

APPENDIX

Conceptual Unit Cost Estimates for Bikeway Construction
Example from Calveras County, California

Facility Type	Estimated Cost Per	
	Mile	Km.
Class III Bike Route		
• Signing Only	\$1,000	\$600
• Signing plus minor road improvement	\$37,000	\$23,000
• Signing plus moderate roadway improvement	\$149,000	\$93,000
• Signing plus major roadway improvement	\$296,000	\$184,000
Class II Bike Lane		
• Signing and striping only	\$5,000	\$3,000
• Signing and striping plus minor roadway improvement	\$41,000	\$26,000
• Signing and striping plus moderate roadway improvement	\$153,000	\$95,000
• Signing and striping plus major roadway improvement	\$300,000	\$187,000
Class I Bike Path		
• Construct asphalt path on graded right of way with drainage and new sub-base.	\$500,000	\$310,000

Source: *Calveras County Bikeway Plan Update, Fehr & Peers Associates, Inc., 1998.*

Examples of minor improvements might include curb and gutter improvements, grate replacement and treatment of crosswalks and railroad crossings.

Examples of moderate roadway improvements might include all of the above in addition to some widening and shoulder treatment, grading, and paving.

Examples of major roadway improvement might include all of the above in addition to major road widening, right of way acquisition and general construction costs for roadway improvement.

Florida Department of Transportation
Sample Unit Costs for Bicycle and Pedestrian Facilities
1996-1997

Bicycle Facilities

	Unit Cost
Bicycle (Standard)	\$150.00
Bicycle (Handicapped)	\$1,500.00
Bike Path Per Mile (10'Width) R&R Conversion	\$128,000.00
Bike Lane Per Mile (4' Width - 2 Sides) Pavement Extension	\$189,000.00
Wide Curb Lane Per Mile (Add 2 Sides) Pavement Extension	\$102,000.00
Paved Shoulders Per Mile (4' Width - 2 Sides) Rural	\$102,000.00
Bike Lockers (for 2 Bicycles)	\$1,000.00

Pedestrian Facilities

	Unit Cost
Sidewalks Per Mile (4 Inch Depth)	
4' Width - 2 Sides	\$36,000.00
5' Width - 2 Sides	\$46,000.00
6' Width - 2 Sides	\$54,000.00
Pedestrian Overpass with Handicap Ramps (Per Square Foot)	\$300.00
Pedestrian Bridge (Flat - Per Square Foot)	\$35.00
Brickwork (Per Square Yard)	\$45.00
“Walk/Don’t Walk” Signal System	
Signalhead (Each)	\$350.00
Activator (Each)	\$70.00
Two Corners (Four of Each Unit Above)	\$1,800.00
Four Corners (Eight of Each Unit Above)	\$3,700.00
Raised Island/Refuge Island (Porkchop)	
Type “D” Curb (Per Linear Foot)	\$7.50
4 Inch Sidewalk fill (Per Square Yard)	\$15.00
Handicap Curb Ramp (Concurrent with Construction)	\$0.00

Source: Bicycle/Pedestrian Program - Florida Department of Transportation, 1996.
The figures are unchanged from the previous year.

Bibliography

Guide for the Development of Bicycle Facilities, American Association of State Highway and Transportation Officials, August 1991.

Calveras County Bikeway Plan Update, Fehr & Peers Associates, Inc., March 1998.

Guidelines for Livable Streets, Fehr & Peers Associates, Inc., January 1998.

Pinsof, Musser, *Bicycle Facility Planning*, Report Number 459, American Planning Association, 1998.

Implementing Bicycle Improvements at the Local Level, Publication No. FHWA-RD-98-105, U.S. Department of Transportation, Federal Highway Administration, September 1998.

Manual on Uniform Traffic Control Devices, U.S. Department of Transportation, Federal Highway Administration, 1988.

1990 Census of the Population, United States Bureau of the Census, 1990.

1998 Annual Report of Socio-Economic Characteristics, Cache Countywide Planning and Development, 1998

Public Comment

Public input was gathered at two open houses in November, 1998 and April, 1999. Additionally, the Draft Plan was offered for public comment in May, 1999. Because of the high interest in the project and the quantity of comments received, it is not possible to include each original comment in this Appendix. Instead, a description of the comment periods is offered below. A full set of original comments for each comment period can be obtained from Tom Fisher at CMPO.

November Open House

In November, the public was asked to rank several issues on a scale of 1-5, 5 being most important, 1 being least important. Developing new bike routes, creating walkable communities, and implementing bicycle education programs were most important to those responding.

April Open House

Comments from the April open house were in response to highlights of the Draft Plan. A combination of public comment and comments from the steering committee identified issues with the structure of the plan, and suggested the need for a more complete section on marketing and education. These comments were addressed and incorporated into the second Draft Plan.

Draft Plan Comments

Most comments on the Draft Plan were received by CMPO, Steering Committee, and Executive Council Staff. As many of the comments received from the April comment period were already addressed, these comments focused on small changes that would refine the plan and prepare it for its final draft.