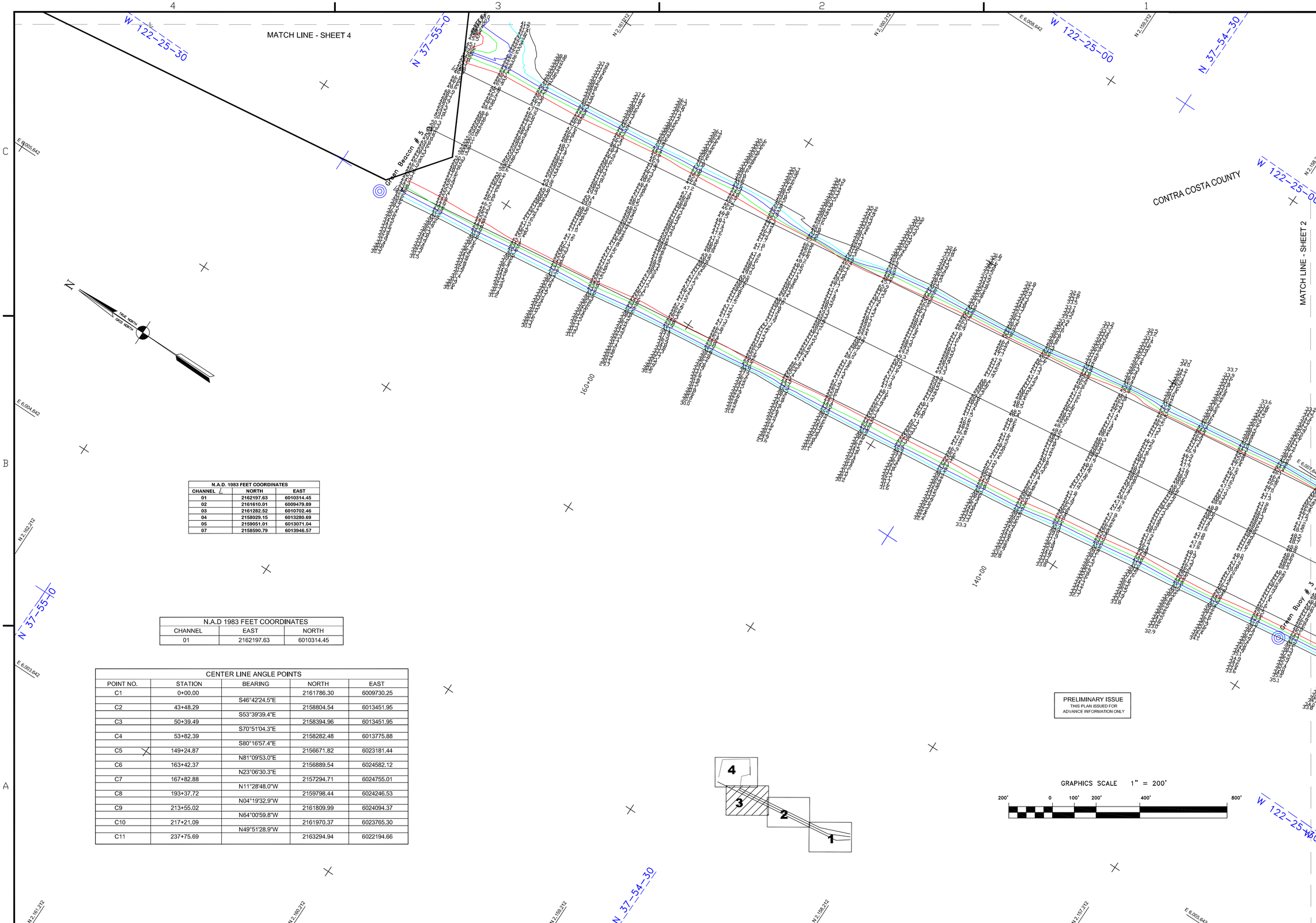

N.A.D. 1983 FEET COORDINATES		
CHANNEL	NORTH	EAST
01	2162197.63	6010314.45
02	2161610.01	6009479.89
03	2161282.52	6010702.46
04	2158029.15	6013280.69
05	2159051.01	6013071.04
07	2158590.79	6013946.57

N.A.D 1983 FEET COORDINATES		
CHANNEL	EAST	NORTH
01	2162197.63	6010314.45

CENTER LINE ANGLE POINTS				
POINT NO.	STATION	BEARING	NORTH	EAST
C1	0+00.00		2161786.30	6009730.25
		S46°42'24.5"E		
C2	43+48.29		2158804.54	6013451.95
		S53°39'39.4"E		
C3	50+39.49		2158394.96	6013451.95
		S70°51'04.3"E		
C4	53+82.39		2158282.48	6013775.88
		S80°16'57.4"E		
C5	149+24.87		2156671.82	6023181.44
		N81°09'53.0"E		
C6	163+42.37		2156889.54	6024582.12
		N23°06'30.3"E		
C7	167+82.88		2157294.71	6024755.01
		N11°28'48.0"W		
C8	193+37.72		2159798.44	6024246.53
		N04°19'32.9"W		
C9	213+55.02		2161809.99	6024094.37
		N64°00'59.8"W		
C10	217+21.09		2161970.37	6023765.30
		N49°51'28.9"W		
C11	237+75.69		2163294.94	6022194.66

US Army Corps of Engineers
San Francisco District
1455 Market Street
San Francisco, CA 94103

Mark	Description	Date	Appr.

DESIGNED BY: | CHECKED BY: TVW | DRAWN BY: EWC
DATE: | SHEET NO. 3 OF 4 | DRAWING NO. 9 | 2 | XXX

SUBMITTED: MC
Hydro Survey Team Leader
APPROVAL RECOMMENDED:
Chief, Technical Support Section
APPROVED:
Chief, Construction Branch

PREPARED UNDER THE DIRECTION OF
LAURENCE M. FARRELL
LT. COLONEL, C.E., DISTRICT ENGINEER

CONTRA COSTA COUNTY CALIFORNIA

RICHMOND HARBOR
SOUTHAMPTON SHOALS
POSTDREDGE SURVEY
9 JULY 2009

Sheet reference number
C3