



# **AGENDA**

## **Technical Advisory Committee**

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### **Committee Members**

Shawn Pelletier	<i>City of Aliso Viejo</i>
Rudy Emami	<i>City of Anaheim</i>
Tony Olmos	<i>City of Brea</i>
David Jacobs	<i>City of Buena Park</i>
Raja Sethuraman	<i>City of Costa Mesa</i>
Khalid Bazmi	<i>County of Orange</i>
Doug Dancs	<i>City of Cypress</i>
Mark Denny	<i>City of Dana Point</i>
Mark Lewis	<i>City of Fountain Valley</i>
Don Hoppe	<i>City of Fullerton</i>
William Murray	<i>City of Garden Grove</i>
Travis Hopkins	<i>City of Huntington Beach</i>
Manuel Gomez	<i>City of Irvine</i>
Chris Johansen	<i>City of La Habra</i>
Michael Belknap	<i>City of La Palma</i>
Christina Templeton	<i>City of Laguna Beach</i>
Ken Rosenfield	<i>City of Laguna Hills</i>
Nasser Abbaszadeh	<i>City of Laguna Niguel</i>
Akram Hindiyeh	<i>City of Laguna Woods</i>
Tom Wheeler	<i>City of Lake Forest</i>
Dave Hunt	<i>City of Los Alamitos</i>
Mark Chagnon	<i>City of Mission Viejo</i>
David Webb	<i>City of Newport Beach</i>
Joe DeFrancesco	<i>City of Orange</i>
Luis Estevez	<i>City of Placentia</i>
E. Maximous	<i>City of Rancho Santa Margarita</i>
Bill Cameron	<i>City of San Clemente</i>
Steve May	<i>City of San Juan Capistrano</i>
William Galvez	<i>City of Santa Ana</i>
Steve Myrter	<i>City of Seal Beach</i>
Stephanie Camorlinga	<i>City of Stanton</i>
Doug Stack	<i>City of Tustin</i>
Akram Hindiyeh	<i>City of Villa Park</i>
Adolfo Ozaeta	<i>City of Westminster</i>
Michael Wolfe	<i>City of Yorba Linda</i>

Orange County Transportation Authority  
550 South Main Street, Room 07  
Orange, California  
**February 22, 2017 1:30 p.m.**

*Any person with a disability who requires a modification or accommodation in order to participate in this meeting should contact the Measure M2 Local Programs section, telephone (714) 560-5673, no less than two (2) business days prior to this meeting to enable OCTA to make reasonable arrangements to assure accessibility to this meeting.*

*Agenda descriptions are intended to give members of the public a general summary of items of business to be transacted or discussed. The posting of the recommended actions does not indicate what action will be taken. The Committee may take any action which it deems to be appropriate on the agenda item and is not limited in any way by the notice of the recommended action.*



*All documents relative to the items referenced in this agenda are available for public inspection at [www.octa.net](http://www.octa.net) or through the Measure M2 Local Programs office at the OCTA Headquarters, 600 South Main Street, Orange, California.*

## **Call to Order and Self Introductions**

## **Consent Calendar Items**

*All items on the Consent Calendar are to be approved in one motion unless a Technical Advisory Committee member requests separate action on a specific item.*

- 1. Approval of November 9, 2016 Technical Advisory Committee Minutes – pg. 5**

## **Discussion Items**

There are no discussion items.

## **Regular Items**

- 2. Complete Streets Ad Hoc Committee Review – Joe Alcock/Carolyn Mamaradlo - pg. 9**

### ***Overview***

In September 2016, Orange County Transportation Authority staff convened an Ad Hoc committee comprised of volunteer members from the Technical Advisory Committee (and/or their designees) to discuss complete streets implementation and the Master Plan of Arterial Highways. The Ad Hoc committee met three times and ultimately developed recommendations to address traffic calming provisions within the Guidance for the Administration of the Master Plan of Arterial Highways. The proposed revisions expand allowances for traffic calming measures on Master Plan of Arterial Highways facilities and clarify which types of traffic calming measures are permitted.

### ***Recommendation***

- A. Approve proposed revisions to the Guidance for the Administration of the Master Plan of Arterial Highways.
- B. Direct staff to advance proposed revisions to the Guidance for the Administration of the Master Plan of Arterial Highways to the Orange County Transportation Authority's Regional Planning and Highways Committee.

- 3. 2017 CTFP Call for Projects Programming Recommendations – Sam Kaur, pg.18**

### ***Overview***

The Orange County Transportation Authority issued the 2017 annual Measure M2 Regional Capacity Program and Regional Traffic Signal Synchronization Program call for projects in August 2016. This call for projects made available approximately \$40 million in grant funding for streets and roads projects countywide. A list of projects recommended for funding is presented for review and approval.



**Recommendation**

- A. Recommend for Board of Directors' approval of the programming recommendations for the 2017 Regional Capacity Program to fund 13 projects, in an amount totaling \$32.24 million.
- B. Recommend for Board of Directors' approval of the programming recommendations for the 2017 Regional Traffic Signal Synchronization Program to fund 5 projects, in an amount totaling \$2.5 million.

**4. Correspondence**

OCTA Board Items of Interest

- **Monday, February 13, 2017**

- Item 7: Low Carbon Transit Operations Program Recommendations for Fiscal Year 2016-17 Funds*

- Item 14: Central Harbor Boulevard Transit Corridor Study Update*

- **Monday, January 23, 2017**

- Item 16: Transit Projects Programming Revisions*

- Item 22: OC Bus 360 Update and Next Steps*

- **Monday, January 9, 2017**

- Item 6: Active Transportation Program Cycle 3 Project Prioritization*

- Item 8: Regional Planning Update*

- **Monday, December 12, 2016**

- Item 7: Capital Programming Policies Update*

- Item 8: Amendment to the Master Plan of Arterial Highways*

- Item 9: 2017 Technical Steering Committee Membership*

- Item 19: Project V Community-Based Circulators Program Ridership Report*

- Item 20: Comprehensive Transportation Funding Programs Semi-Annual Review – September 2016*

- Item 21: Measure M2 Quarterly Progress Report for the Period of July 2016 through September 2016*

- Item 24: California Department of Transportation Draft Managed Lanes Network Study*

Announcements by Email

- Governor Brown Declares State of Emergency in Counties Across California Following Sever Winter Storms, *sent 2/8/17*
  - 2017 Congestion Management Program (CMP) Update, *sent 2/6/17*
  - March 2017 Semi-Annual Review Instructions, *sent 2/1/17*
  - February 8<sup>th</sup> Technical Steering Committee Meeting Cancellation Notice, *sent 2/1/17*
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# **AGENDA**

## ***Technical Advisory Committee***

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- Final Draft – MPAH Guidance Traffic Calming Policy, *sent 1/23/17*
- 2016 RTP/SCS Amendment No. 2, *sent 1/19/17*
- January 25<sup>th</sup> Technical Advisory Committee Meeting Cancellation Notice, *sent 1/19/17*
- RSVP: Pavement Management Software and Pavement Distress Training Notice, *sent 1/11/17*
- January 11<sup>th</sup> Technical Steering Meeting Cancellation Notice, *sent 1/9/17*
- FTIP Workshop Updates, *sent 1/3/17*
- OCTA Measure M Next 10 Delivery Plan Update, *sent 12/20/16*
- Pavement Distress Training Save the Date Announcement, *sent 12/14/16*
- FTIP Workshop Notice, *sent 12/12/16*
- December 14<sup>th</sup> Technical Steering Committee Meeting Cancellation Notice, *sent 12/9/16*
- Pavement Management Software Training Save the Date Announcement, *sent 12/6/16*
- November 9<sup>th</sup> Technical Advisory Ad Hoc Committee Meeting (Complete Streets) Reminder, *sent 11/8/16*

### **5. Committee Comments**

### **6. Local Assistance Update**

### **7. Staff Comments**

### **8. Items for Future Agendas**

### **9. Public Comments**

### **10. Adjournment**

*The next regularly scheduled meeting of this Committee is scheduled for 1:30 p.m.  
Wednesday, March 22, 2017.*



# **AGENDA**

*Technical Advisory Committee  
Item #1*

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## **Technical Advisory Committee Minutes November 9, 2016**

**Voting Representatives Present:**

<i>Rudy Emami</i>	<i>City of Anaheim</i>
<i>Tony Olmos</i>	<i>City of Brea</i>
<i>Raja Sethuraman</i>	<i>City of Costa Mesa</i>
<i>Joe Sarmiento</i>	<i>County of Orange</i>
<i>Mark Denny</i>	<i>City of Dana Point</i>
<i>Mark Lewis</i>	<i>City of Fountain Valley</i>
<i>Travis Hopkins</i>	<i>City of Huntington Beach</i>
<i>Manuel Gomez</i>	<i>City of Irvine</i>
<i>Chris Johansen</i>	<i>City of La Habra</i>
<i>Ken Rosenfield</i>	<i>City of Laguna Hills</i>
<i>Nasser Abbaszadeh</i>	<i>City of Laguna Niguel</i>
<i>Tom Wheeler</i>	<i>City of Lake Forest</i>
<i>Tom Frank</i>	<i>City of San Clemente</i>
<i>Krys Saldivar</i>	<i>City of Tustin</i>
<i>Adolfo Ozaeta</i>	<i>City of Westminster</i>
<i>Michael Wolfe</i>	<i>City of Yorba Linda</i>

**Guests Present:**

*Joe Parco, City of RSM*  
*Dan Candelaria, City of Garden Grove*  
*Tom Herbal, City of Huntington Beach*  
*Temo Galvez, City of Fountain Valley*

**Staff Present:**

*Kurt Brotcke*  
*Sam Kaur*  
*Brianna Martinez*  
*Charlie Larwood*  
*Paul Martin*  
*Brandon Bullock*  
*Joseph Alcock*  
*Adriann Cardoso*  
*Jim Sterling*  
*Harry Thomas*

**Voting Representatives Absent:**

<i>Shawn Pelletier</i>	<i>City of Aliso Viejo</i>
<i>David Jacobs</i>	<i>City of Buena Park</i>
<i>Doug Dancs</i>	<i>City of Cypress</i>
<i>Don Hoppe</i>	<i>City of Fullerton</i>
<i>William Murray</i>	<i>City of Garden Grove</i>
<i>Dave Hunt</i>	<i>City of Los Alamitos</i>
<i>Michael Belknap</i>	<i>City of La Palma</i>
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<i>Luis Estevez</i>	<i>City of Placentia</i>
<i>E. Maximous</i>	<i>City of Rancho Santa Margarita</i>
<i>Stephanie Camorlinga</i>	<i>City of Stanton</i>
<i>William Galvez</i>	<i>City of Santa Ana</i>
<i>Steve May</i>	<i>City of San Juan Capistrano</i>
<i>Michael Ho</i>	<i>City of Seal Beach</i>
<i>Akram Hindiyeh</i>	<i>City of Villa Park</i>



Meeting was called to order by Mr. Ken Rosenfield at 1:32 p.m.

## **Self-Introductions**

### **CONSENT CALENDAR ITEMS**

1. **The Minutes for the October 26, 2016 meeting were approved.**

### **DISCUSSION ITEMS**

2. **Orange County Sidewalk Inventory Results – Jim Sterling**

Mr. Sterling presented the sidewalk inventory database OCTA has developed.

Mr. Rosen inquired whether OCTA could provide the sidewalk analysis data as well as the accompanying aerial photographs.

Mr. Sterling stated that the aerial photographs are licensed and cannot be shared, however the USGS data is free and available to the public.

Mr. Lewis asked whether general curb features (such as ramps) were documented on the inventory.

Mr. Sterling stated that the data collected was only in regards to the presence sidewalks, no additional features were looked at. Mr. Sterling stated that if someone wanted to know if a certain curb feature is present on an existing sidewalk, such as a rumble strip or tactile pad, a geographic query can be made to determine that.

Ms. Saldivar asked how the inventory results would be updated.

Mr. Sterling stated that ongoing maintenance was not a part of the contract. If local agencies use the data and have information to add they are asked to share those findings with OCTA in hopes of keeping the data as current as possible.

There was no further discussion.

### **REGULAR ITEMS**

3. **2017 Technical Steering Committee Members – Sam Kaur**

Ms. Kaur presented the proposed membership roster for the 2017 Technical Steering Committee. Members of the Technical Advisory Committee approved the item unanimously with no further discussion.

4. **Correspondence**

- OCTA Board Items of Interest – See Agenda
- Announcements Sent by Email – See Agenda

5. **Committee Comments – None**

6. **Local Assistance Update - None**



**7. Staff Comments**

Ms. Kaur announced the final meeting of the Complete Streets Ad Hoc Committee would take place following the close of the TAC meeting.

Mr. Lewis thanked the Chair and Vice Chair for their service over the past year.

**8. Items for Future Agendas - None**

**9. Public Comments**

An announcement for StreetSaver® SoCal User Week was made.

**10. Adjournment at 1:57 p.m.**



# **AGENDA**

*Technical Advisory Committee*

*Item #2*

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## **Final Draft – MPAH Traffic Calming**



**February 22, 2017**

**To:** Technical Advisory Committee

**From:** Orange County Transportation Authority Staff

**Subject:** Master Plan of Arterial Highways Guidelines and Traffic Calming Policy

### **Overview**

In September 2016, Orange County Transportation Authority staff convened an Ad Hoc committee comprised of volunteer members from the Technical Advisory Committee (and/or their designees) to discuss complete streets implementation and the Master Plan of Arterial Highways. The Ad Hoc committee met three times and ultimately developed recommendations to address traffic calming provisions within the Guidance for the Administration of the Master Plan of Arterial Highways. The proposed revisions expand allowances for traffic calming measures on Master Plan of Arterial Highways facilities and clarify which types of traffic calming measures are permitted.

### **Recommendations**

- A. Approve proposed revisions to the Guidance for the Administration of the Master Plan of Arterial Highways.
- B. Direct staff to advance proposed revisions to the Guidance to the Administration of the Master Plan of Arterial Highways to the Orange County Transportation Authority's Regional Planning and Highways Committee.

### **Background**

The Guidance for Administration of the Orange County Master Plan of Arterial Highways (Guidance) was initially developed to provide local jurisdictions and the Orange County Transportation Authority (OCTA) with a common set of policies and procedures for the administration of the Master Plan of Arterial Highways (MPAH). Revisions have been made over the years to ensure that the Guidance is compliant with state and federal requirements.

In 2011, staff initiated an update to the Guidance to better reflect current planning and engineering practices. The resulting update reflected a year-long process involving the Technical Steering Committee and Technical Advisory Committee (TAC). Revisions made were generally consistent with complete streets concepts that support the needs of all road users for safe and convenient travel. To continue the facilitation of complete streets implementation, staff worked with the TAC-appointed Ad Hoc committee to develop additional potential revisions detailed below.

### ***Discussion***

Currently, the Guidance only allows traffic calming measures on Collectors and Divided Collectors (cited on page 23 of the 2012 Guidance for Administration of the MPAH). To better recognize and accommodate the potential safety and mobility benefits of traffic calming measures, changes are proposed to expand allowances for certain types of traffic calming to all MPAH facilities. Furthermore, additional changes are proposed for new language to be added to the Guidance that better defines traffic calming measures and clarifies which types of traffic calming measures are permitted and prohibited on MPAH facilities. The proposed policy revisions are detailed in Attachment A.

With the proposed revisions, speed control measures (e.g., traffic circles, chicanes, lateral shifts, etc.) would be permitted on Collector and Divided Collector arterials. The primary purpose of these measures is to manage travel speeds and are therefore, not expected to substantially impact regional capacities on lower volume MPAH facilities. Certain horizontal speed control measures would also be conditionally permitted on other MPAH facilities, based on potential operational impacts.

To maintain the regional integrity of the MPAH, volume control measures will continue to be prohibited. These measures include street closures, diverters, median barriers, and forced turn islands. Local jurisdictions maintain the option to pursue a deletion of a facility from the MPAH in order to install volume control measures on currently-designated MPAH facilities.

Staff is seeking support from TSC/TAC for these proposed changes to the Guidance.

### ***Summary***

Revisions are proposed to the Guidance to support growing interests in complete streets implementation and sustainable communities. These revisions allow for increased flexibility for the application of traffic calming measures.

They also are intended to provide clarity with regard to the types of traffic calming measures that are permitted, conditional, and prohibited on the MPAH.

***Attachment***

- A. Redlined - Proposed Revisions to the Guidance for the Administration of the Master Plan of Arterial Highways

## 2.0 GOALS AND POLICIES

The following goals and policies are intended to serve as recommended countywide guidelines and to provide direction to local agencies that opt to implement the MPAH. A goal is a general expression of countywide values and sets the long range vision for the relationship among transportation and land use. A policy is a specific statement that facilitates decision making regarding issues, process, and constraints.

### **1. Goal: Provide a Countywide Circulation (Arterial Highway) System to Accommodate Regional Travel Demand**

#### **Policies:**

- 1.1 OCTA will review the circulation plans of the cities and the County bi-annually to determine consistency with the MPAH in order to determine eligibility for Measure M2 Net Revenues as well as programs—including the CTFP.
- 1.2 OCTA will coordinate with various regional agencies (i.e., Caltrans (State), the Southern California Association of Governments (SCAG), the Transportation Corridor Agencies, etc.) on various studies relating to freeway, toll way and transportation corridor planning, construction, and improvement in order to facilitate the planning and implementation of an integrated regional circulation system.
- 1.3 OCTA will coordinate planning of the arterial highway system cooperatively with cities, the County, SCAG, neighboring counties and neighboring cities in adjacent counties to works towards the consistency of regional transportation networks.

1.4 OCTA will coordinate with local agencies to balance the needs between travel demand and the safety of all users of the road.

### **2. Goal: Provide an Arterial Highway System that Supports Land Use Policies of the County and Cities**

#### **Policies:**

- 2.1 The MPAH will encourage a coordinated arterial highway system that is in balance with the General Plan Land Use Elements of the cities and County.
- 2.2 The MPAH will encourage an arterial highway system designed to serve as part of a balanced transportation system (auto, rail, transit, bus, truck, bicycle, pedestrian, etc.).
- 2.3 OCTA will encourage local jurisdictions to consider and evaluate all mobility needs when requesting modifications to the MPAH<sup>9</sup>.
- 2.4 OCTA will encourage and assist all local jurisdictions to adopt comprehensive transportation improvements, phasing and financing plans, in order to assist in countywide implementation of the MPAH.
- 2.5 OCTA will work with the cities and County through the Orange County CTFP to

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<sup>9</sup> Policy approved OCTA Board on April 11, 2011.

## 5.0 MPAH CONSISTENCY REVIEW PROCESS

For a local agency to be eligible for participation in Measure M2 Net Revenues as well as programs—including the CTFP, the agency's General Plan circulation element must be consistent with the MPAH. MPAH consistency policies are described below, followed by a description of the procedural steps OCTA will utilize in reviewing MPAH consistency. The MPAH consistency policies are based on the "Renewed Measure M Eligibility Guidelines" Section 3.4 dated (April, 2011), and included in this *MPAH Guidance* as **Appendix 7**.

### 5.1 MPAH CONSISTENCY POLICIES

1. For an agency's Circulation Element to be consistent with the MPAH, it shall have the minimum planned carrying capacity equivalent to the MPAH for all MPAH links within the agency's jurisdiction. "Planned carrying capacity" shall be measured by the number of through lanes on each arterial highway as shown on the local Circulation Element.
2. Agencies are not considered inconsistent as a result of existing capacity limitations on arterials not yet constructed to the ultimate capacity shown on the MPAH.
3. Every two years each local agency must submit a resolution adopted by the governing body attesting that no unilateral reduction in lanes has been made on any MPAH arterial.
4. A roadway on the MPAH that has been unilaterally removed from or downgraded on the local agency's circulation element and/or does not meet the minimum capacity criteria may result in the local agency becoming ineligible to participate in Measure M2 Net Revenues as well as programs—including the CTFP. A local agency's eligibility status may be reinstated upon completion of a cooperative study to resolve the inconsistency. Additionally, the local agency can also re-establish eligibility upon restoring its Circulation Element to its previous state of MPAH consistency.
5. A local agency that unilaterally reduces the number of existing and/or planned through lanes on an MPAH arterial built to its ultimate configuration to less than the ultimate capacity shown on the MPAH shall be inconsistent with the MPAH from the date the governing body action is taken. Unilateral action shall mean physical actions such as striping, signing, or physical restrictions executed by the local agency.<sup>23</sup>
6. A temporary reduction of existing through lanes is permitted if, prior to taking this action, a local agency can demonstrate to OCTA that such action is temporary and can be justified for operational reasons and the agency enters into a binding

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<sup>23</sup> The MPAH does not specify minimum lane widths. Narrowing of travel lanes is not restricted provided the number of through lanes is maintained.

agreement to restore capacity upon demand by OCTA. OCTA may also determine that the local agency remain eligible on a conditional basis. If the local agency is found ineligible, it shall regain eligibility upon physical restoration of the arterial to its original state, consistent with the MPAH.

7. Traffic calming measures shall not be used on arterials classified as Secondary and above on the MPAH. Traffic calming measures may be allowed only on Divided Collectors and Collectors, where it can be demonstrated the calming measures will not reduce vehicle carrying capacity below the actual and projected traffic volumes for the segment and the increased traffic volume on affected MPAH facilities does not result in an intersection level of service (LOS) worse than LOS "D" or the General Plan standard adopted by the affected jurisdiction.<sup>24</sup> The use of traffic calming measures<sup>25</sup> on MPAH facilities shall be administered per the following:

a. Traffic calming achieved by the speed control measures listed below is permitted on Collectors and Divided Collectors.

- i. Vertical deflections (e.g. speed humps and raised crosswalks)
- ii. Horizontal measures (e.g. traffic circles and chicanes)

b. Traffic calming achieved by horizontal speed control measures may also be conditionally permitted on other arterials. Prior to implementation, a local agency must demonstrate to OCTA that the horizontal speed control measures will not be a detriment to traffic operations for actual and projected traffic volumes. Multimodal traffic operations, including safety analysis, shall be considered. Existing and long-range roadway segment analysis shall be considered, along with intersection level of service standards, if applicable.

c. Traffic calming achieved by the volume control measures listed below are typically implemented to discourage or eliminate through traffic and shall not be used to restrict through movements on MPAH facilities.<sup>26</sup>

- i. Full and half street closures
- ii. Diverters
- iii. Median barriers
- iv. Forced turn islands

See Appendix 8 for additional detail.

<sup>24</sup> Policy approved by OCTA Board on April 13, 1998.

<sup>25</sup> Traffic calming is defined as the combination of mainly physical measures that reduce the negative effects of motor vehicle use, alter driver behavior and improve conditions for non-motorized street users.

<sup>26</sup> The MPAH does not restrict the use of volume control measures on non-MPAH streets and driveways that connect to/from the MPAH network.

## APPENDIX 8 TRAFFIC CALMING MEASURES

Traffic calming can be achieved by speed control measures, which include those examples listed below and may be considered on MPAH facilities, subject to MPAH Consistency Policies and local agency sponsorship:

	<u>Example</u>	<u>Definition</u>
<b><u>VERTICAL DEFLECTIONS</u></b>	✓ <u>PERMITTED ON COLLECTORS &amp; DIVIDED COLLECTORS</u>	
	<u>Speed humps:</u>	<u>Rounded raised areas placed across the road. They are also referred to as road humps and undulations.</u>
	<u>Speed tables:</u>	<u>Flat-topped speed humps often constructed with brick or other textured materials on the flat section. They are also called trapezoidal humps, speed platforms, and, if marked for pedestrian crossing, raised crosswalks or raised crossings. Speed tables are typically long enough for the entire wheelbase of a passenger car to rest on top.</u>
	<u>Raised intersections:</u>	<u>Flat raised areas covering entire intersections, with ramps on all approaches and often with brick or other textured materials on the flat section. They are also called raised junctions, intersection humps, or plateaus. They usually rise to sidewalk level, or slightly below to provide a “lip” for the visually impaired.</u>
<b><u>HORIZONTAL MEASURES</u></b>	✓ <u>PERMITTED ON COLLECTORS &amp; DIVIDED COLLECTORS</u> ✓ <u>CONDITIONALLY PERMITTED ON OTHER ARTERIALS</u>	
	<u>Traffic circles<sup>29</sup>:</u>	<u>Raised islands, placed in intersections, around which traffic circulates. They are sometimes called intersection islands. They are usually circular in shape and landscaped in their center islands, though not always. They are typically controlled by YIELD signs on all approaches.</u>
	<u>Chicanes:</u>	<u>Curb extensions that alternate from one side of the street to the other, forming S-shaped curves. They are also referred to as deviations, serpentes, reversing curves, or twists. European manuals recommend shifts in alignment of at least one lane width, deflection angles of at least 45 degrees, and center islands to prevent drivers from taking a straight “racing line” through the feature.</u>
	<u>Lateral shifts:</u>	<u>Curb extensions on otherwise straight streets that cause travel lanes to bend one way and then bend back the other way to the original direction of travel. They are occasionally referred to as axial shifts, staggerings, or jogs.</u>
	<u>Realigned intersections:</u>	<u>Changes in alignment that convert T-intersections with straight approaches into curving streets that meet at right angles. A former “straight through” movement along the top of the T becomes a turning movement. Realigned intersections are sometimes called modified intersections.</u>

<sup>29</sup> Traffic circles are distinguished from roundabouts which are often used to substitute traffic signals or all-way STOP signs as a form of intersection control. Therefore, roundabouts are not subject to the MPAH Traffic Calming Policy.

Traffic calming achieved by volume control measures shall not be used to restrict through movements on MPAH facilities<sup>30</sup> and include the following:

	<b>Measure</b>	<b>Definition</b>
<b>VOLUME CONTROL MEASURES</b>	❖ <i>PROHIBITED ON MPAH FACILITIES</i>	
	<u>Full street closures:</u>	<u>Barriers placed across a street to close the street completely to through traffic, usually leaving only sidewalks or bicycle paths open. They are also called cul-de-sacs or dead ends. The barriers may consist of landscaped islands, walls, gates, side-by-side bollards, or any other obstructions that leave an opening smaller than the width of a passenger car.</u>
	<u>Half street closures:</u>	<u>Barriers that block travel in one direction for a short distance on otherwise two-way streets. They are also sometimes called partial closures or one-way closures.</u>
	<u>Diverters:</u>	<u>Barriers placed diagonally across an intersection, blocking through movement. They are also called full diverters or diagonal road closures. Like half closures, diagonal diverters are usually staggered to create circuitous routes through neighborhoods.</u>
	<u>Median barriers:</u>	<u>Raised islands located along the centerline of a street and continuing through an intersection so as to block through movement at a cross street. They are also referred to as median diverters or occasionally as island diverters.</u>
	<u>Forced turn islands:</u>	<u>Raised islands that block certain movements on approaches to an intersection. They are sometimes called forced turn channelizations, pork chops, or in their most common incarnation, right turn islands.</u>

<sup>30</sup> The MPAH does not restrict the use of volume control measures on non-MPAH roadways and driveways that connect to/from the MPAH network.



# **AGENDA**

*Technical Advisory Committee*

*Item #3*

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## **2017 CTFP Call for Projects Programming Recommendations**



**February 22, 2017**

**To:** Technical Advisory Committee

**From:** Orange County Transportation Authority Staff

**Subject:** Comprehensive Transportation Funding Programs - 2017 Call for Projects Programming Recommendations

**Overview**

The Orange County Transportation Authority issued the 2017 annual Measure M2 Regional Capacity Program and Regional Traffic Signal Synchronization Program call for projects in August 2016. This call for projects made available approximately \$40 million in grant funding for streets and roads projects countywide. A list of projects recommended for funding is presented for review and approval.

**Recommendations**

- A. Recommend for Board of Director's approval of the programming recommendations for the 2017 Regional Capacity Program to fund 13 projects, in an amount totaling \$32.24 million.
- B. Recommend for Board of Director's approval of the programming recommendations for the 2017 Regional Traffic Signal Synchronization Program to fund 5 projects, in an amount totaling \$2.5 million.

**Background**

The Regional Capacity Program (RCP), Project O, is the Measure M2 (M2) funding program through which Orange County Transportation Authority (OCTA) supports streets and roads capital projects. The Regional Traffic Signal Synchronization Program (RTSSP), Project P, is the M2 program which provides funding for multi-jurisdictional signal synchronization projects. Both programs are included in the Comprehensive Transportation Funding Programs (CTFP). The CTFP allocates funds through a competitive call based on a common set of guidelines and scoring criteria approved by the OCTA Board of Directors (Board). The CTFP may include state and federal sources as well.

On August 8, 2016, the Board authorized staff to issue a call for projects (call) making available approximately \$32 million in RCP funding and \$8 million in RTSSP funding.

***Discussion***

The 2016 CTFP Guidelines approved by the Board on August 8, 2016 established a tiered funding approach to prioritize high scoring projects while providing a balanced program with funding availability for small and large projects. The first tier is for projects scoring 50 points or higher, and the second tier is for the qualified projects after Teir1. Within Tier 1, two categories were established. Category 1, with 60 percent of the M2 funds available for smaller projects requesting \$5 million or less, and Category 2, with 40 percent of the M2 funds available for larger projects requesting \$5 million or more.

Per the tiered approach, \$32 million is first split between Category 1 and Category 2 Tier 1 projects as shown in the table below.

Total Funds Available	Tier 1 Category 1 (60%)	Tier 1 Category 2 (40%)
\$32 million	\$19.2 million	\$12.8 million

On October 21, 2016, OCTA received 16 applications requesting \$46 million in RCP funding as reflected in Attachment A. The project application submitted by the City of Newport Beach for implementation phase of Old Newport Beach and Pacific Coast Highway Project is considered incomplete due to the absence of Caltrans approval on the environmental document. The City can resubmit the application during the future call for projects upon receiving all necessary approvals per the CTFP Guidelines. City of Buena Park withdrew their application for Orangethorpe Avenue street widening project. The remaining 14 applications (11 applications for Category 1 and 3 applications for Category 2) were evaluated and ranked per the scoring criteria identified in the CTFP Guidelines.

Per the tiered funding approach, staff identified a total of \$14,219,718 for Tier 1 projects: \$5,632,818 for Tier 1 Category 1 projects and \$8,586,900 for Tier 1 Category 2 projects. The remaining balance of \$17,780,282 is made available to allocate funds for Tier 2 projects.

Staff prepared final funding recommendations in Attachment B (escalated final values) per the tiered funding approach outlined above and described in the 2017 CTFP Guidelines.

OCTA also received 5 applications requesting \$2.5 million in RTSSP funding. All applications were reviewed for eligibility, consistency, and adherence to guidelines and program objectives. Staff worked with the local agencies to address technical issues related to excess right of way, construction unit costs, and project scopes. Recommendations presented in the report are consistent with the 2017 CTFP Guidelines approved by the OCTA Board.

Staff recommends programming \$34.74 million for 18 projects under RCP and RTSSP. Brief program descriptions are provided below.

*Regional Capacity Program*

The RCP provides funds for capital improvements to congested streets, roads, intersections and interchanges. The CTFP Guidelines require a minimum starting level of service (LOS) of 0.81 for a project to be eligible for consideration, but grant provisional eligibility to projects that have a starting LOS of 0.71, dependent on availability of funding. A total of 16 project applications requesting \$46 million were received for this program (Attachment A).

Staff's recommendation is to program approximately \$32.24 million to fund 13 projects through the Arterial Capacity Enhancement and Intersection Capacity Enhancement categories, shown in Attachment B.

*Regional Traffic Signal Synchronization Program*

The RTSSP is a significant funding source for multi-agency, corridor-based signal synchronization along Orange County streets and roads. Funding is typically provided for a three-year period that includes the implementation of signal synchronization, as well as a limited amount of funding for ongoing maintenance and monitoring to keep the investments in optimal condition. The 2017 Call for Projects Guidelines allowed elements such as new cabinets, controllers, software, communications equipment, operations and maintenance activities in an effort to address ongoing timely project delivery issues and to reduce delays often related to construction items. A total of 5 project applications requesting \$2.5 million were received for this program. As noted previously, the Board authorized \$8 million in funding for the 2017 call cycle.

Staff recommends programming \$2.5 million to fund the five projects. All of the recommended RTSSP projects will be implemented in fiscal year (FY) 2017-18. The details of projects recommended for funding for the RTSSP are shown in Attachment C.

The table below provides an overall summary of the funding recommendations:

**2017 CTFP Call for Projects Summary (\$ in millions)**

	RCP	RTSSP	Total
Number of Applications Recommended for Approval	13	5	18
Amount Recommended for Approval (escalated)	\$32.24	\$2.5	\$34.74

*Next Steps*

The recommended project programming, if approved by the TSC, will be forwarded to the Technical Advisory Committee (TAC) for consideration. If approved by the TAC, the project programming will go to the Regional Planning and Highways Committee and Board in April for final approval. Once approved, the new projects will be incorporated into the master funding agreement between OCTA and all local agencies. Staff will continue to monitor project status and project delivery through the semi-annual review process.

**Summary**

Proposed programming recommendations for projects in the Regional Capacity Program and Regional Traffic Signal Synchronization Program have been developed by staff. Funding for 18 projects totaling \$34.74 million in Measure M2 funds is proposed. Staff is seeking Technical Steering Committee approval of the programming recommendations presented.

**Attachments**

- A. 2017 Measure M2 Regional Capacity Program Call for Projects – Applications Received
- B. 2017 Measure M2 Regional Capacity Program Call for Projects – Programming Recommendations
- C. 2017 Measure M2 Regional Traffic Signal Synchronization Program Call for Projects – Programming Recommendation

## 2017 Measure M2 Regional Capacity Program Call for Projects - Applications Received

Agency	Project	Fund	Phase	Score	Total	ENG	ROW	CON
Orange County	Ortega Highway Widening Improvements (PA&ED Phase)	ACE	E	69	\$ 1,950,000	\$ 1,950,000		
Santa Ana	Warner Avenue Improvements from Oak St to Grand Ave	ACE	E	61	\$ 811,125	\$ 811,125		
Santa Ana	Warner Avenue Improvements from Main St to Orange Avenue	ACE	R	58	\$ 8,586,900		\$ 8,586,900	
Irvine	University/Ridgeline Intersection Improvement	ICE	C	57	\$ 1,690,054			\$ 1,690,054
Orange County	Cow Camp Road Segment 2A & 2B Construction	ACE	C	56	\$ 14,278,770			\$ 14,278,770
Brea	SR-57 & Lambert Road Interchange Improvements Project Phase 1	FAST	C	54	\$ 12,400,000			\$ 12,400,000
Anaheim	Lincoln Avenue from East Street to Evergreen Street	ACE	R	51	\$ 1,147,669		\$ 1,147,669	
Orange	Tustin/Meats Intersection Right Turn Lane Addition	ICE	C	47	\$ 712,500			\$ 712,500
Garden Grove	Euclid Street and Westminster Avenue Intersection Improvement	ICE	R	45	\$ 784,326		\$ 784,326	
Mission Viejo	Los Alisos Boulevard and Santa Margarita Parkway ICE Project	ICE	E, C	45	\$ 203,698	\$ 14,552		\$ 189,146
Costa Mesa	Hyland Avenue at MacArthur Boulevard Intersection Improvements	ICE	R, C	44	\$ 403,449		\$ 129,972	\$ 273,477
Santa Ana	Bristol St. and Memory Ln. Intersection Improvements	ICE	R	43	\$ 1,167,244		\$ 1,167,244	
Orange	Tustin Street and Chapman Avenue Intersection Widening	ICE	C	38	\$ 375,000			\$ 375,000
Santa Ana	Warner Avenue and Flower Street Intersection Improvements	ICE	C	34	\$ 87,187			\$ 87,187
					\$ 44,597,922			

**UNFUNDED (Project withdrawn by applicant)**

Buena Park	Orangethorpe Avenue Street Widening of the South Side	ACE	C		\$ 300,000			
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**UNFUNDED (Application incomplete - environmental approval required)**

Newport Beach	Old Newport Boulevard and Pacific Coast Highway	ACE	C		\$ 1,275,000			
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## 2017 Measure M2 Regional Capacity Program Call for Projects - Programming Recommendations

**Tier 1 projects - Category 1(60%)**

Agency	Project	Fund	Phase	Score	Funding	Balance
					<i>Beginning Balance</i>	\$ 19,200,000
Orange County	Ortega Highway Widening Improvements (PA&ED Phase)	ACE	E	69	\$ 1,950,000	\$17,250,000
Santa Ana	Warner Avenue Improvements from Oak St to Grand Ave	ACE	E	61	\$ 811,125	\$16,438,875
Irvine	University/Ridgeline Intersection Improvement	ICE	C	57	\$ 1,724,024	\$14,714,851
Anaheim	Lincoln Avenue from East Street to Evergreen Street	ACE	R	51	\$ 1,147,669	\$13,567,182
					Sub-Total: \$ 5,632,818	\$13,567,182

**Tier 1 projects - Category 2(40%)**

Agency	Project	Fund	Phase	Score	Funding	Balance
					<i>Beginning Balance</i>	\$ 12,800,000
Santa Ana	Warner Avenue Improvements from Main St to Orange Avenue	ACE	R	58	\$ 8,586,900	\$ 4,213,100
					Sub-Total: \$ 8,586,900	\$ 4,213,100

**Tier 1 Total: \$ 14,219,718****Balance available for Tier 2 Projects \$17,780,282****Tier 2 Projects - No Category split**

Agency	Project	Fund	Phase	Score	Funding	Balance
					<i>Beginning Balance</i>	\$ 17,780,282
Orange County	Cow Camp Road Segment 2A & 2B Construction	ACE	C	56	\$ 14,278,770	\$3,501,512
Orange	Tustin/Meats Intersection Right Turn Lane Addition	ICE	C	47	\$ 719,625	\$2,781,887
Garden Grove	Euclid Street and Westminster Avenue Intersection Improvement	ICE	R	45	\$ 784,326	\$1,997,561
Mission Viejo	Los Alisos Boulevard and Santa Margarita Parkway ICE Project	ICE	E, C	45	\$ 205,589	\$1,791,972
Costa Mesa	Hyland Avenue at MacArthur Boulevard Intersection Improvements	ICE	R, C	44	\$ 406,184	\$1,385,788
Santa Ana	Bristol St. and Memory Ln. Intersection Improvements	ICE	R	43	\$ 1,167,244	\$218,544
Orange	Tustin Street and Chapman Avenue Intersection Widening	ICE	C	38	\$ 375,000	-\$156,456
Santa Ana	Warner Avenue and Flower Street Intersection Improvements	ICE	C	34	\$ 87,187	-\$243,643
					<b>Tier 2 Total: \$ 18,023,925</b>	

**Tier 1 & 2 Total: \$ 32,243,643****Project unfunded - Insufficient funds to fully fund the project request**

Brea	SR-57 & Lambert Road Interchange Improvements Project Phase 1	FAST	C	50	\$ 12,400,000	
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## 2017 Measure M2 Regional Traffic Signal Synchronization Program Call for Projects - Programming Recommendations

Agency	Project	Fund	Signals	Primary Implementation	Maintenance & Operations	Total Funding	Score
Irvine	Irvine Boulevard Signal Synchronization Project	TSSP	29	\$ 297,526	\$ 80,640	\$ 378,166	61
Fullerton	Gilbert Street / Idaho Street Corridor RTSSP	TSSP	19	\$ 862,560	\$ 54,720	\$ 917,280	51
San Clemente	Camino Vera Cruz	TSSP	5	\$ 182,606	\$ 10,080	\$ 192,686	37
Costa Mesa	Bear Street Signal Synchronization	TSSP	14	\$ 467,872	\$ 26,880	\$ 494,752	35
Mission Viejo	Olympiad Road - Felipe Road Corridor	TSSP	20	\$ 486,280	\$ 29,376	\$ 515,656	31
			<b>Total</b>	<b>\$ 2,296,844</b>	<b>\$ 201,696</b>	<b>\$ 2,498,540</b>	

*All submitted projects meet minimum eligibility requirements*