Date of Hearing: April 27, 2015

ASSEMBLY COMMITTEE ON TRANSPORTATION Jim Frazier, Chair AB 1164 (Gatto) – As Amended April 21, 2015

SUBJECT: State highways: performance measures

SUMMARY: Requires the California Department of Transportation (Caltrans) to conduct an annual evaluation and rating of the quality of the state highway system, using specified measurements, and to report on its findings. Specifically, **this bill**:

- 1) Requires Caltrans to conduct an annual evaluation and rating of the overall quality of the state highway system and the resources needed to provide a system in good repair.
- 2) Requires the evaluation to demonstrate how resource, staffing, and programming decisions impact the overall condition of the state highway system.
- 3) Requires the evaluation to address the number of distressed lane miles, bridge conditions, and life cycle costs and to also include the following:
 - a) The rating of the state's urban interstate lane miles, measured according to the International Roughness Index (IRI), and the schedule and resources needed to bring at least 90% of the lane miles rated in poor condition into good condition;
 - b) The rating of the state's rural interstate lane miles, also measured according to the IRI, and the schedule and resources needed to bring at least 95% of the lane miles rated in poor condition into good condition.
 - c) The percentage of lane miles on the state freeways and highways that are distressed lane miles and the schedule and resources needed to bring the percentage of distressed lane miles to 5% or less.
 - d) The schedule and resources needed to bring the pavement level of service to the wellmaintained pavement level for 95% or more of the lanes miles on the state highway system.
 - e) The percentage of the state's bridges with a bridge health index (BHI) rating of at least 94, the percentage of bridges with a BHI of 80 or lower, and the schedule and resources needed to perform bridge maintenance and capital repairs to ensure that all of the state's bridges achieve a BHI rating of at least 94.
 - f) The number of the state's bridges that are structurally deficient or functionally obsolete under federal standards and the schedule and resources needed to ensure that no more than 10% of the state's bridges are structurally deficient or functionally obsolete.
- 4) Requires Caltrans to consult with other specified entities in conducting the evaluation.
- 5) Requires Caltrans, until March 31, 2020, to submit annual reports to the Legislature regarding its evaluation and rating.

EXISTING LAW:

- 1) Grants Caltrans broad authority related to control of state highways.
- 2) Directs Caltrans to improve and maintain the state highways.
- 3) Requires Caltrans to prepare a 10-year state rehabilitation plan for the rehabilitation and reconstruction of all state highways and bridges owned by the state. The plan is to inform the State Highway Operation and Protection Program (SHOPP) by identifying all rehabilitation needs as well as specific milestones and quantifiable accomplishments, such as miles to be repaved and number of bridges to be retrofitted. The plan is required to include strategies to control costs and improve the efficiency of the program.
- 4) Directs Caltrans to develop the SHOPP, a program of major capital projects necessary to preserve and protect the state highway system. Projects in the SHOPP are limited to those that do not add new capacity to the system.
- 5) Requires Caltrans, in consultation with the CTC, to prepare an asset management plan to guide development of the SHOPP and requires CTC to adopt related targets and performance measures that reflect state policy goals and objectives.
- 6) Vests CTC with authority to review and approve the final asset management plan, as described.
- 7) As set forth in the federal Moving Ahead for Progress in the 21st Century Act (MAP-21), requires each state to develop a risk-based asset management plan for the national highway system to improve or preserve the condition of the assets and the performance of the system.

FISCAL EFFECT: Unknown

COMMENTS: Caltrans is responsible for maintaining and operating the approximately 50,000 lane-mile state highway system, including nearly 13,000 bridges. The department monitors the condition and operational performance of the state highway through periodic inspections, traffic studies, and system analysis. From this, Caltrans prepares its ten-year SHOPP plan. The plan is required by existing law to include the identified needs for a ten-year period based on quantifiable accomplishments and a cost estimate for at least the first five years. According to Caltrans, the goal-constrained needs developed as a part of this analysis represents the estimated cost to meet reasonable performance goals. For example, for pavements, the goal is to reduce the current level of distressed lane miles of pavement on the state highway system down to 10% in ten years. Other elements of the SHOPP have similar performance goals, such as:

- 1) Roadway preservation: Reduce to 10% the number of distressed lane miles.
- 2) Bridge preservation: Reduce to 3% of bridges distressed.
- 3) Major damage: Restore damage within 180 days.

Through the ten-year SHOPP plan, and other tools, Caltrans uses a strategic approach to managing highway assets. This approach has been already endorsed at the federal and state level. In fact, recent legislation at both the federal and state levels already require Caltrans to

develop a system to evaluate its assets much like the one required by this bill. For example, MAP-21 requires each state to develop a risk-based asset management plan for the national highway system to improve or preserve the condition of the assets and the performance of the system. The plans are to include strategies that lead to progress toward achieving specific targets related to asset condition and performance. At a minimum, states must address pavements and bridges but are encouraged to include all infrastructure assets within the highway right-of-way in their asset management plan. Additionally, the federally required asset management plan is to include:

- 1) A summary listing of the pavement and bridge assets on the national highway system in the state, including a description of the condition of those assets;
- 2) Asset management objectives and measures;
- 3) Performance gap identification;
- 4) Lifecycle cost and risk management analysis;
- 5) A financial plan; and,
- 6) Investment strategies.

Last session, the Legislature passed and the Governor signed SB 486 (DeSaulnier), Chapter 917, Statutes of 2014, that, among other things, requires Caltrans to prepare an asset management plan to guide development of the SHOPP. Asset management is a strategic and systematic process of operating, maintaining, and improving physical assets. Caltrans focuses on engineering and economic analysis, based upon quality information, to identify a structured sequence of maintenance, preservation, repair, rehabilitation, and replacement actions that will achieve and sustain a desired and sustainable state of good repair over the lifecycle of the assets at minimum practicable cost.

Unlike MAP-21, SB 486 did not identify specific categories of assets to include in the asset management plan. Instead it requires CTC to adopt targets and performance measures that reflect state policy goals and objectives.

AB 1164 requires Caltrans to conduct an evaluation using specified measures, including:

- 1) International Roughness Index: This index is used to monitor pavement smoothness. IRI data measures the relative up and down movement of the vehicle. On a smooth road, such as a newly paved rehabilitation project, the up and down movement is low. On rough pavements, IRI values are high.
- 2) Bride Health Index: A single-number assessment of a bridge's condition based on the bridge's economic worth, determined from an element level inspection. The index makes it possible to ascertain the structural quality of a single bridge or a network of bridges and to make objective comparisons with other bridges or networks.

The author believes the state highway system is in dire need of improvement. He notes that it is operating well beyond its design life and beyond its capacity. Additionally, he is concerned that continued population growth imposes even greater wear and tear on the already-aging system.

He introduced AB 1164 to provide a valuable tool for decision makers to help them prioritize projects.

Committee concern: The author's desire for a performance management approach to managing the state's highway system is just the sort of approach that could lead to a better use of the state's limited transportation resources. The problem with the bill is, however, this approach is already being done at the local, state, and federal levels.

Previous legislation: SB 486 (DeSaulnier), Chapter 917, Statutes of 2014, among other things, requires Caltrans, in consultation with the CTC, to prepare an asset management plan to guide development of the SHOPP and requires CTC to adopt related targets and performance measures that reflect state policy goals and objectives.

REGISTERED SUPPORT / OPPOSITION:

Support

None on file

Opposition

None on file

Analysis Prepared by: Janet Dawson / TRANS. / (916) 319-2093