Facility Carried	Feature Intersected	Year Built	Average Daily Traffic	Open, Closed, Posted
1	East Baton Rouge	Baton Rouge	US0061	LA 73 NORTH	1953	26500	Posted
2	East Baton Rouge	Baton Rouge	US0190	OLD MISS.RIVER BR	1939	20100	Open
3	West Baton Rouge	Baton Rouge	LA0001	PORT ALLEN CANAL	1960	19100	Posted
4	West Baton Rouge	Baton Rouge	LA0001	PORT ALLEN CANAL	1960	19100	Open
5	East Baton Rouge	Baton Rouge	BOB PETIT BLVD	BAYOU FOUNTAIN	1969	18462	Posted
6	East Baton Rouge		LA0427	BAYOU MANCHAC	1972	17100	Posted
7	East Baton Rouge	Baton Rouge	LA0067	MONTE SANO BAYOU	1956	16800	Open
8	East Baton Rouge	Baton Rouge	US0190	US 190 OVER US 61-SCENIC	1940	16350	Open
9	East Baton Rouge	Baton Rouge	US0190	US 190 OVER US 61-SCENIC	1940	16350	Open
10	East Baton Rouge	Baton Rouge	US0061	BAYOU MANCHAC	1953	16150	Open
11	East Baton Rouge	Baton Rouge	US0061	BAYOU MANCHAC	1953	16150	Open
12	East Baton Rouge	Zachary	LA0019	WHITE BAYOU	1951	15400	Open
13	East Baton Rouge	Baton Rouge	LA0030	STREAM NO NAME	1961	14200	Posted
14	West Baton Rouge		US0190	LA 415/M P RR @ LOBDELL	1940	14100	Open
15	East Baton Rouge	Baton Rouge	LA0073	BAYOU MANCHAC	1931	12900	Posted
16	East Baton Rouge	Baton Rouge	LA0327	BAYOU FOUNTIAN	1968	12500	Posted
17	East Baton Rouge	Baton Rouge	N. FLANNERY RD	LIVELY BAYOU	1965	10200	Posted
18	East Baton Rouge		US0061	BATON ROUGE BAYOU	1961	8800	Open
19	West Baton Rouge	Baton Rouge	LA0001	MO PACIFIC RR	1952	8700	Open
20	East Baton Rouge		LA0037	HUBS BAYOU	1972	8600	Posted
21	East Baton Rouge	Baton Rouge	S.FLANNERY RD.	LIVELY BAYOU	1965	8270	Posted
22	East Baton Rouge	Baton Rouge	SILVERLEAF AVE.	ROBERTS CANAL	1956	8137	Closed
23	East Baton Rouge	Baton Rouge	GOODWOOD BLVD.	JONES CREEK	1960	7300	Posted
24	West Baton Rouge		LA0076	STREAM NO NAME	1930	6500	Posted
25	East Baton Rouge	Baton Rouge	CONNELLS VILLAGE L	N. BRANCH WARDS CREEK	1988	6180	Posted

- The following 25 structurally deficient bridges in the Baton Rouge area have the lowest average rating for deck, substructure and superstructure (carrying a minimum of 500 vehicles per day). Each major component of a bridge is rated on a scale of zero to nine, with a score of four or below indicating poor condition. If a bridge receives a rating of four or below for its deck, substructure or superstructure, it is rated as structurally deficient.

Rank	Parish	Location	Facility Carried	Feature Intersected	Year Built	Average Daily Traffic	Open, Closed, Posted
1	East Baton Rouge	Baton Rouge	SILVERLEAF AVE.	ROBERTS CANAL	1956	8137	Closed
2	West Baton Rouge	Baton Rouge	LA0001	PORT ALLEN CANAL	1960	19100	Posted
3	West Baton Rouge	Baton Rouge	LA0001	PORT ALLEN CANAL	1960	19100	Open
4	East Baton Rouge	Baton Rouge	US0061	LA 73 NORTH	1953	26500	Posted
5	East Baton Rouge	Baton Rouge	US0061	BAYOU MANCHAC	1953	16150	Open
6	West Baton Rouge		US0190	LA 415/M P RR @ LOBDELL	1940	14100	Open
7	West Baton Rouge	Baton Rouge	LA0001	MO PACIFIC RR	1952	8700	Open
8	East Baton Rouge		LOCAL ROAD	DRAINAGE CANAL	1968	610	Posted
9	East Baton Rouge	Baton Rouge	BOB PETIT BLVD	BAYOU FOUNTAIN	1969	18462	Posted
10	East Baton Rouge	Baton Rouge	US0190	US 190 OVER US 61-SCENIC	1940	16350	Open
11	East Baton Rouge	Baton Rouge	US0190	US 190 OVER US 61-SCENIC	1940	16350	Open
12	East Baton Rouge	Baton Rouge	US0061	BAYOU MANCHAC	1953	16150	Open
13	East Baton Rouge	Baton Rouge	N. FLANNERY RD	LIVELY BAYOU	1965	10200	Posted
14	East Baton Rouge	Central	LOCAL ROAD	DRAINAGE BAYOU	1966	1480	Open
15	East Baton Rouge		LOCAL ROAD	WHITE BAYOU	1965	1120	Open
16	East Baton Rouge	Baton Rouge	CONGRESS BLVD	DAWSON CREEK	1970	500	Open
17	East Baton Rouge	Baton Rouge	US0190	OLD MISS.RIVER BR	1939	20100	Open
18	East Baton Rouge	Baton Rouge	S.FLANNERY RD.	LIVELY BAYOU	1965	8270	Posted
19	West Baton Rouge		LA0076	STREAM NO NAME	1930	6500	Posted
20	East Baton Rouge	Baton Rouge	CLAYCUT ROAD	DAWSON CREEK	1964	5323	Posted
21	West Baton Rouge		LA0076	CHALPIN BAYOU	1980	1720	Open
22	East Baton Rouge		LOCAL ROAD	DRAINAGE BAYOU	1968	610	Posted
23	East Baton Rouge	Baton Rouge	LA0030	STREAM NO NAME	1961	14200	Posted
24	East Baton Rouge	Baton Rouge	LA0073	BAYOU MANCHAC	1931	12900	Posted
25	East Baton Rouge		US0061	BATON ROUGE BAYOU	1961	8800	Open

TRANSPORTATION FUNDING AND PRESERVING LOUISIANA'S AGING BRIDGES

Maintaining aging bridges becomes more costly as they reach the limits of their design life, challenging state and local transportation agencies to take an asset management approach to bridge preservation that emphasizes enhanced maintenance techniques that keep infrastructure in good condition as long as possible, delaying the need for costly reconstruction or replacement.

- Repairing and replacing bridges in poor condition and preserving bridges in fair and good condition will require increased and reliable funding from local, state and federal governments.

- A recent survey of states by the U.S. General Accountability Office (GAO) found that more than half of states surveyed (14 out of 24) reported that inadequate funding was a challenge to their ability to maintain bridges in a state of good repair.

- Under pressure from fiscal constraints, aging bridges, and increased wear due to growing travel volume, particularly by large trucks, transportation agencies are adopting cost-effective strategies focused on keeping bridges in good condition as long as possible. While this strategy requires increased initial investment, it saves money over the long run by extending the lifespan of bridges.

- The GAO Report found that the increase in the number and size of bridges that are approaching the limits of their design life will likely place a greater demand on bridge owners in the near future, making it more difficult to mitigate issues in a cost-effective manner.

- A survey included in the GAO report found that more than half of states surveyed (13 out of 24) indicated that the advanced age of many bridges posed a challenge to their ability to maintain their bridges in a state of good repair.

- Bridge preservation may include washing, sealing deck joints, facilitating drainage, sealing concrete, painting steel, removing channel debris, and protecting against stream erosion.

- Rehabilitation involves major work required to restore the structural integrity of a bridge as well as work necessary to correct major safety defects.

- Replacement projects include total replacements, superstructure replacements, and bridge widening.

- The need to repair or replace high priority bridges may create a funding cycle that makes it difficult to keep pace with the needed preservation activities.

TRANSPORTATION AND ECONOMIC GROWTH IN LOUISIANA

The efficiency of Louisiana's transportation system, particularly its roads, highways and bridges, is critical to the health of the state's economy. Businesses rely on an efficient and dependable transportation system to move products and services. A key component in business efficiency and success is the level and ease of access to customers, markets, materials and workers.

- Annually, $734 billion in goods are shipped to and from sites in Louisiana.

- Businesses have responded to improved communications and greater competition by moving from a push-style distribution system, which relies on low-cost movement of bulk commodities and large-scale warehousing, to a pull-style distribution system, which relies on smaller, more strategic and time-sensitive movement of goods.

- Increasingly, companies are looking at the quality of a region's transportation system when deciding where to re-locate or expand. Regions with congested or poorly maintained roads may see businesses relocate to areas with a smoother, more efficient and more modern transportation system.

- Increasingly, companies are looking at the quality of a region's transportation system when deciding where to re-locate or expand. Regions with congested or poorly maintained roads may see businesses relocate to areas with a smoother, more efficient and more modern transportation system. Highway accessibility was ranked the number one site selection factor in a 2017 survey of corporate executives

by Area Development Magazine. Labor costs and the availability of skilled labor, which are both impacted by a site's level of accessibility, were rated second and third, respectively.

- The Federal Highway Administration estimates that each dollar spent on road, highway and bridge improvements results in an average benefit of $5.20 in the form of reduced vehicle maintenance costs, reduced delays, reduced fuel consumption, improved safety, reduced road and bridge maintenance costs and reduced emissions as a result of improved traffic flow.

Sources of information for this report include the Louisiana Department of Transportation and Development (LADOTD), the Federal Highway Administration (FHWA), the National Bridge Inventory (NBI), the Bureau of Transportation Statistics (BTS), and the U.S. Census Bureau.