

CITY OF OAKLAND



DALZIEL BUILDING . 250 FRANK H. OGAWA PLAZA . SUITE 4344 . OAKLAND . CALIFORNIA . 94612
Public Works Agency TEL: (510) 238-3466
Transportation Planning & Funding Division FAX: (510) 238-7415

Bicycle and Pedestrian Advisory Committee, Monthly Meeting

Thursday, March 21, 2013; 5:30-7:30 pm

Oakland City Hall, Sgt Daniel Sakai Hearing Room (aka Hearing Room 4), Second Floor

AGENDA

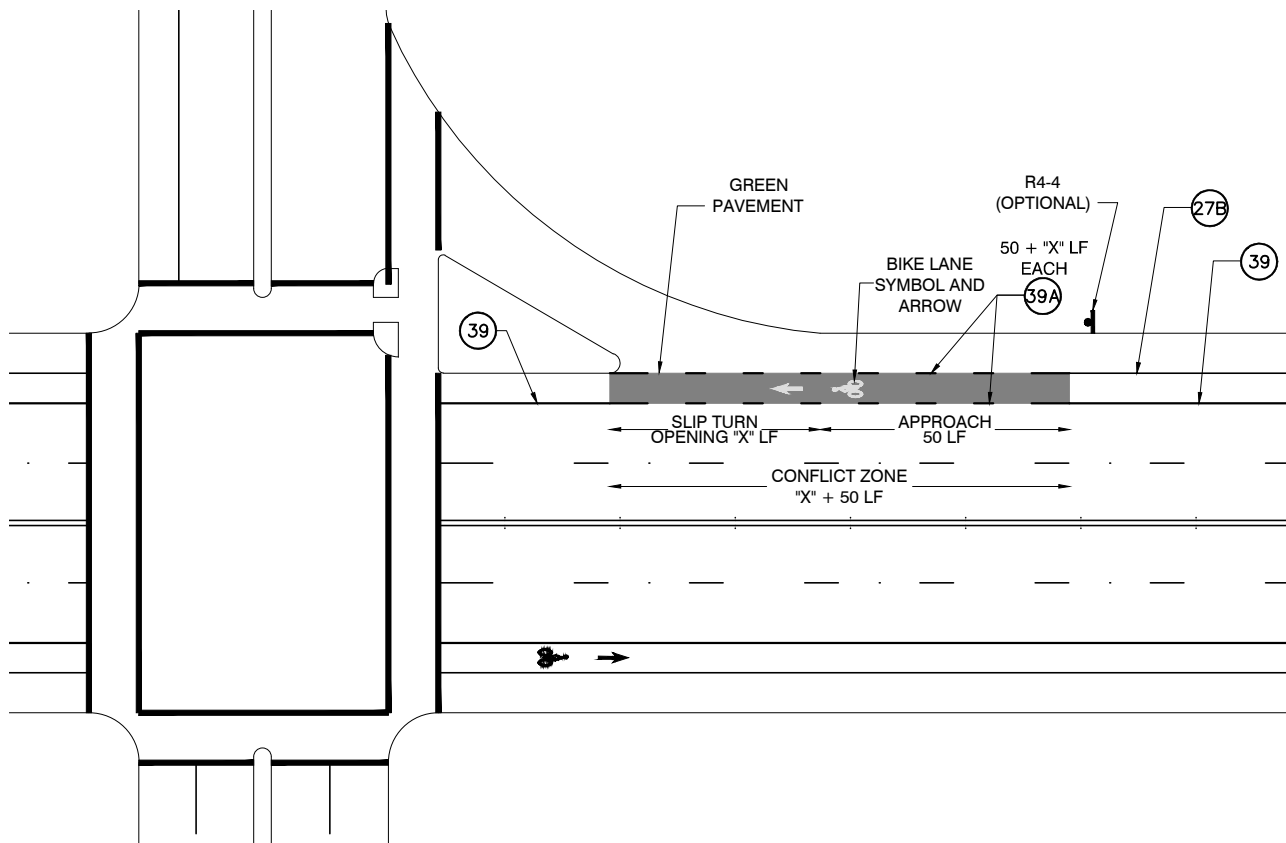
Time	Item #	Topic	Topic Type
5:30	1	Introductions, appointment of note taker (5 minutes)	Ad
5:35	2	Approval of meeting minutes (5 minutes)—Seek motion to adopt the February meeting minutes.	A
5:40	3	Broadway, Keith-Brookside Aves, Ped/Bike Improvements (50 minutes)—Staff from the Transportation Services Division will share the conceptual plan for traffic calming and ped/bike improvements on Broadway, Keith-Brookside Aves, and take comments from the committee. This is one of several projects funded by the settlement from Caltrans' Caldecott Fourth Bore project .	A
6:35	4	Draft design/policy for green pavement in bike lane conflict zones Attachment (40 minutes)—Staff will share draft guidelines and project documents developed for the installation of green pavement in bike lane conflict zones. The documents include materials specifications, draft designs, and a cost estimate for six intersections. Staff will take comments from the committee.	A
7:15	5	BPAC Chair and Vice-Chair election (5 minutes)—The BPAC will select the Chair and Vice-Chair for the upcoming year. The nominee for Chair is Chris Hwang (current Chair) and the nominee for Vice-Chair is Christopher Kidd. Per the by-laws, eligible voters are: Ann Killebrew, Brian Toy, Carol Levine, Chris Hwang, Chris Kidd, Daniel Schulman, Dave Campbell, Ina Gerhard, Midori Tabata, Rebecca Saltzman, Robert Prinz, Ryan Chan, and Tom Williging.	A
7:20	6	Announcements, suggestions for next meeting topics (10 minutes)	Ad

*** Topic Types:**

I=informational; A=action item; Ad=administrative

Agenda online at www2.oaklandnet.com/n/OAK039258

SLIP TURN - UPSTREAM (TYPE 1)



MUTCD R4-4 Sign

Policy:

Green bike lanes may be used to alert bicyclists and motorists of a conflict zone where a continuous bike lane crosses a slip turn, a turn pocket opening, or an oblique intersection.

Striping:

The green bike lane should be installed for the length of the conflict zone. The treatment includes two bike lane skip stripes (Detail 39A), green color for the width of the bike lane, and a bike lane symbol/arrow.

The conflict zone starts 50 feet in advance of where the curb line diverges from the roadway's centerline. The conflict zone ends at the beginning of the median island that separates the through lanes from the slip turn. The bike lane symbol/arrow is centered in the conflict zone.

Signage:

The R4-4 sign (Begin Right Turn Lane Yield to Bikes) may be used in conjunction with the green bike lane.

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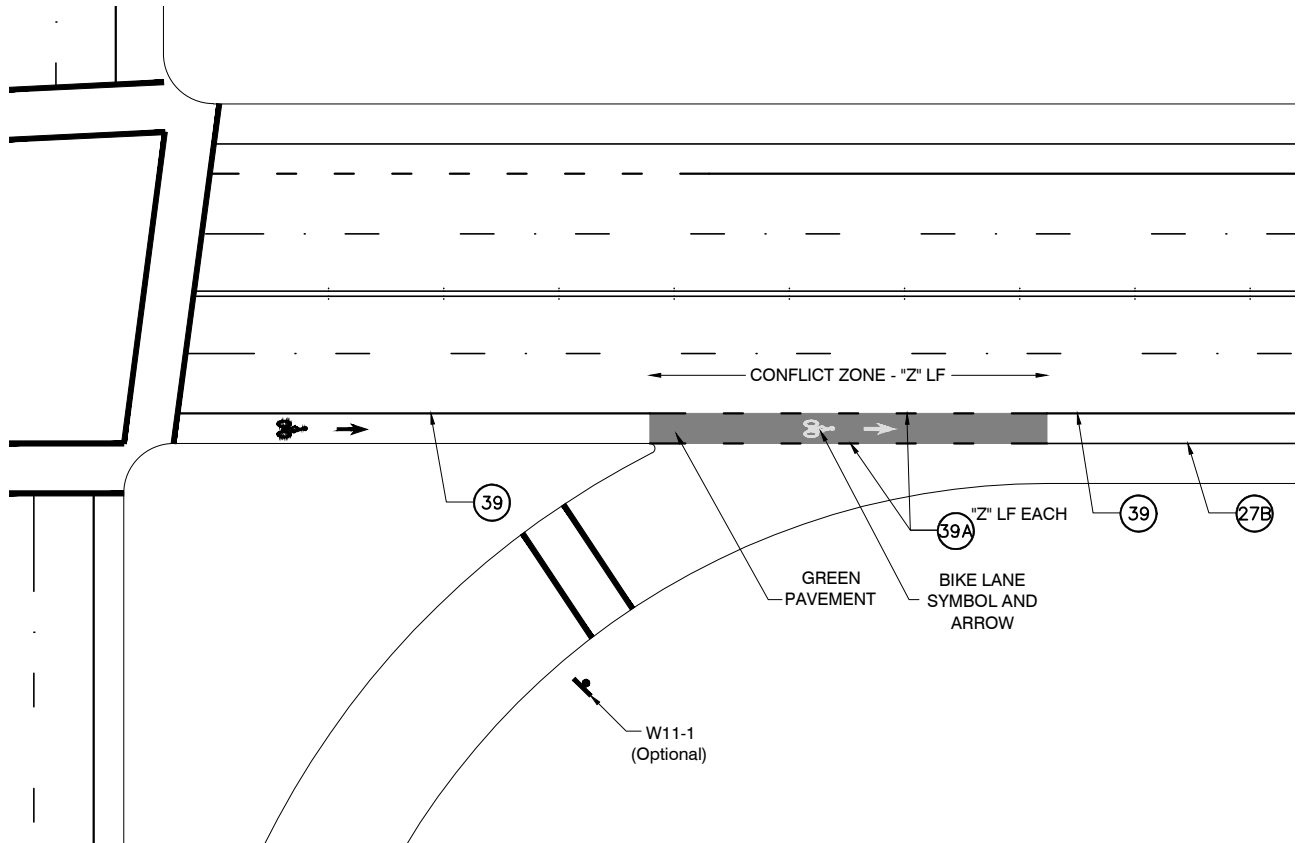


DRAFT GREEN BIKE LANES

DATE: January 2013
REV. DATE: _____

DWG.
G-1

SLIP TURN - DOWNSTREAM (TYPE 2)



MUTCD W11-1 Sign

Policy:

Green bike lanes may be used to alert bicyclists and motorists of a conflict zone where a continuous bike lane crosses a slip turn, a turn pocket opening, or an oblique intersection.

Striping:

The green bike lane should be installed for the length of the conflict zone. The treatment includes two bike lane skip stripes (Detail 39A), green color for the width of the bike lane, and a bike lane symbol/arrow.

The conflict zone starts at the end of the median island that separates the through lanes from the slip turn. The conflict zone ends where the curb line becomes parallel to the roadway centerline. The bike lane symbol/arrow is centered in the conflict zone.

Signage:

The W11-1 sign (Bicycle Traffic) may be used in conjunction with the green bike lane.

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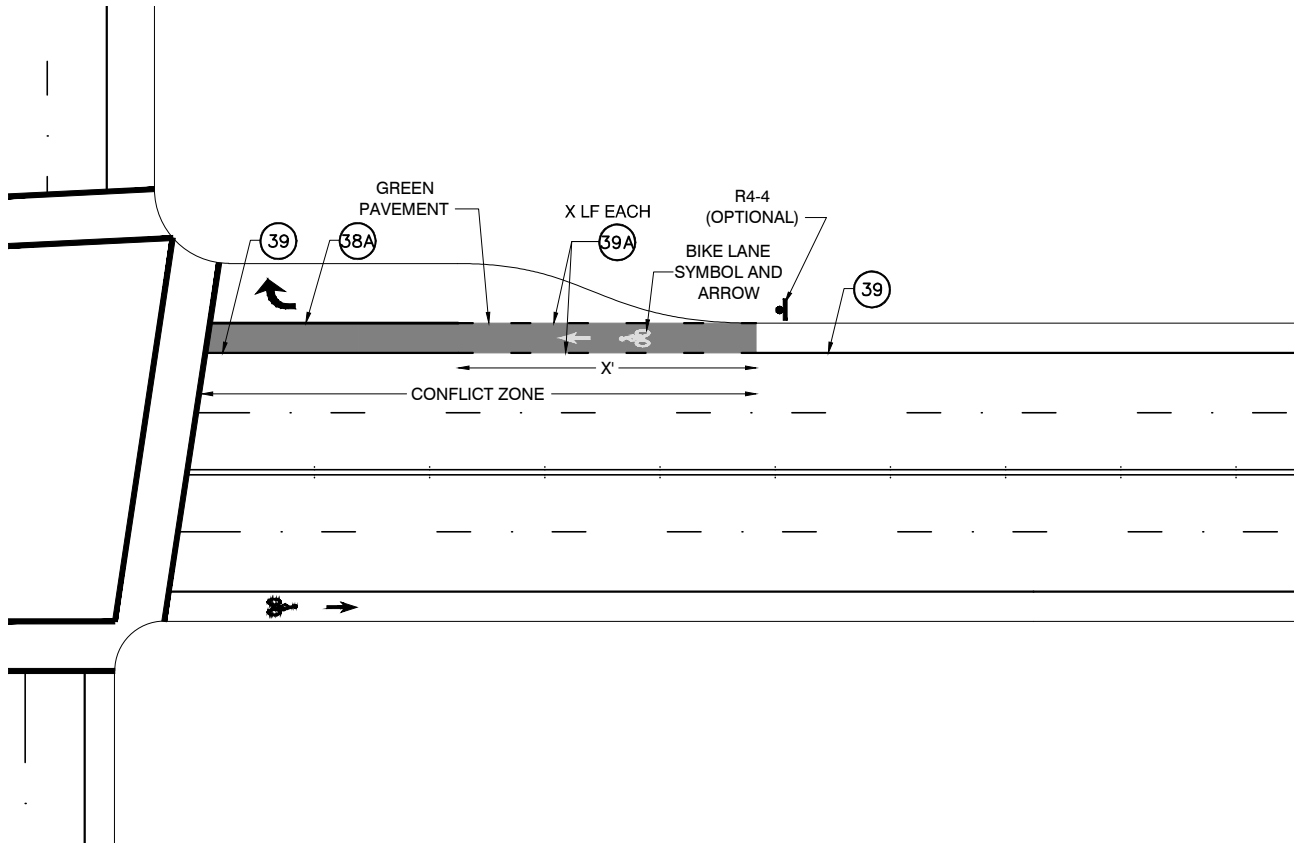


DRAFT GREEN BIKE LANES

DATE: January 2013
REV. DATE: _____

DWG.
G-2

TURN POCKET (TYPE 3)



Policy:

Green bike lanes may be used to alert bicyclists and motorists of a conflict zone where a continuous bike lane crosses a slip turn, a turn pocket opening, or an oblique intersection.

Striping:

The green bike lane should be installed for the length of the conflict zone. The treatment includes two bike lane skip stripes (Detail 39A), green color for the width of the bike lane, and a bike lane symbol/arrow.

Along the turn pocket, the green bike lane is bounded by a bike lane line (Detail 39) and a channelizing line (Detail 38A). The conflict zone starts at the beginning of the turn pocket taper. The conflict zone ends at the crosswalk or limit line. The bike lane symbol/arrow is centered in the turn pocket opening.

Signage:

The R4-4 sign (Begin Right Turn Lane Yield to Bikes) may be used in conjunction with the green bike lane.



MUTCD R4-4 Sign

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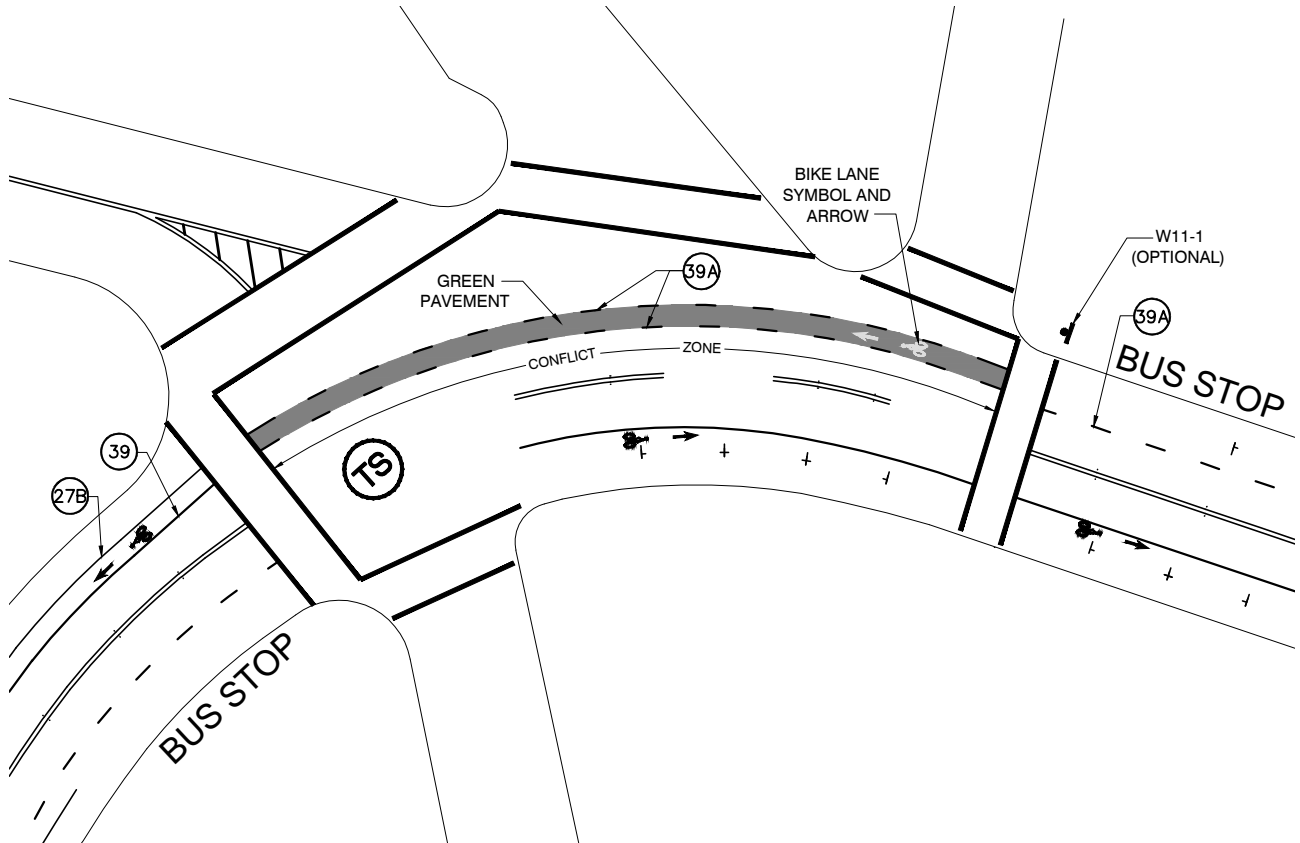


DRAFT GREEN BIKE LANES

DATE: January 2013
REV. DATE: _____

DWG.
G-3

OBLIQUE INTERSECTION (TYPE 4)



Policy:

Green bike lanes may be used to alert bicyclists and motorists of a conflict zone where a continuous bike lane crosses a slip turn, a turn pocket opening, or an oblique intersection.

Striping:

The green bike lane should be installed for the length of the conflict zone. The treatment includes two bike lane skip stripes (Detail 39A), green color for the width of the bike lane, and a bike lane symbol/arrow.

The conflict zone connects the upstream bike lane through the intersection to the downstream bike lane. The bike lane symbol/arrow is located 20 feet past the crosswalk or limit line on the upstream side of the intersection.

Signage:

The W11-1 sign (Bicycle Traffic) may be used in conjunction with the green bike lane.



MUTCD W11-1 Sign

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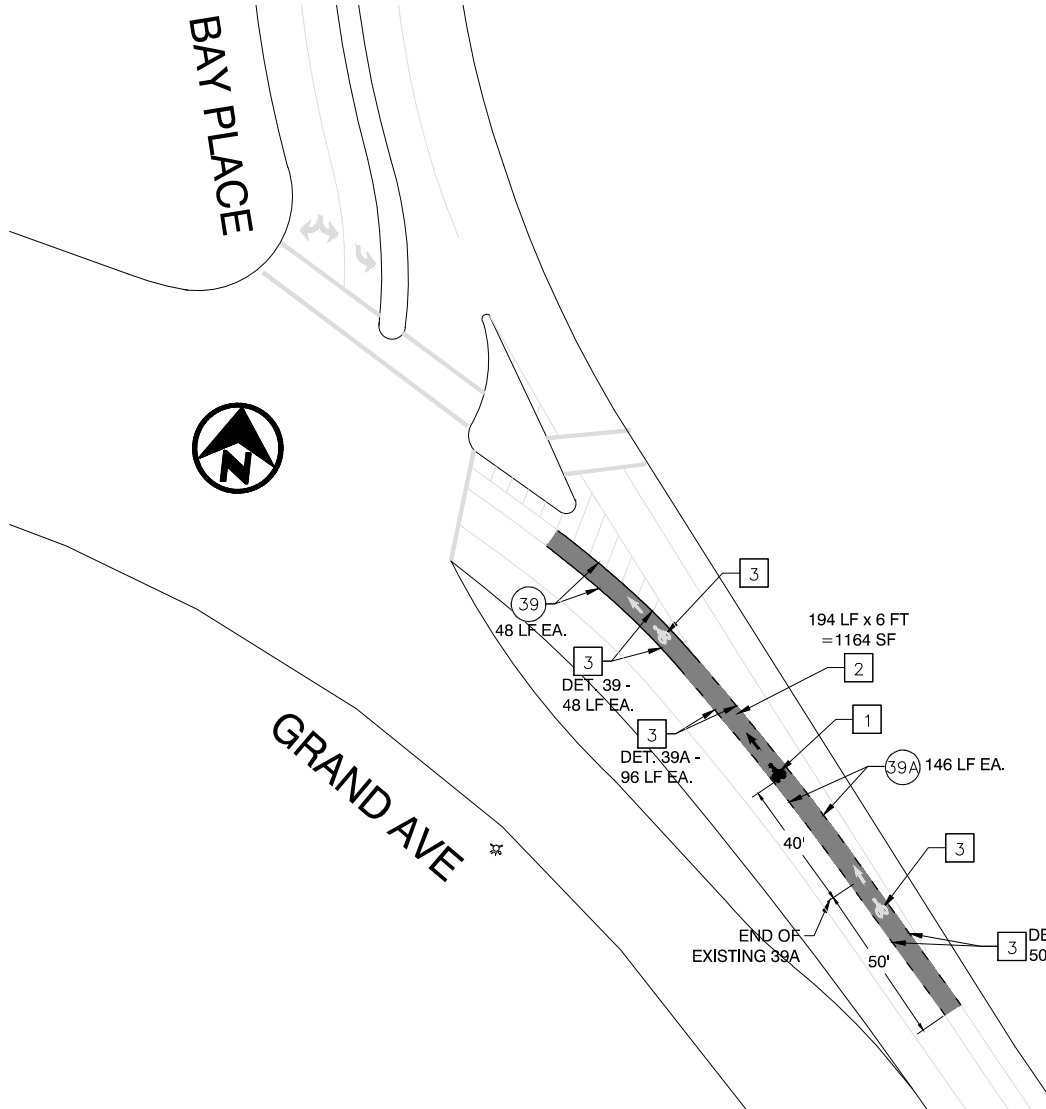
DEPARTMENT OF ENGINEERING AND CONSTRUCTION



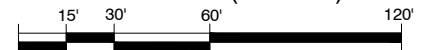
DRAFT GREEN BIKE LANES

DATE: January 2013
REV. DATE: _____

DWG.
G-4



GRAPHIC SCALE (IN FEET)



LEGEND

- # STRIPING CONSTRUCTION NOTE NUMBER
- # DETAIL NUMBER PER CALTRANS STD PLANS
Traffic lines as cardinal number
Arrows as roman numeral
- (TS) TRAFFIC SIGNAL
- (W) CROSSWALK/LIMIT LINE (SOLID ONE FOOT WHITE LINE)
- (Y) CROSSWALK/LIMIT LINE (SOLID ONE FOOT YELLOW LINE)

- FIRE HYDRANT
- BLUE FIRE HYDRANT MARKER
- ETR EXISTING TO REMAIN
- LF LINEAR FEET
- SF SQUARE FEET
- CR CURB RETURN
- FC FACE OF CURB

CONSTRUCTION NOTES

- 1 BIKE LANE SYMBOL & ARROW
Install pre-formed thermoplastic bike lane symbol and bike lane arrow markings on a green backing.
- 2 GREEN BIKE LANE
Install green thermoplastic backing in between the two Detail 39A stripes defining the bike lane.
- 3 REMOVAL
Remove conflicting striping/markings.



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**Grand Avenue &
Bay Place**

PROJECT NO.
TBD

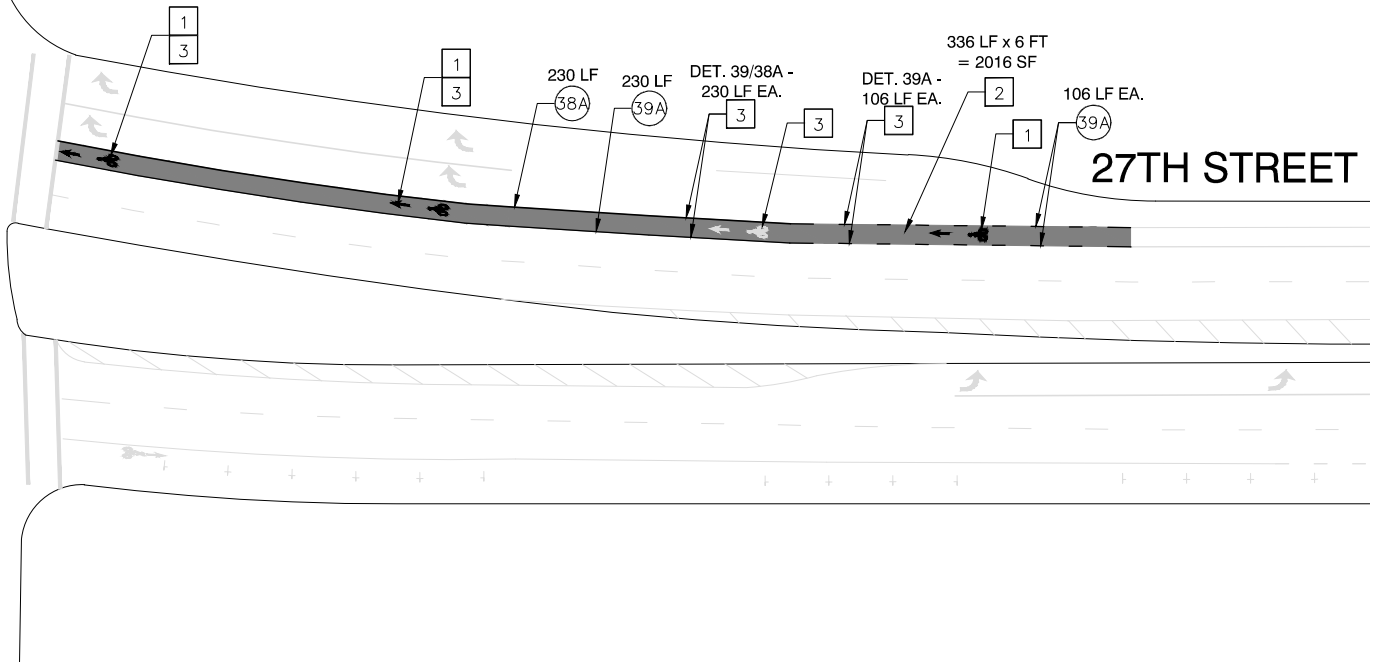
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SHEET NO.

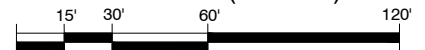
DATE: January 2013

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NORTHGATE AVE



GRAPHIC SCALE (IN FEET)



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**27th Street &
Northgate Avenue**

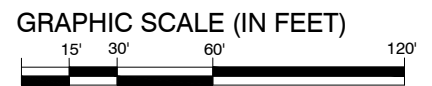
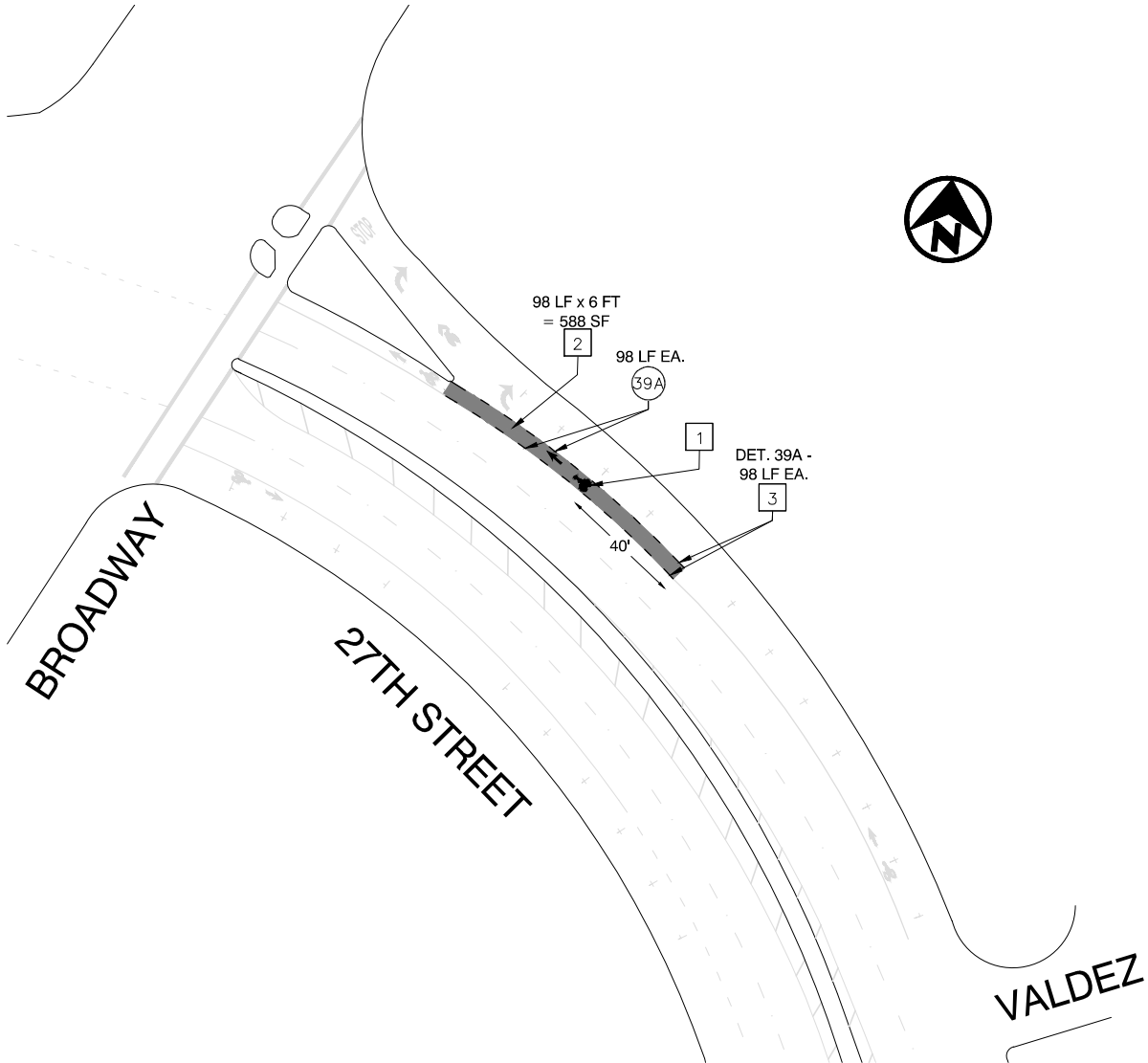
PROJECT NO.
TBD

SCALE: 1" = 60'

SHEET NO.

DATE: JANUARY 2013

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LEGEND

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**27th Street &
Broadway**

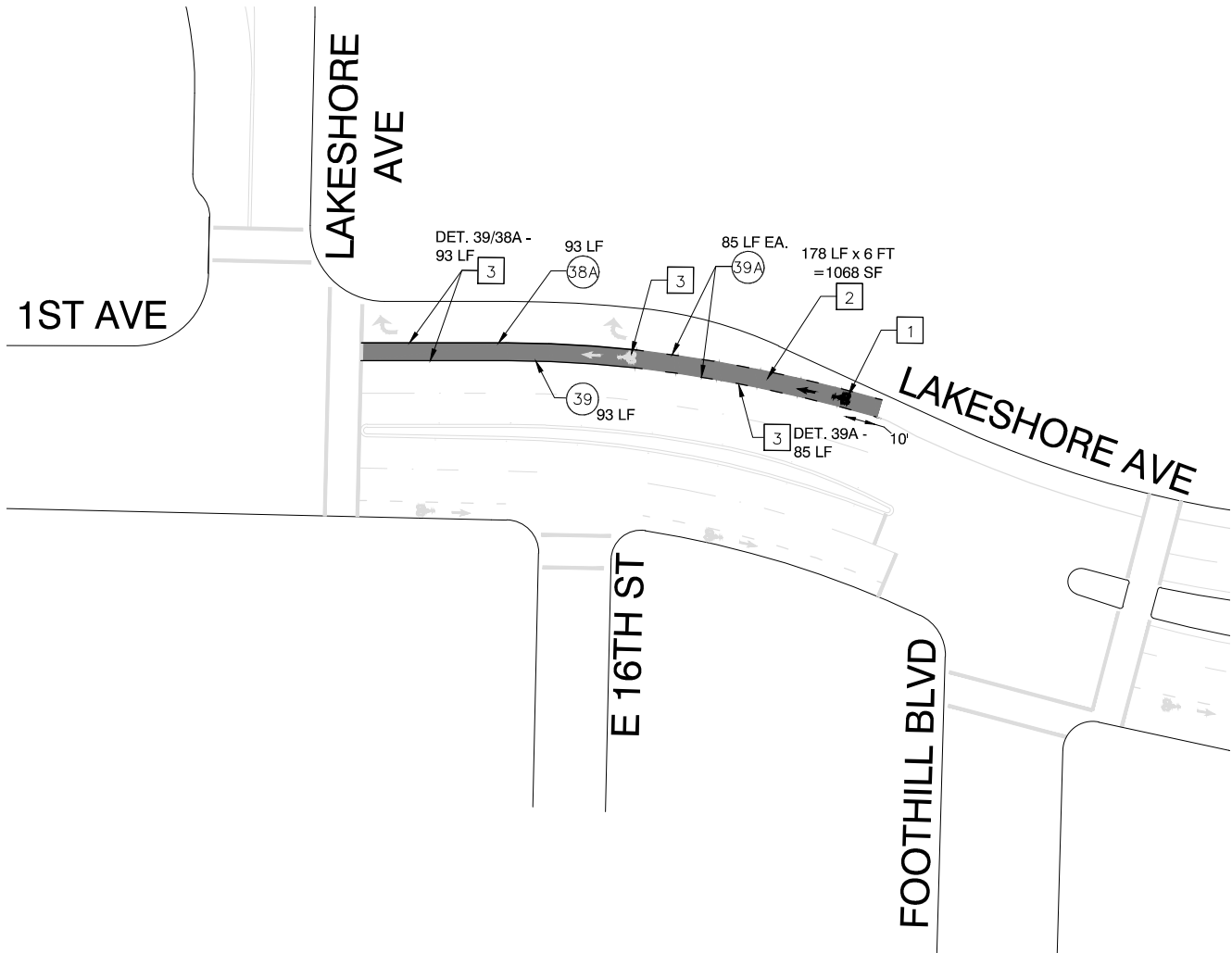
PROJECT NO.
TBD

SCALE: 1" = 60'

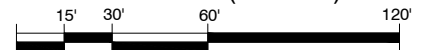
SHEET NO.

DATE: December 2012

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GRAPHIC SCALE (IN FEET)



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**Lakeshore Avenue &
1st Avenue**

PROJECT NO.
TBD

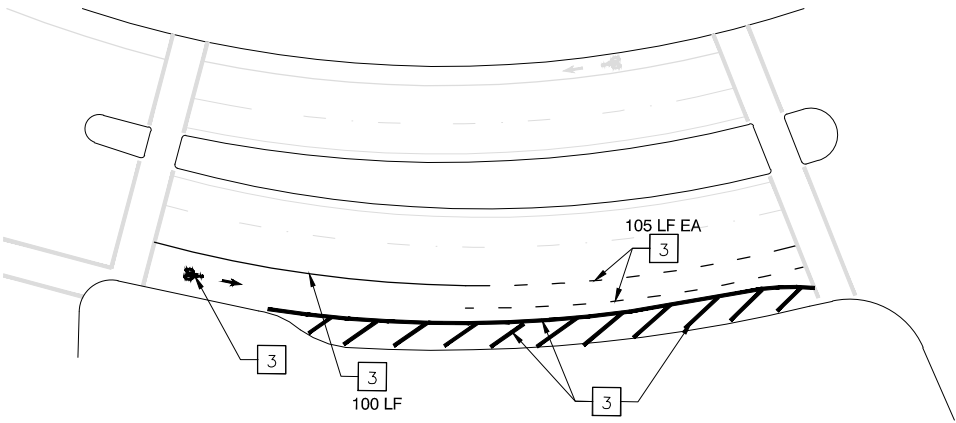
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SHEET NO.

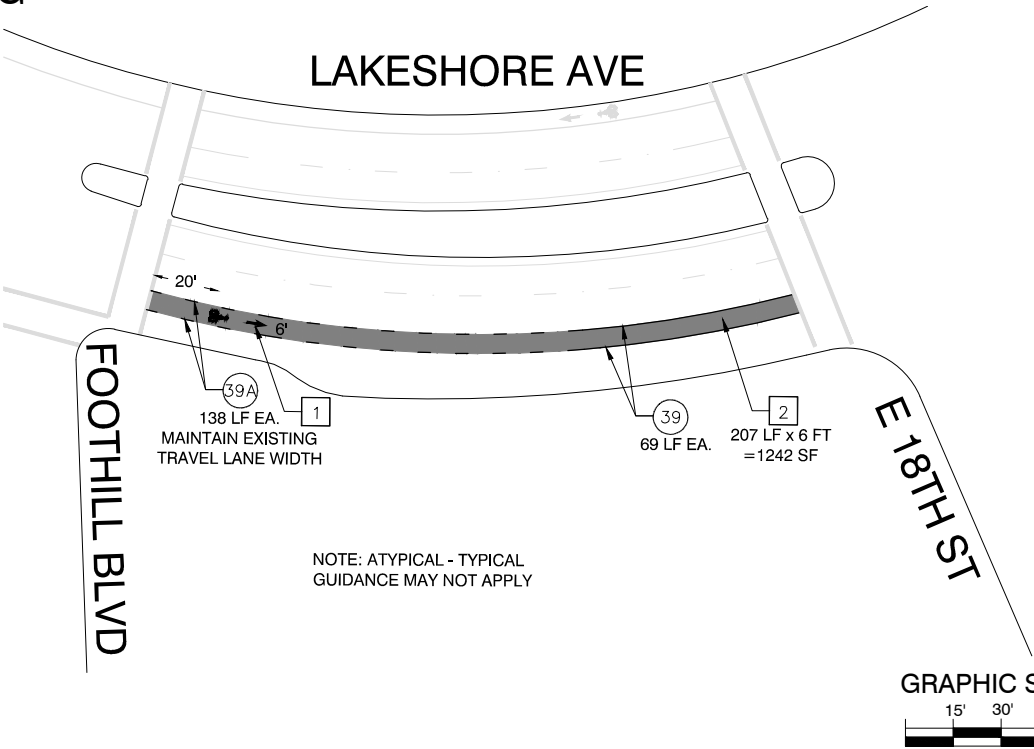
DATE: December 2012

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REMOVAL



STRIPING



LEGEND

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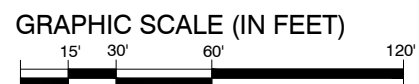
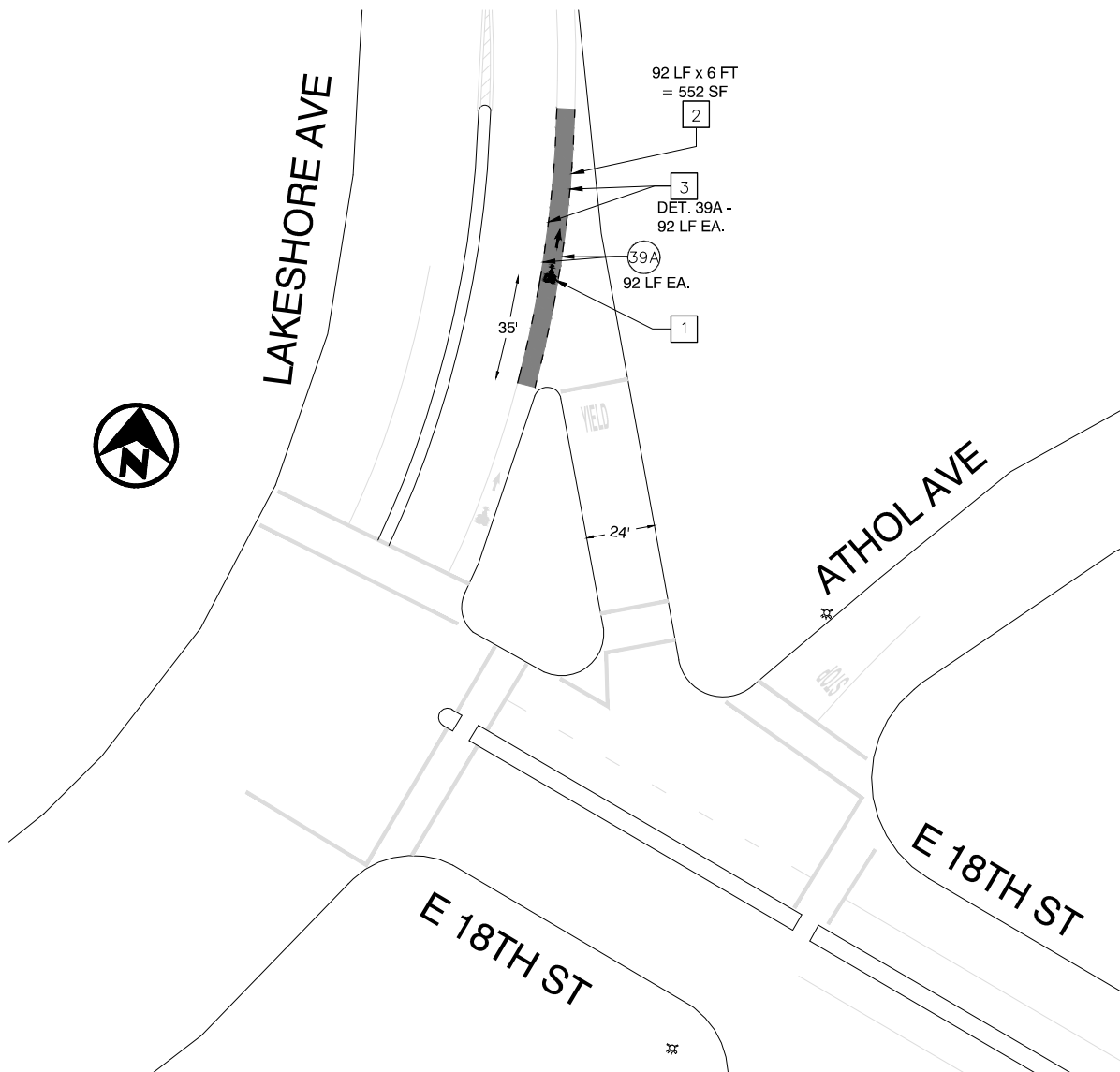
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Lakeshore Avenue &
E18th Street

PROJECT NO.
TBD

SCALE: 1" = 60'
SHEET NO.
00 OF **00**
DATE: December 2012

DRAWING NAME: Z:\Divisions_and_Teams\Transportation\Bike-Ped_Program\Projects\Bikeways-striping\Green Pavement\Design\Lakeshore_NB_E18thST_NS.dwg
PLOT DATE: 12-18-12
PLOTTED BY: bkedesigner



LEGEND

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**E 18th Street &
Lakeshore Avenue**

PROJECT NO.
TBD

SCALE: 1" = 60'

SHEET NO.

DATE: January 2013

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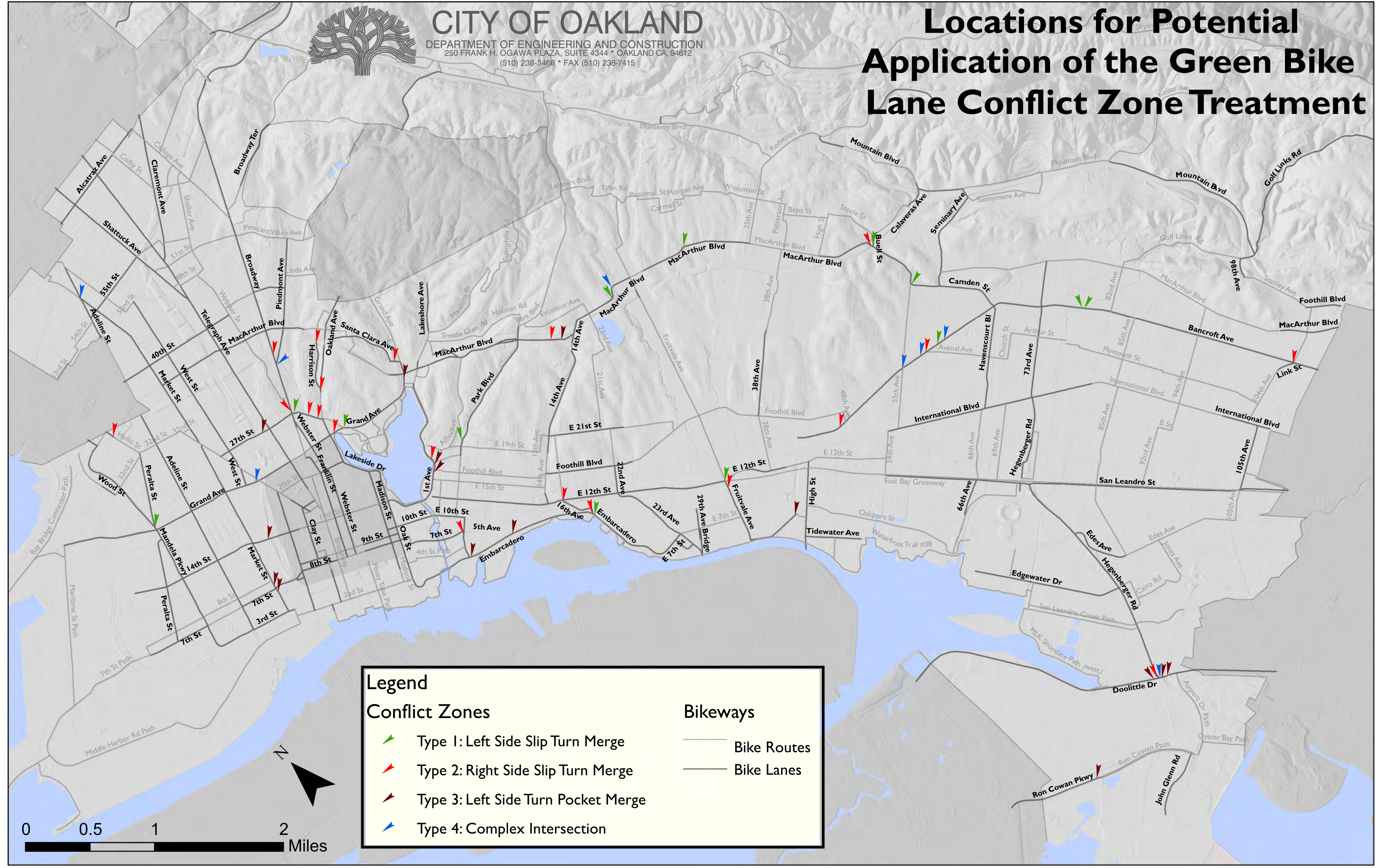
Green Bike Lane/Conflict Zone Pilot Project
Budget Estimate (Six locations)

Unit	UOM	Qty	Unit cost	Total
White stripes	LF	2210	\$ 1.00	\$ 2,210.00
Bike lane & arrow pre-formed thermo markings	EA	8	\$ 100.00	\$ 800.00
Pre-formed thermo, green	SF	6630	\$ 10.00	\$ 66,300.00
Remove striping	LF	1928	\$ 1.00	\$ 1,928.00
Remove markings	SF	98	\$ 2.00	\$ 196.00
				\$ 71,434.00



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Locations for Potential Application of the Green Bike Lane Conflict Zone Treatment



Legend

Conflict Zones

- Type 1: Left Side Slip Turn Merge
- Type 2: Right Side Slip Turn Merge
- Type 3: Left Side Turn Pocket Merge
- Type 4: Complex Intersection

Bikeways

- Bike Routes
- Bike Lanes