Presentation Overview

• Arterial Plan Background and Purpose
• Key Concepts:
  ✓ Typology
  ✓ Modal Priority
• Process Overview
• Needs Assessment
• Recommended Improvements
• Requested Action:
  ✓ Approve Typology Framework and Modal Priorities
Arterial Plan Vision Statement

“Alameda County will have a network of efficient, safe and equitably accessible arterials that facilitate the multimodal movement of people and goods, and help create a strong economy, healthy environment and vibrant communities, while maintaining local contexts.”

Process Overview

- Countywide Multimodal Arterial Plan
- Stakeholder Review
- Local Plans
- Land Use Context
Typology

Key Components:

• Auto Function
• Multimodal Networks
• Land Use

Why Typology?

• Framework provides the foundation for defining the Complete Streets network
• Reflects:
  ✓ How streets function for all users
  ✓ Relationship between streets & buildings fronting onto them
• Expands considerations:
  ✓ Balances needs of all users
  ✓ Defines a complete streets network
Future of Alameda County

- By 2040:
  - 31% growth in population
  - 40% growth in employment
  - 100% increase in proportion of seniors (age 65+)
  - 18% households with no vehicle

Arterial Plan Overview
Process Overview – Outreach

- 50+ meetings held
- Met with agency and non-agency stakeholders, including:
  - All 14 cities and Alameda County
  - Caltrans and MTC
  - Transit agencies and TMA service providers
  - PlanTAC, ACTAC and Alameda CTC Commissioners
  - Bike East Bay, Alameda County Safe Routes to Schools, United Seniors of Oakland and Alameda County, Alameda CTC’s PAPCO, trucking industry and emergency responders
  - General public (via public workshops)
- 700+ comments received on the typology/modal priority framework

Typology Development

- Following mapping overlays were developed:
  - Land use
  - Auto function
  - Modal emphasis overlays
- Overlays applied to Study Network
  - Study Network represents major arterials and collectors across the county (about 1,200 miles of roadway)
- Overlays provide basis for identifying Arterials of Countywide Significance (Arterial Network)
Land Use

- Land use context informs appropriate key street elements that support or facilitate serving the land use
  - Example: Pedestrian priority street in PDA should have a wider sidewalk than a residential street

**ABAG PDA Place Types**
- Regional Center
- City Center
- Suburban Center
- Transit Town Center
- Urban Neighborhood
- Transit Neighborhood

**Alameda CTP SCS Land Use**
- Mixed Use
- Commercial
- Business Park/Industrial
- Industrial
- Education/Public/Semi-Public
- Residential
- Rural Residential & Open Space
- Parks/Open Space
- Agriculture/Resource Extraction
- Other/Unknown
Auto Function

This step classifies arterials based on auto mobility function using traffic volumes and trip length criteria to identify roads in each auto function category:

- Throughway
- County Connector
- Community Connector
- Neighborhood Connector
Modal Emphasis Maps

- Mapping overlays developed for:
  - Transit network
  - Bicycle network
  - Pedestrian network
  - Goods movement network

- Provide basis for developing Complete Streets network

- Inform street element improvement recommendations by mode

Multimodal Network

<table>
<thead>
<tr>
<th>Transit</th>
<th>Bicycles</th>
<th>Pedestrians</th>
<th>Goods Movement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level &amp; Reliability of Transit</td>
<td>Comfort Level for People Cycling</td>
<td>Pedestrian Activity Level</td>
<td>Needs &amp; Volume of Trucks</td>
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<tr>
<td>Major Corridors</td>
<td>Class I bicycle &amp; multiuse paths</td>
<td>High Pedestrian Emphasis</td>
<td>Tier 1 Freeways/Expressways</td>
</tr>
<tr>
<td>BRT and Similar Corridors</td>
<td>Class IV cycle tracks &amp; similar facilities</td>
<td>More intensity &amp; mix use; high transit choice &amp; service level; low auto ownership</td>
<td></td>
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<tr>
<td>Cross Town Routes</td>
<td>Class II enhanced buffered bicycle lanes</td>
<td>Medium Pedestrian Emphasis</td>
<td>Tier 2 intra-county and inter-county connectivity</td>
</tr>
<tr>
<td>High Capacity Service</td>
<td>Class II bicycle lanes</td>
<td>Low Pedestrian Emphasis</td>
<td>Tier 3 designated routes for local pickup and delivery</td>
</tr>
<tr>
<td>Local Routes</td>
<td>Class III enhanced bike boulevards &amp; similar enhanced bike routes</td>
<td>Less intensity &amp; single use; local or no transit; high auto ownership</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Class III bike routes</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**Modal Priority**

- Method for balancing modes
- Informs needs assessment and recommended improvements

![Diagram showing Land Use Context Type, Auto Function, Multimodal Function, and Initial Modal Priorities]

**Balancing Modes**

<table>
<thead>
<tr>
<th>Urban Land Use Context Types</th>
<th>Suburban Land Use Context Types</th>
<th>Industrial Land Use Context Types</th>
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</thead>
<tbody>
<tr>
<td>Associated Modal Emphasis</td>
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<td>Associated Modal Emphasis</td>
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<tr>
<td>Transit</td>
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</tr>
<tr>
<td>Pedestrian</td>
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<tr>
<td>Bicycle</td>
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<td>Bicycle</td>
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<tr>
<td>Auto</td>
<td>Auto</td>
<td>Auto</td>
</tr>
<tr>
<td>Goods Movement/Truck</td>
<td>Goods Movement/Truck</td>
<td>Goods Movement/Truck</td>
</tr>
</tbody>
</table>

*Note: Jurisdictions have final say on Modal Priorities.*
Modal Priorities

Improvements Driven by Needs

Source: CD+A, prepared for VTA
Improvements Driven by Needs

Typology – East County Example

Other Mapping Overlays:
- Medium Pedestrian Emphasis

First St between E. Stanley Blvd and Railroad Ave (Livermore)
**Modal Priority – East County Example**

First St between E. Stanley Blvd and Railroad Ave (Livermore)

**Typology – South County Example**

Mission Blvd between Fremont City Limit and I-680 (Fremont)

Other Mapping Overlays:
- Tier 2 Goods Movement Route
- Class II Bike Lanes
- Local Transit Route
Modal Priority – South County Example

Mission Blvd between Fremont City Limit and I-680 (Fremont)

Typology – Central County Example

Doolittle Dr between Oakland City Limit and Farallon Dr (San Leandro)
**Modal Priority – Central County Example**

Doolittle Dr between Oakland City Limit and Farallon Dr (San Leandro)

**Typology – North County Example**

Shattuck Ave between University Ave and Derby St (Berkeley)

**Other Mapping Overlays:**
- Major Transit Corridor
- High Pedestrian Emphasis
- Tier 3 Goods Movement Route
- Parallel Bike Facility

**Legend**
- Major Arterial
- Local Arterial
- Minor Arterial
- Freeway
- Local Street
- Major Transit
- Other
- Emergency
- School
- Residential
- Bike Path
- Other
Modal Priority – North County Example

Shattuck Ave between University Ave and Derby St (Berkeley)

Needs Assessment

- Modal priorities inform Study Network needs assessment for each mode
- Existing and future year (2020 and 2040) transportation conditions for each mode assessed by applying approved performance measures
- Study Network needs for each mode are identified by applying thresholds to performance measure results
Preferred Improvements

• Recommended improvements will be identified to adequately address network needs for each mode

• Consultant team will meet with stakeholder agencies individually to develop set of preferred improvements

Next Steps

• Needs Assessment – November 2015
• Recommended Improvements – December 2015
• Individual Meetings with Jurisdictions – January 2016
• Preferred Improvements – February 2016

• Requested Actions:
  ✓ Approve Typology Framework and Modal Priorities
Questions?