

#### RECOMMENDATION

- Amend the Life-of-Project (LOP) Budget by \$299.9 million for the Crenshaw/LAX
  Transit Project (Project) from \$2,148 million to \$2,447.9 million, consistent with
  the provisions of the Board-adopted Measure R and Measure M Unified Cost
  Management Policy (Attachment A); and
- Amend the Fiscal Year 2024 budget by \$299.9 million from \$25.2 million to \$325.1 million for the Crenshaw/LAX Transit Project.

## **LOP HISTORY**

- Award of Contract with an LOP Budget of \$2,058 million on June 27, 2013.
- LOP Increase in May 2020 of \$90 million to a new LOP total of \$2,148 million.

### LESSONS LEARNED

- Metro is at risk for resulting delays and disruption when there is a lengthy dispute between the parties as there was with FRC.
- The delay and disruption impact costs can dwarf the direct costs of the changed work itself.
- Metro and COLA must re-engage to partner together to minimize delays and additional costs during the design and construction of Metro projects.
- Metro and COLA are establishing a new Master Cooperative Agreement.
- Metro's internal departments need to coordinate activities early and throughout construction to ensure that desired changes are addressed at the earliest stages of planning and design.
- Change orders must be issued in a timely manner in order to minimize delay, disruption, and resulting costs.

### FTA 2020 PREDICTED vs. ACTUAL ANALYSIS

- 1. The FTA 2020 Predicted versus Actual (PvA) study considered 29 transit projects (24 New Starts, three Small Starts, and two Very Small Starts) that opened to revenue service between 2007 and 2015.
- 2. The 29 project Modes are broken down as follows:

Fixed-guideway	FTA 2020
Mode	PvA
Heavy Rail	1
Light Rail	17
Commuter Rail	5
Streetcar	1
Bus Rapid Transit	5
All	29

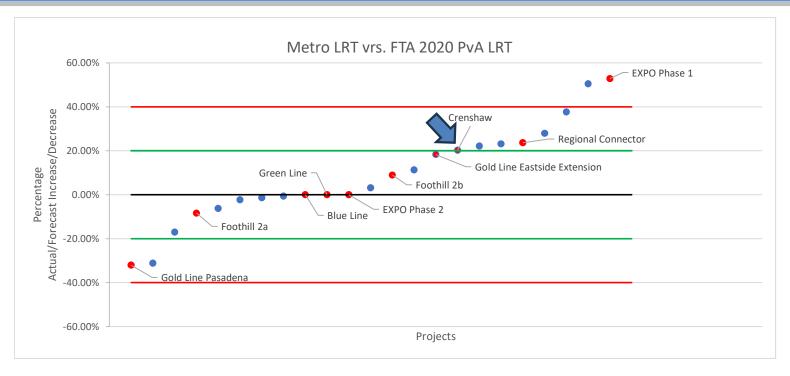


PREDICTED VERSUS ACTUAL IMPACTS OF CAPITAL INVESTMENT GRANTS PROJECTS - 2020

CAPITAL COST AND RIDERSHIP

3. PMO have compared Metro's previous and current LRT and HRT projects against the FTA 2020 PvA.

# METRO LRT vs. FTA 2020 PREDICTED vs. ACTUAL LRT



	Ave Project Cost Increase	
Mode	FTA 2020 PvA	Metro
LRT	17.18%	8.35%