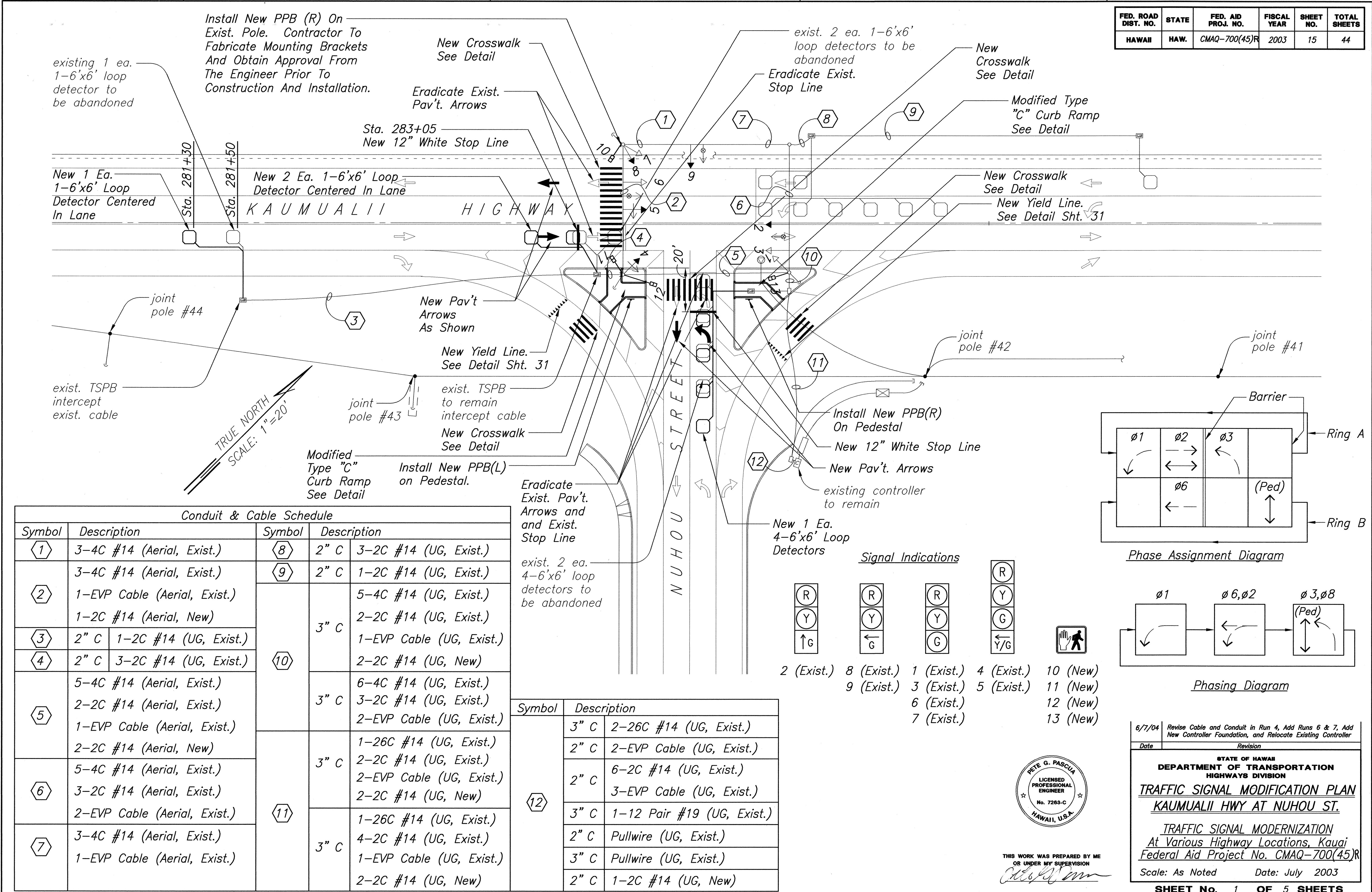
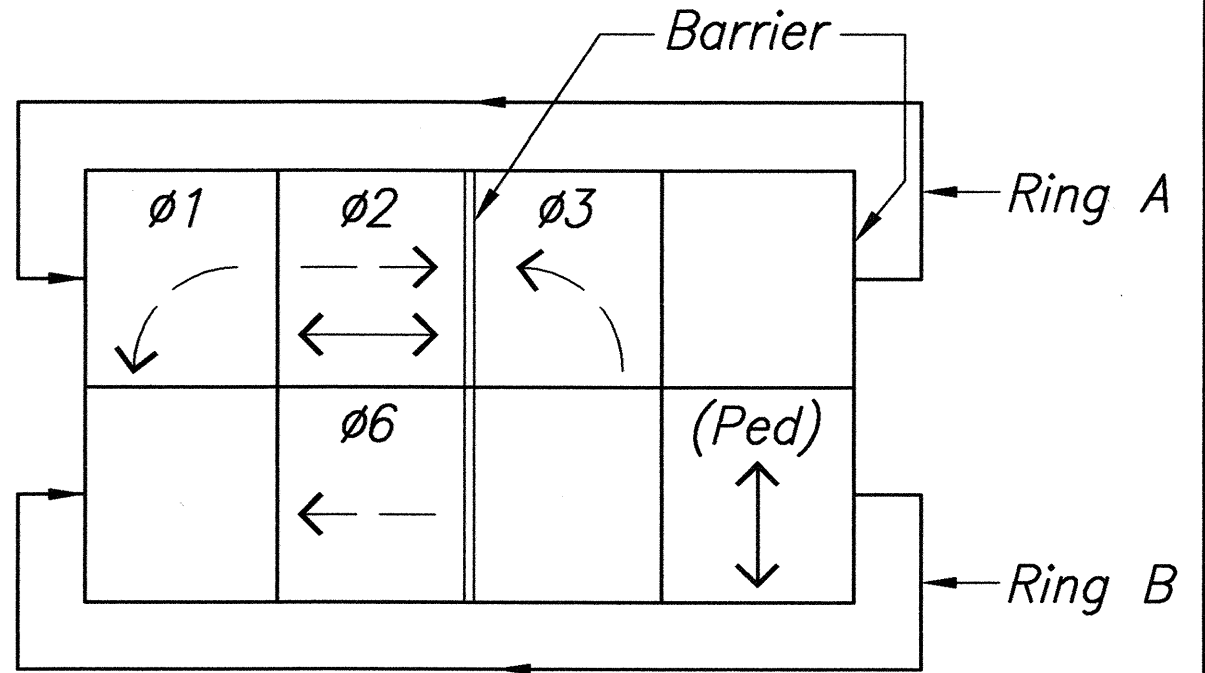


FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	CMAQ-700(45)R	2003	15	44

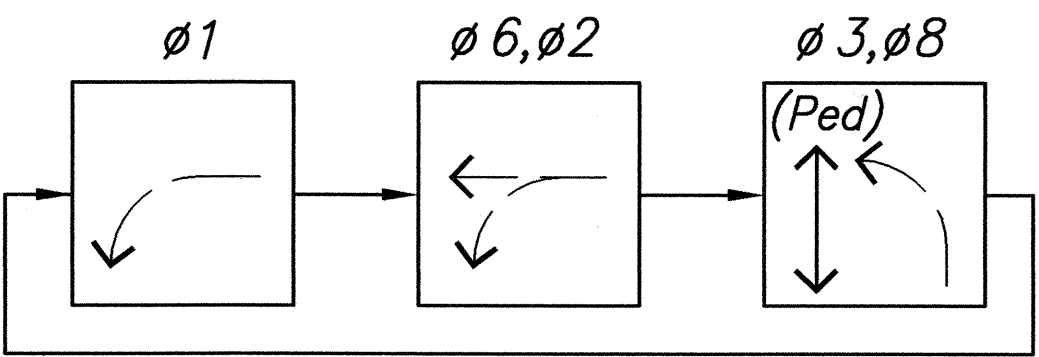


Conduit & Cable Schedule			
Symbol	Description	Symbol	Description
1	3-4C #14 (Aerial, Exist.)	8	2" C 3-2C #14 (UG, Exist.)
2	3-4C #14 (Aerial, Exist.)	9	2" C 1-2C #14 (UG, Exist.)
	1-EVP Cable (Aerial, Exist.)		5-4C #14 (UG, Exist.)
	1-2C #14 (Aerial, New)		2-2C #14 (UG, Exist.)
3	2" C 1-2C #14 (UG, Exist.)		1-EVP Cable (UG, Exist.)
4	2" C 3-2C #14 (UG, Exist.)	10	2-2C #14 (UG, New)
	5-4C #14 (Aerial, Exist.)		6-4C #14 (UG, Exist.)
	2-2C #14 (Aerial, Exist.)		3-2C #14 (UG, Exist.)
	1-EVP Cable (Aerial, Exist.)		2-EVP Cable (UG, Exist.)
	2-2C #14 (Aerial, New)		1-26C #14 (UG, Exist.)
6	5-4C #14 (Aerial, Exist.)		2-2C #14 (UG, Exist.)
	3-2C #14 (Aerial, Exist.)		2-EVP Cable (UG, Exist.)
	2-EVP Cable (Aerial, Exist.)		2-2C #14 (UG, New)
7	3-4C #14 (Aerial, Exist.)	11	1-26C #14 (UG, Exist.)
	1-EVP Cable (Aerial, Exist.)		4-2C #14 (UG, Exist.)
			1-EVP Cable (UG, Exist.)
			2-2C #14 (UG, New)

Symbol	Description
12	3" C 2-26C #14 (UG, Exist.)
	2" C 2-EVP Cable (UG, Exist.)
	2" C 6-2C #14 (UG, Exist.)
	3-EVP Cable (UG, Exist.)
	3" C 1-12 Pair #19 (UG, Exist.)
	2" C Pullwire (UG, Exist.)
	3" C Pullwire (UG, Exist.)
	2" C 1-2C #14 (UG, New)



Phase Assignment Diagram



Phasing Diagram

Signal Indications

R

Y

G

↑G

R

Y

G

←G

R

Y

G

←G

R

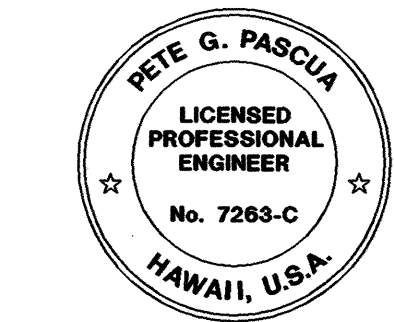
Y

G

←Y/G

2 (Exist.) 8 (Exist.) 1 (Exist.) 4 (Exist.) 10 (New)
 9 (Exist.) 3 (Exist.) 5 (Exist.) 11 (New)
 6 (Exist.) 12 (New)
 7 (Exist.) 13 (New)

SURVEY PLOTTED BY	DATE
DRAWN BY	10/27/02
DESIGNED BY	
QUANTITIES BY	10/27/02
CHECKED BY	



THIS WORK WAS PREPARED BY ME
OR UNDER MY SUPERVISION

6/7/04 Revise Cable and Conduit in Run 4, Add Runs 6 & 7, Add New Controller Foundation, and Relocate Existing Controller

Date Revision

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

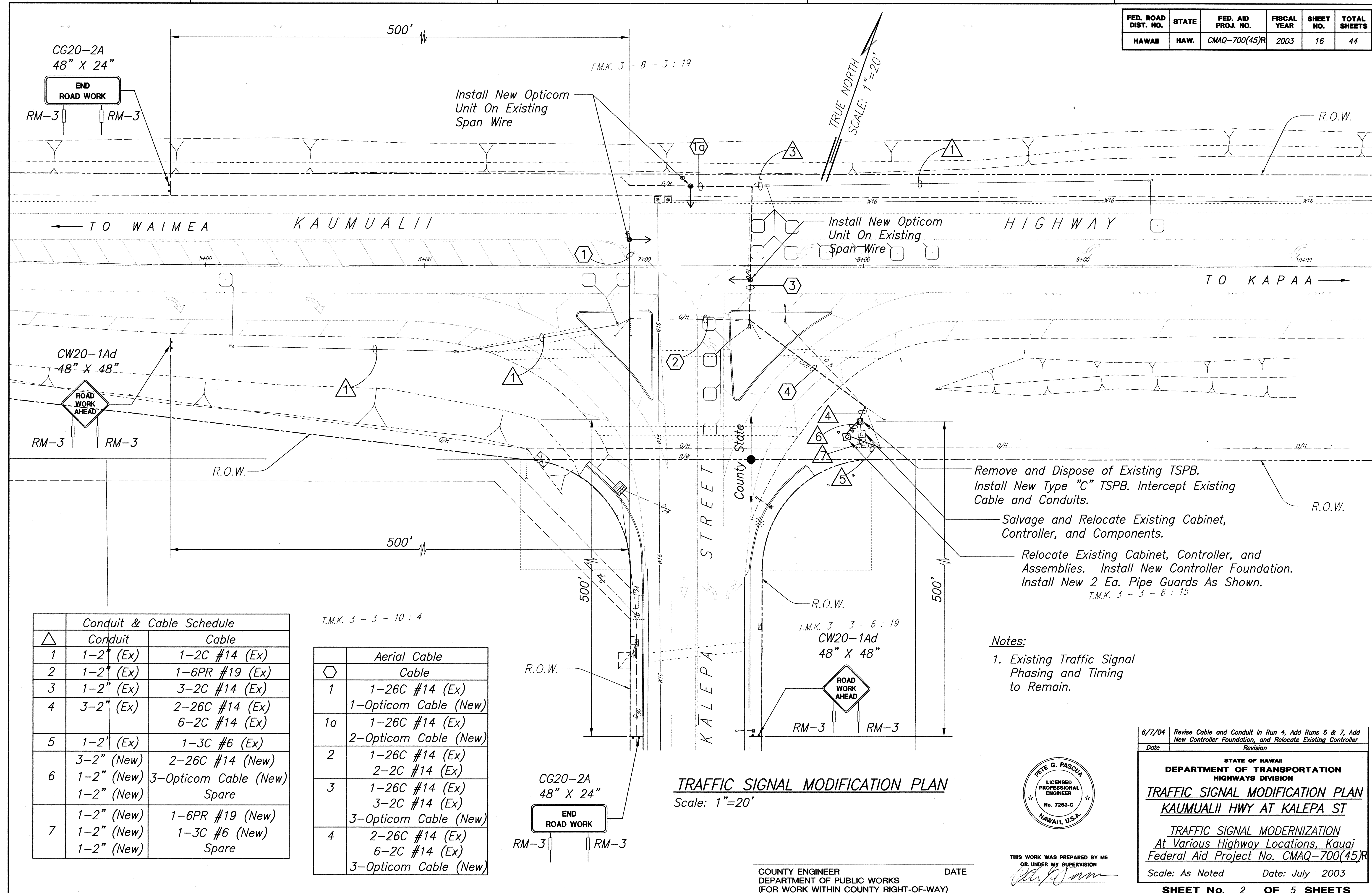
TRAFFIC SIGNAL MODIFICATION PLAN
KAUMUALII HWY AT NUHOU ST.

TRAFFIC SIGNAL MODERNIZATION
At Various Highway Locations, Kauai
Federal Aid Project No. CMAQ-700(45)R

Scale: As Noted Date: July 2003

SHEET NO. 1 OF 5 SHEETS

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	CMAQ-700(45)R	2003	16	44



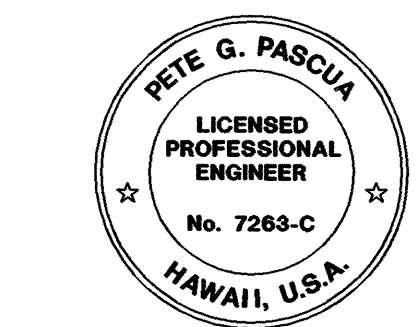
ORIGINAL PLAN	DATE	10/7/02
DESIGNED BY	10/7/02	
QUANTITIES BY	10/7/02	
CHECKED BY	10/7/02	

	Conduit	Cable
1	1-2" (Ex)	1-2C #14 (Ex)
2	1-2" (Ex)	1-6PR #19 (Ex)
3	1-2" (Ex)	3-2C #14 (Ex)
4	3-2" (Ex)	2-26C #14 (Ex) 6-2C #14 (Ex)
5	1-2" (Ex)	1-3C #6 (Ex)
6	3-2" (New) 1-2" (New) 1-2" (New)	2-26C #14 (New) 3-Opticom Cable (New) Spare
7	1-2" (New) 1-2" (New) 1-2" (New)	1-6PR #19 (New) 1-3C #6 (New) Spare

	Aerial Cable
1	1-26C #14 (Ex) 1-Opticom Cable (New)
1a	1-26C #14 (Ex) 2-Opticom Cable (New)
2	1-26C #14 (Ex) 2-2C #14 (Ex)
3	1-26C #14 (Ex) 3-2C #14 (Ex) 3-Opticom Cable (New)
4	2-26C #14 (Ex) 6-2C #14 (Ex) 3-Opticom Cable (New)

TRAFFIC SIGNAL MODIFICATION PLAN
Scale: 1"=20'

COUNTY ENGINEER
DEPARTMENT OF PUBLIC WORKS
(FOR WORK WITHIN COUNTY RIGHT-OF-WAY)



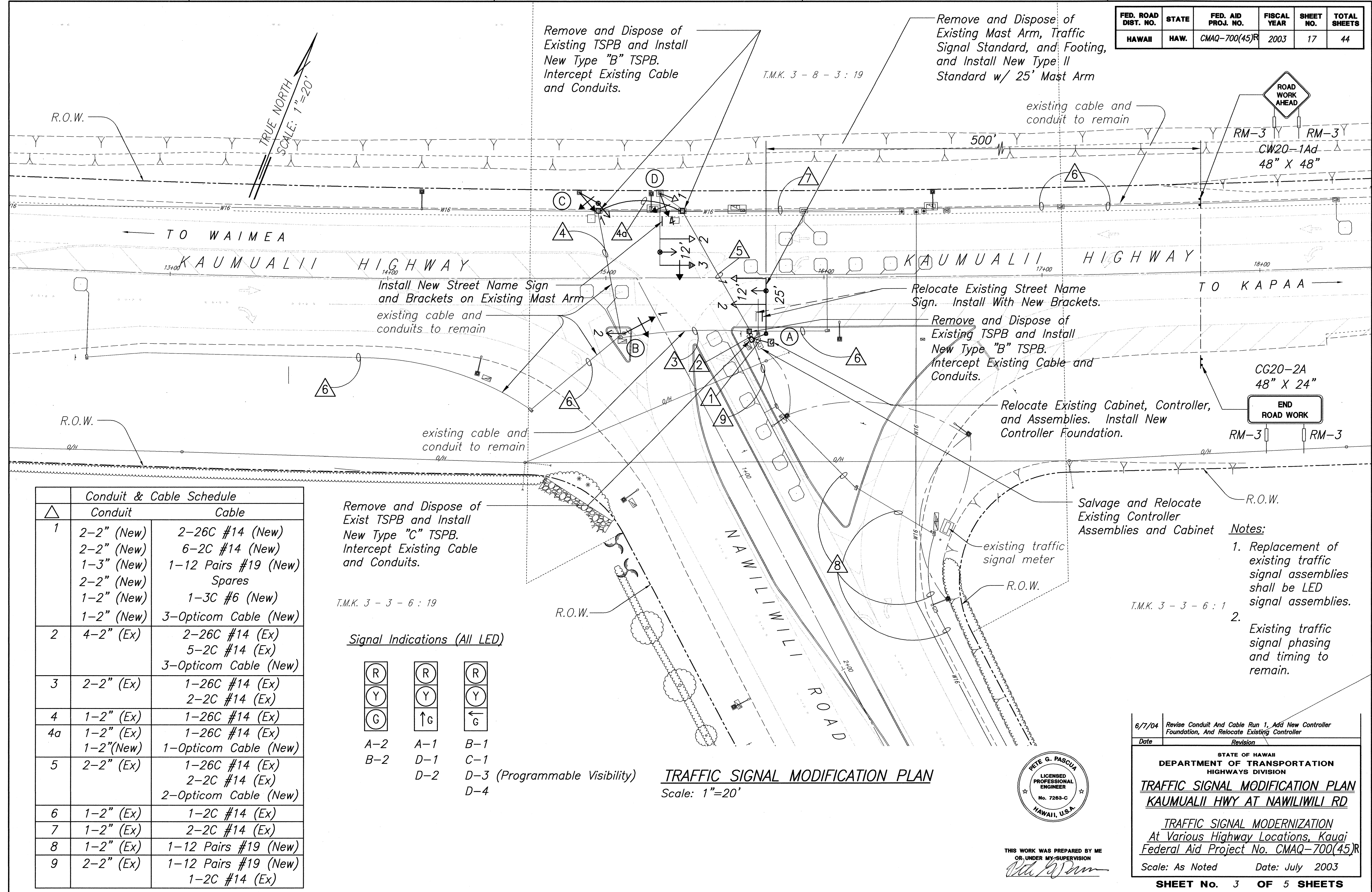
THIS WORK WAS PREPARED BY ME
OR UNDER MY SUPERVISION

6/7/04
Date

Revise Cable and Conduit in Run 4, Add Runs 6 & 7, Add New Controller Foundation, and Relocate Existing Controller
Revision

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION
TRAFFIC SIGNAL MODIFICATION PLAN
KAUMUALII HWY AT KALEPA ST
TRAFFIC SIGNAL MODERNIZATION
At Various Highway Locations, Kauai
Federal Aid Project No. CMAQ-700(45)R
Scale: As Noted Date: July 2003
SHEET No. 2 OF 5 SHEETS

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	CMAQ-700(45)R	2003	17	44

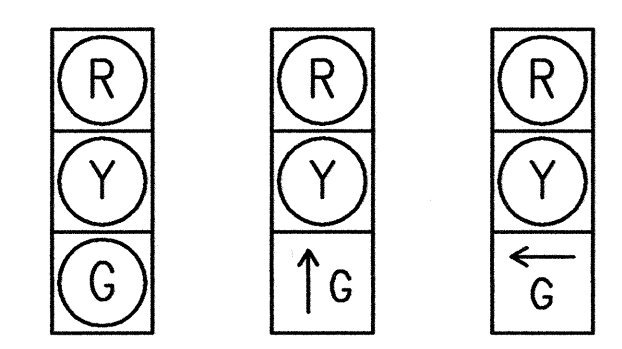


Conduit & Cable Schedule		
△	Conduit	Cable
1	2-2" (New)	2-26C #14 (New)
	2-2" (New)	6-2C #14 (New)
	1-3" (New)	1-12 Pairs #19 (New)
	2-2" (New)	Spares
	1-2" (New)	1-3C #6 (New)
	1-2" (New)	3-Opticom Cable (New)
2	4-2" (Ex)	2-26C #14 (Ex)
		5-2C #14 (Ex)
		3-Opticom Cable (New)
3	2-2" (Ex)	1-26C #14 (Ex)
		2-2C #14 (Ex)
4	1-2" (Ex)	1-26C #14 (Ex)
4a	1-2" (Ex)	1-26C #14 (Ex)
	1-2" (New)	1-Opticom Cable (New)
5	2-2" (Ex)	1-26C #14 (Ex)
		2-2C #14 (Ex)
		2-Opticom Cable (New)
6	1-2" (Ex)	1-2C #14 (Ex)
7	1-2" (Ex)	2-2C #14 (Ex)
8	1-2" (Ex)	1-12 Pairs #19 (New)
9	2-2" (Ex)	1-12 Pairs #19 (New)
		1-2C #14 (Ex)

Remove and Dispose of Exist TSPB and Install New Type "C" TSPB. Intercept Existing Cable and Conduits.

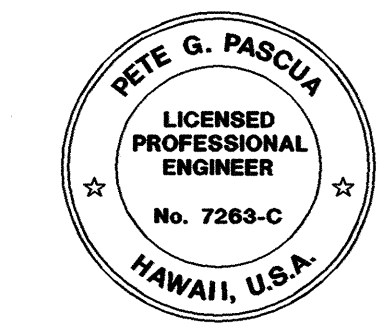
T.M.K. 3 - 3 - 6 : 19

Signal Indications (All LED)



A-2 A-1 B-1
B-2 D-1 C-1
 D-2 D-3 (Programmable Visibility)
 D-4

TRAFFIC SIGNAL MODIFICATION PLAN
Scale: 1"=20'



THIS WORK WAS PREPARED BY ME
OR UNDER MY SUPERVISION
Pete G. Pascua

6/7/04	Revise Conduit And Cable Run 1, Add New Controller Foundation, And Relocate Existing Controller.
Date	Revision
STATE OF HAWAII DEPARTMENT OF TRANSPORTATION HIGHWAYS DIVISION	
TRAFFIC SIGNAL MODIFICATION PLAN KAUMUALII HWY AT NAWILIWILI RD	
TRAFFIC SIGNAL MODERNIZATION At Various Highway Locations, Kauai Federal Aid Project No. CMAQ-700(45)R	
Scale: As Noted	Date: July 2003
SHEET No. 3 OF 5 SHEETS	

SURVEY PLOTTED BY	DATE
DRAWN BY	10/7/02
DESIGNED BY	
QUANTITIES BY	10/7/02
CHECKED BY	10/7/02
ORIGINAL PLAN	
NOTEBOOK	
Amended Sign	
No.	

Remove and Dispose Existing TSPB and Install Type "B" TSPB. Intercept Cable and Conduits.

Install ADA-Type Pedestrian Pushbutton (L) and Pedestal. See Detail Sheet 27

Remove Existing Pedestrian Push Button. Replace Existing Pedestrian Signal Head.

Remove and Dispose of Existing TSPB and Install Type "C" TSPB. Intercept Cable and Conduits.

Relocate Existing Controller, Cabinet and Assemblies. Install New Controller Foundation.

Relocate Existing Traffic Signal Standard. Replace Existing Pedestrian Pushbutton With New ADA-Type Pedestrian Pushbuttons (R & L). Replace Existing Pedestrian Signal Heads. See Detail Sheet 27

Remove Existing Pedestrian Push Button. Replace Existing Pedestrian Signal Head.

Install ADA-Type Pedestrian Pushbutton (L) and Pedestal. See Detail Sheet 27

Install ADA-Type Pedestrian Pushbutton (R) and Pedestal. See Detail Sheet 27

Remove Existing Pedestrian Push Button. Replace Existing Pedestrian Signal Head.

Remove and Dispose of Existing Street Name Sign and Brackets. Install New Street Name Sign and Brackets

Replace Existing Pedestrian Pushbuttons With New ADA-Type Pedestrian Pushbuttons (R & L). Replace Existing Pedestrian Signal Heads. See Detail Sheet 27

Remove and Dispose of Existing TSPB and Install Type "B" TSPB. Intercept Cable and Conduits.

Install Temporary Approach Only Microwave Vehicle Detector and No. 16 4-Conductor Cable (Install in Exist. Conduits and Controller)

Notes:

- See Plan Sht. Nos. 20 to 24 for curb ramps details.
- Replacement of existing traffic signal assemblies shall be LED signal assemblies.
- Install Type 1A brackets for traffic signals on Type 1 standards.
- Existing traffic signal phasing and timing to remain.
- Penetrate existing traffic controller foundation to accept new conduits.

Conduit & Cable Schedule		
Conduit	Cable	
1 2-2" (Ex) 1-2" (New)	2-26C #14 (Ex) 2-2C #14 (New) 1-Opticom Cable (New)	
2 3-2" (Ex)	2-26C #14 (Ex) 1-2C #14 (Ex)	
3 2-2" (Ex)	4-2C #14 (Ex) Spare (Ex)	
4 2-2" (Ex)	1-2C #14 & Spare (Ex) 1-2C #14 (New)	
5 1-2" (Ex) 1-2" (New)	1-26C #14 (New) 1-Opticom Cable (New)	
6 4-2" (Ex)	2-26C #14 (Ex) 6-2C #14 (Ex) 2-2C #14 (New) 1-Opticom Cable (New)	
7 4-2" (Ex)	2-26C #14 (Ex) 7-2C #14 (Ex) 3-2C #14 (New) 1-Opticom Cable (New)	
8 4-2" (New) 1-3" (New) 3-2" (New) 1-2" (New) 1-2" (New) 1-2" (New)	4-26C #14 (New) 1-12 Pairs #19 (New) 15-2C #14 (New) 6-2C #14 (New) 4-Opticom Cable (New) Spare	

Conduit & Cable Schedule		
Conduit	Cable	
9 4-2" (Ex)	2-26C #14 (Ex) 1-12 Pairs #19 (New) 7-2C #14 (Ex) 2-2C #14 (New) 2-Opticom Cable (New)	
10 4-2" (Ex)	2-26C #14 (Ex) 1-12 Pairs #19 (New) 5-2C #14 (Ex) 2-2C #14 (New) 2-Opticom Cable (New)	
11 2-2" (Ex)	1-12 Pairs #19 (New) 1-2C #14 (Ex)	
12 2-2" (Ex)	1-12 Pairs #19 (New) 2-2C #14 (Ex)	
13 6-2" (New)	2-26C #14 (New) 1-12 Pairs #19 (New) 3-2C #14 (New) 2-Opticom Cable (New)	
14 5-2" (New)	2-26C #14 (New) 1-12 Pairs #19 (New) 3-2C #14 (New) 1-Opticom Cable (New)	
15 1-2" (Ex)	1-3 #2 (Ex)	
16 1-2" (New)	1-3C #6 (New)	

TRAFFIC SIGNAL MODIFICATION PLAN
Scale: 1"=20'

SHEET NO. 5 OF 5 SHEETS

Δ	Conduit	Cable
9	4-2" (Ex) 1-2" (New)	2-26C #14 (Ex) 1-12 Pairs #19 (New) 7-2C #14 (Ex) 2-2C # 14 (New) 2-Opticom Cable (New)
10	4-2" (Ex) 1-2" (New)	2-26C #14 (Ex) 1-12 Pairs #19 (New) 5-2C #14 (Ex) 2-2C #14 (New) 2-Opticom Cable (New)
11	2-2" (Ex)	1-12 Pairs #19 (New) 1-2C #14 (Ex)
12	2-2" (Ex)	1-12 Pairs #19 (New) 2-2C #14 (Ex)
13	6-2" (New)	2-26C #14 (New) 1-12 Pairs #19 (New) 3-2C #14 (New) 2-Opticom Cable (New)
14	5-2" (New)	2-26C #14 (New) 1-12 Pairs #19 (New) 3-2C #14 (New) 1-Opticom Cable (New)
15	1-2" (Ex)	1-3 #2 (Ex)
16	1-2" (New)	1-3C #6 (New)

TRAFFIC SIGNAL
MODIFICATION PLAN
Scale: 1"=20'

THIS WORK WAS PREPARED BY ME
OR UNDER MY SUPERVISION

[Signature]

6/7/04	Revise Conduit And Cable Run 18, Add Run 16, Add New Controller Foundation And Relocate Existing Controller
Date	Revision
STATE OF HAWAII DEPARTMENT OF TRANSPORTATION HIGHWAYS DIVISION <u>TRAFFIC SIGNAL MODIFICATION PLAN</u> <u>NAWILIWILI RD AT PIKAKE ST</u> <u>TRAFFIC SIGNAL MODERNIZATION</u> <i>At Various Highway Locations, Kauai</i> <i>Federal Aid Project No. CMAQ-700(45)R</i> Scale: As Noted Date: July 2003	
SHEET No. 5 OF 5 SHEETS	