

Strategies for Additional TIM Fee Reductions:

Upon the Board's adoption of a 20-year forecast, staff can begin the analysis process for the adjustment of the Traffic Impact Mitigation (TIM) Fee Program. Below are several strategies for this process.

1. Road Constrained Alternative - A road constrained alternative will allow the Board to hold a roadway to a determined number of lanes. For example, the Board can determine that Pleasant Valley Road should remain at two lanes instead of increasing to four lanes based on growth in the area as allowed by land use. If the Travel Demand Model (TDM) Model output results in four lanes on Pleasant Valley Road, several strategies may be used to control the desired results. These strategies include:
 - a. Development management
 - Types of uses
 - Mixture of uses
 - Location of uses
 - b. Access management
 - Number of access points
 - Location of access points
 - Allowable turn movements
 - c. Corridor Management
 - Parallel corridor capacity
 - Signals and other traffic control
 - Capacity Enhancements
 - d. Policy Considerations
 - Level of Service thresholds (See discussion in Item 5 below)
 - Threshold required for improvement
2. Removing Projects - There are some projects in the TIM Fee Program that may not be necessary for traffic impact mitigation. Staff is not recommending deletion of any specific projects at this time. Rather, as directed by the Board on February 14, 2012, staff will; 1) examine, identify, and list all projects that may not be necessary for traffic mitigation, along with associated cost savings; and, 2) return to the Board upon completion of analysis based on the updated TDM to ask for direction on which projects the Board would consider removing from the TIM Fee Program.

Interchange Projects:

The Board stated previously that some projects may not be needed. Approximately a third of the TIM Fee Program is slated for improvements on the State Highway System. As the Board is aware, a great deal of funding, both TIM Fee Program and State and Federal grant funding, have been expended for these projects. Any actions to eliminate all or a portion of the State Highway Projects from the TIM Fee Program will have to take those expenditures into account. Several of the projects, such as the Missouri Flat Interchange Project (Phase 1B) cannot be eliminated from the TIM Fee Program even if they are completed, since the funds have been obligated.

Additional issues that will need to be analyzed include the need for additional environmental

documentation – likely a supplement to the General Plan EIR. Also, the TIM Fee Program includes an expectation for approximately \$180M in State and Federal grant funds. Since most of these grants are directed at State Highway Improvements, the elimination of State Highway Projects from the TIM Fee Program may put those funds at risk.

Given the complexity of this portion of the TIM Fee Program, along with the issue of compliance with General Plan policies, effects of reimbursement and development agreements, State Government Code requirements, etc., staff recommends the Board provide any guidance and instructions on how to proceed. Such direction may include looking only at removing selected interchanges, removing the Highway 49 Projects, or removing the Highway 50 Mainline Projects to the extent possible.

Upon Board identification of those Projects to be deleted from the TIM Fee Program (if any), staff would re-evaluate the TIM Fee Program as a whole, identify and document likely ramifications, and pursue any administrative functions that may be necessary to implement the proposed changes. This would include, but not be limited to, such items as, identifying actual impacts to TIM Fee Program and CIP, and determining if any environmental update to the General Plan EIR would be necessary.

Intersection/Safety Line Item:

The TIM Fee Program includes a line item entitled “Traffic Signal, and Intersection Operational Improvements” with a total cost of \$89.3M. Traffic Signal Projects include such intersection improvements as signalization, widening for turn pockets and shoulders, bike and pedestrian facilities, and Americans with Disabilities Act (ADA) required improvements. The intersection operational improvement costs are to pay only for required local match funds on State and Federal grants for operational improvement projects such as Intelligent Transportation System (ITS) facilities and high accident location mitigation improvements.

Staff will create and evaluate a list of areas that may require signals or intersection operational improvements. This evaluation will determine which signals or intersection operational improvements should be included within the TIM Fee Program and the Capital Improvement Program (CIP). The ramification of reducing funding for the “Traffic Signals and Intersection Operational Improvements” line item would be, primarily, fewer intersections in the County improved through the TIM Fee Program. Intersection improvements beyond those funded by the TIM Fee Program would need to be funded from another source. For example, development projects could be required to construct the required mitigation improvements. Please see the discussion regarding purchase of Synchro software in the Green Valley Road Corridor Analysis Board Item #13-0889. The purchase of this software will enable staff to determine if intersection improvements are needed for operational purposes, and ensure compliance with the General Plan Policy Tc-Xa.

Bridge Line Item:

The Bridge line item is similar to the “Traffic Signals and Intersection Operational Improvement” line item above which uses funds for the local match on State and Federal grants for bridge projects (\$8.1M). The result of reducing funding for the grant match funds could be the reduction in outside grants used by the County to construct needed improvements. This is a case where spending a dollar of County money nets nine dollars of Federal money.

Other:

The TIM Fee Program includes funding for Highway 50 improvement study in Camino, with a cost of \$2M, although \$0.6M has already been spent. There is a "Transit Improvement" line item for the construction of Park and Ride lots, purchase of commuter buses, etc., totaling approximately \$10.5M. This has been allocated to El Dorado County Transit in order to help alleviate traffic on Highway 50. (Note that \$1.3M has already been spent.)

Staff is not recommending the deletion or reduction of any of these specific line item amounts at this time. Rather, if directed by the Board to proceed, the staff will look at the issues involved in such a deletion or reduction, and report back to the Board on the impacts of such decision(s). One issue staff will need to evaluate as part of this process is to review how much funding has already been expended within each specific line item. In some cases, the results of the evaluation may preclude deleting the specific line item entirely.

3. Reviewing Soft Costs - Soft costs include professional, technical and management services related to the design and construction of projects during the preliminary engineering, final design, and construction phases of the project. This includes environmental work, engineering design services, risk assessment, cost estimating, scheduling, surveying services, materials testing, administration, and management by County staff or outside consultants. Soft costs are in some cases (e.g., grant funded projects, Caltrans projects) calculated as percentages of hard construction cost estimates. On other projects, the percentage is used as a guideline, and soft costs are estimated by engineering project managers, based on a level of work effort analysis. Variables considered when estimating soft costs include:

- Contract duration;
- Project size and price;
- Complexity of the project;
- Timing of the project's Notice to Proceed;
- The physical location of the project;
- The amount of night work that may be involved;
- The type of project (i.e. bridge, wall, roadwork, drainage, etc.);
- The current bidding environment; and
- Current labor cost.

Staff has recently developed and implemented a project delivery system using a Work Breakdown Structure (WBS), which will assist the Division in tracking and accurately estimating project delivery soft costs. The project delivery system will provide insight into process improvements that will help effectively forecast and manage project delivery soft costs.

4. Revising Road Standards - Pursuant to General Plan Policy TC-1a, "The County shall plan and construct County-maintained roads as set forth in Table TC-1 (see Exhibit A). Road design standards for County-maintained roads shall be based on the American Association of State Highway and Transportation Officials (AASHTO) standards, and supplemented by California Department of Transportation (Caltrans) standards and by County standards. County standards include typical cross-sections by road classification, consistent with right-of-way widths summarized in Table TC-1.

Roadway width should provide the minimum pavement width to support travel lanes for

public, emergency, maintenance, and service vehicles. As part of the Targeted General Plan Amendment (TGPA), the County is analyzing the impacts of reducing road spacing, Right of Way widths and roadway widths. Reduced roadway width may result in lower CIP construction and maintenance costs, which may result in lower TIM fees.

5. Altering LOS and Concurrency Policies - LOS analysis determines how well a roadway functions during peak hour conditions and calculates the efficiency of the traffic flow for the motorist. LOS delay is based on the difference between travel time under ideal conditions and travel time actually experienced. Six levels of service are defined for capacity analysis. The levels of service are given letter designations A through F, with LOS A representing the best range of operating conditions and LOS F the worst.

General Plan Policy TC-Xd states that “LOS for County-maintained roads and state highways within unincorporated areas of the County shall not be worse than LOS E in the Community Regions or LOS D in Rural Centers or Rural Regions, except as specified in Table TC-2,” (Exhibit B). The policy further states, “the volume to capacity ratio of the roadway segments listed in Table TC-2 shall not exceed the ratio specified in that table.”

As part of the TGPA, the County is analyzing revising policies to clarify the definition of “worsen,” what action or analysis is required if the definition of “worsen” is met, clarification of the parameters of analysis (i.e. analysis period, analysis scenario methods) and thresholds of timing improvements. Changes to the definitions could potentially modify the TDM analysis and impact the Circulation Element within the General Plan.

Revising thresholds for LOS may impact the size of infrastructure needed, which could increase or decrease required mitigations. If required mitigations can be decreased, TIM fees may be lowered as a result.

Measure Y Committee Recommendation to decrease TIM Fee Program by 50% to 80%

The Measure Y Committee stated that TIM Fees may be lowered by 50% to 80%. Based on the size of today’s TIM Fee Program, a 1% reduction is equivalent to approximately \$5M. So to reduce the TIM Fee Program by at least 50% would equate to a reduction of close to \$500M. In order to achieve this reduction, the discussion above requires analysis of options to potentially provide the desired outcome. Potential options or combinations of these options must occur:

1. Removal of \$500M of Roadway Projects from the TIM Fee Program
2. Board of Supervisors to allow roadway segment to go to LOS F
3. A review of what costs are included in the TIM Fee Program (e.g. Right of Way, design costs, sidewalks, etc.)
4. Remove TIM Fee Program and require all development to fully mitigate all roadway impacts regardless of their fair share calculation.
5. See item 2 above regarding removal of projects from the TIM Fee Program.

As discussed previously, the County must be cautious in removing TIM Fee projects as there could be unintended consequences.

EXHIBIT A

TABLE TC-1 GENERAL ROADWAY STANDARDS FOR NEW DEVELOPMENT BY FUNCTIONAL CLASS				
Functional Class	ACCESS CONTROL		CROSS SECTION	
	Public Roads Intersections (Or interchanges)	Abutting Property Driveways and Private Roads	ROW	Roadway Width
Six-Lane Divided Road	½ mile minimum spacing	Restricted	130'	108'
Four-Lane Divided Road	½ mile minimum spacing	Limited	100'	84'
Four-Lane Undivided Road				
Community Regions	½ mile minimum spacing	Limited	80'	64'
Rural Centers and Rural Regions	½ mile minimum spacing	Limited	80'	64'
Major Two-Lane Road				
Community Regions	¼ mile minimum spacing	Limited	60'	40'
Rural Centers and Rural Regions	¼ mile minimum spacing	Permitted	60'	40'
Local Road	¼ mile minimum spacing	Permitted	60'	Varies
Notes:				
<ol style="list-style-type: none"> 1. Access control and cross sections are desired standards. Details and waiver provisions shall be incorporated to the Design and Improvement Standards Manual (El Dorado County 1990). 2. Notwithstanding these highway specifications, additional right-of-way may be required for any classification when a road coincides with an adopted route for an additional public facility (e.g., transit facilities, bikeways, or riding and hiking trails), or a scenic highway. 3. The County may deviate from the adopted standards in circumstances where conditions warrant special treatment of the road. Typical circumstances where exceptions may be warranted include: <ol style="list-style-type: none"> a. Extraordinary construction costs due to terrain, roadside development, or unusual right-of-way needs; or b. Environmental constraints that may otherwise entirely preclude road improvement to the adopted standards, as long as environmental impacts are mitigated to the extent feasible. 4. Travel ways for all highways should be 12 feet wide. Turning lanes should be 12 feet wide, but may be reduced to 10 feet based on topographical or right-of-way constraints. All travel ways on roads should be paved. 				

EXHIBIT B

TABLE TC-2 EL DORADO COUNTY ROADS ALLOWED TO OPERATE AT LEVEL OF SERVICE F ¹ (Through December 31, 2018)		
Road Segment(s)		Max. V/C ²
Cambridge Road	Country Club Drive to Oxford Road	1.07
Cameron Park Drive	Robin Lane to Coach Lane	1.11
Missouri Flat Road	U.S. Highway 50 to Mother Lode Drive	1.12
	Mother Lode Drive to China Garden Road	1.20
Pleasant Valley Road	El Dorado Road to State Route 49	1.28
U.S. Highway 50	Canal Street to junction of State Route 49 (Spring Street)	1.25
	Junction of State Route 49 (Spring Street) to Coloma Street	1.59
	Coloma Street to Bedford Avenue	1.61
	Bedford Avenue to beginning of freeway	1.73
	Beginning of freeway to Washington overhead	1.16
	Ice House Road to Echo Lake	1.16
State Route 49	Pacific/Sacramento Street to new four-lane section	1.31
	U.S. Highway 50 to State Route 193	1.32
	State Route 193 to county line	1.51
Notes:		
¹ Roads improved to their maximum width given right-of-way and physical limitations.		
² Volume to Capacity ratio.		