

IOWA DEPARTMENT OF NATURAL RESOURCES

CONSTRUCTION PLANS

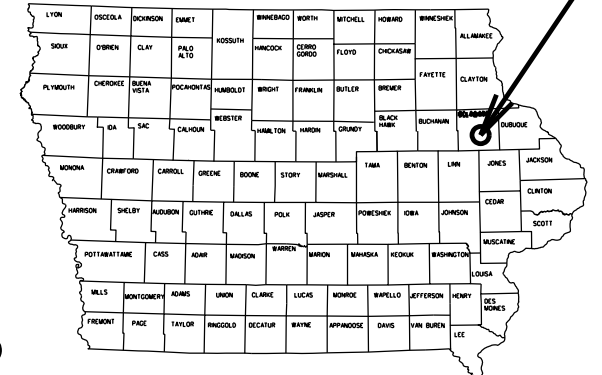
FOR

LAKE DELHI/MAQUOKETA RIVER

DELAWARE COUNTY

DAM BREACH AREA BED & BANK STABILIZATION

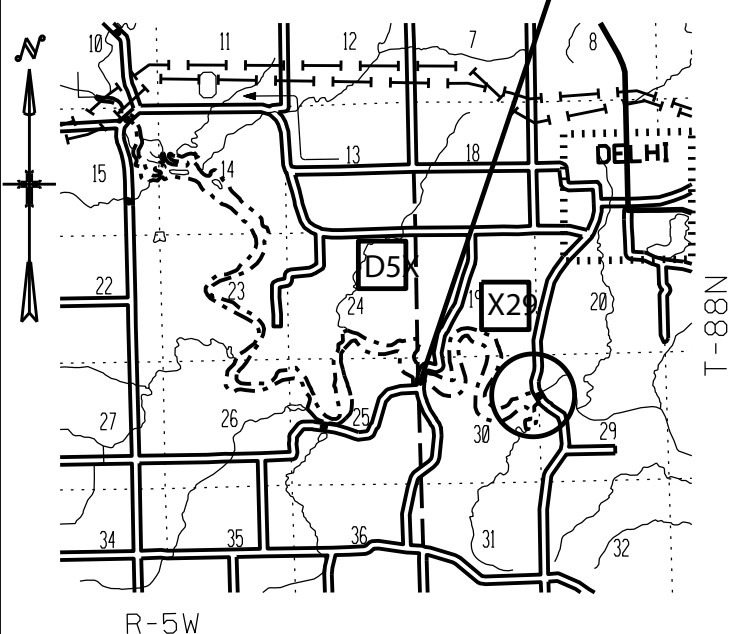
PROJECT LOCATION



LOCATION MAP



PROJECT LOCATION



VICINITY MAP

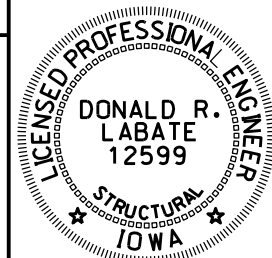
STREAM MODIFICATIONS

11-02-28-04

PLANS PREPARED BY
IOWA DNR ENGINEERING BUREAU
MANAGEMENT SERVICES DIVISION

ESTIMATE OF QUANTITIES

ITEM NO.	DESCRIPTION	QUANTITY



I HEREBY CERTIFY THAT THIS ENGINEERING DOCUMENT WAS PREPARED UNDER MY SUPERVISION AND THAT ENGINEERING DECISIONS WITH REGARD TO THE DESIGN WERE MADE BY ME UNDER THE LAWS OF THE STATE OF IOWA.

SIGNATURE DATE

DONALD R. LABATE
PRINTED OR TYPED NAME

MY LICENCE RENEWAL DATE IS DECEMBER 31, 2010
PAGES COVERED BY THIS SEAL: 1 THRU 3

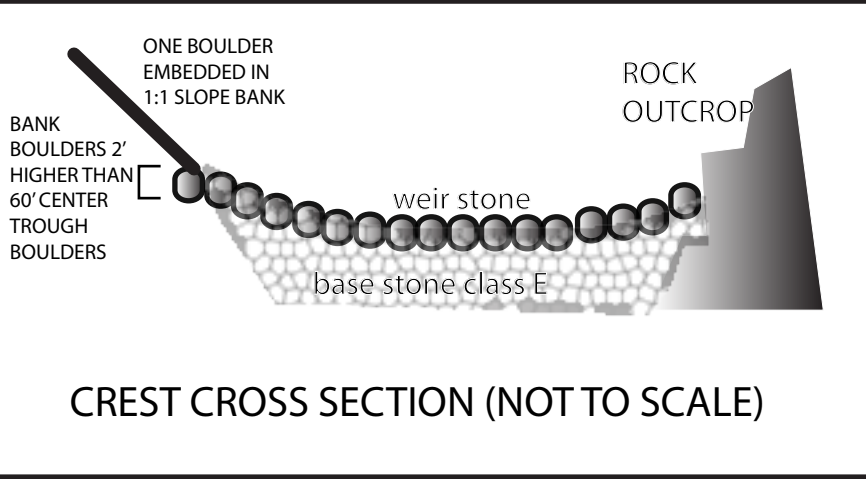
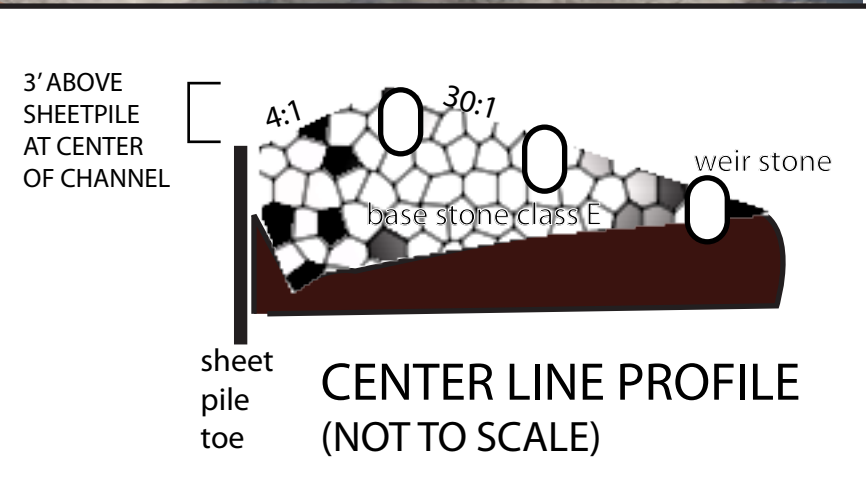
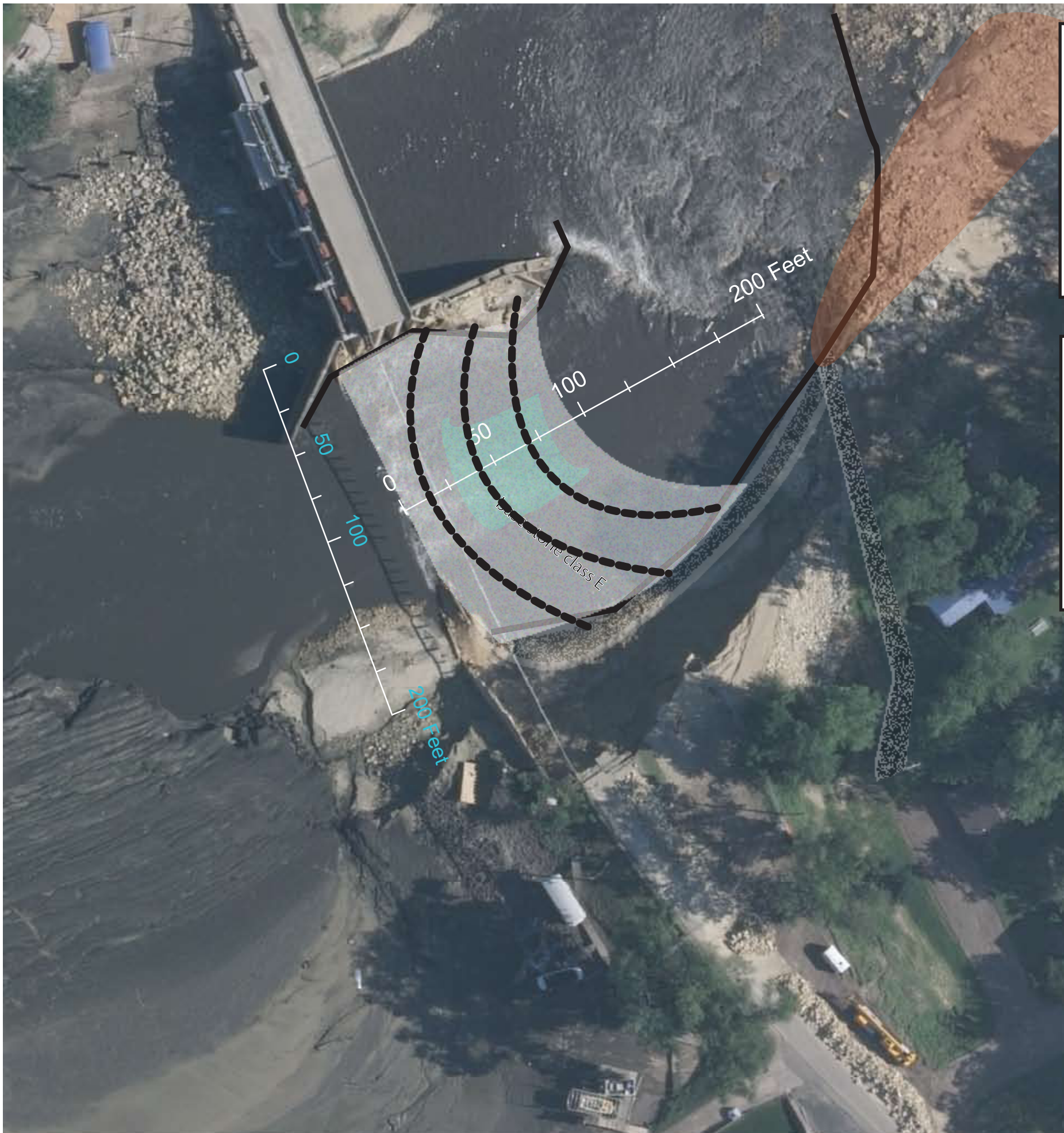
DRAWING INDEX

TITLE	SHEET NO.

PROJECT STREAM MODIFICATIONS PROJ. NO. 11-02-28-04
AREA LAKE DELHI/MAQUOKETA RIVER COUNTY DELAWARE

SHEET OF

DELHI DAM BREACH AREA EMERGENCY BED STABILIZATION



- Weir boulder arch derrick-sized 4,000 to 8,000 lbs. Upper crest is 865.4; existing crest at sheet pile was 862.4.
- flat 60' trough in cross section; centerline energy slope not to exceed .03.
- project footprint; structure primarily constructed of base stone. All materials borrowed from riprap pile downstream.
- Reclaim stone stone from failed dam
- channel edge
- armoured bank stabilization
- approx route, 12'x230' access road