



Flood Contingency Options

High Water Event
The general flood fight strategy will be to flood fight the perimeter levees, implement flood fight measures as necessary to protect against erosion and overtopping, and to mitigate threats presented by seepage through the levee. Emergency flood fight measures will be coordinated and supervised by Reclamation District No. 2030. District will coordinate levee patrol and accompany Corps of Engineers and Department of Water Resources teams assigned to assess or flood fight district levees. County will coordinate action planning between district and State/Federal agencies and provide logistical support.

Actions Needed
Initiate and coordinate patrol of primary levees and respond to identified problems. Participate in Central Delta Unified Flood Fight Command with command post at Holt.

Failure of Primary Levees
The general flood fight strategy will be to seal break once water levels stabilize, protect interior slopes of primary levees, and install emergency pumping stations to dewater the district.

Actions Needed
Prepare pre-planned delivery points for water traffic for movement of supplies and equipment by water to district.
Stabilize ends of break to reduce extent.
Seal break once water levels have stabilized.
Place equipment to protect interior slopes of primary levees.
Place additional pump capacity at location of emergency pumping station for dewatering of district.

Emergency Contact Information:
District Superintendent: Ed Zuckerman (209) 471-7079
District Engineer: Steve Sinnock (209) 465-1465
District Secretary: George Hartmann (209) 351-2222

Delivery Points and Supply Staging Areas

DP-01 The area just north of the McDonald Island bridge, which is located at the southeast corner of McDonald Island. The McDonald Island bridge is accessed from McDonald Island Road on Lower Roberts Island. This delivery point is for ground access. 121°28'33.93"W 37°58'37.07"N

DP-02 The high ground on the bank of the Stockton Deep Water Channel at the northeast corner of McDonald Island accessed from the most southerly tip of Headreach Island at McDonald Island Station 245+00. This delivery point is for water access. 121°28'26.97"W 38°01'32.94"N

DP-03 The existing boat dock located on Columbia Cut on the north side of the island at the existing structures at levee station 355+00. This delivery point is for water access. 121°30'29.38"W 38°01'27.26"N

DP-04 The existing boat dock on the located on the east side of the island across from Lost Isle at levee station 110+00. This delivery point is for water access. 121°27'08.75"W 37°59'53.40"N

Tactical Plans – (Preliminary Engineering Designs)

P.E.D.s have not been prepared for RD 2030.
For tactical information/actions refer to the Flood Contingency Options text box.

Dewatering Plan

After levee failure has been repaired, place emergency pumping station(s) on levee at site(s) shown for flood dewatering. Whiskey Slough divides McDonald Island into two drainage basins and therefore dewatering facilities may be needed for both basins. Continue to monitor and protect interior levee slopes.

0 2,500 5,000
Feet
1 inch = 1,000 feet

Time/Date of Start of Incident

Map Version

- Legend**
- 100 Year Flood Elevation
 - Logistics Base
 - Delivery Point
 - Supply Staging Area
 - Water Landing
 - Heli-base
 - Heli-spot
 - Historic Seepage Area
 - Historic Levee Breach
 - Relief Cut
 - Historic Erosion Area
 - Historic Slope Stability Area
 - Levee Access
 - Emergency Berm
 - Dryland Levee
 - Dryland Levee Critical Section
 - Levee
 - Levee Crown Elevation
 - Spot Elevation
 - Levee Mile-River Mile Station
 - Pump Station – Reclamation District
 - Pump Station – Municipal Storm
 - Pump Station – Emergency Pump Out
 - Pump Station – Municipal Sanitary
 - Structure (A=Agricultural, R=Residences (R# = number of homes), H=Hospital, S=School)
 - Water Well
 - Sanitary Sewer Lines
 - Storm Drain Lines
 - Water Lines
 - Overhead Transmission Line
 - Underground Fiber Optics
 - Underground Lines
 - Command Post
 - District Boundary
 - Elevation Contour
 - Evacuation Route
 - Waterways/Channels

Special Flood Consideration

Trees at structures (Sta 355+00)
During a flood event the trees around the Duck Club might restrict large equipment access along the crown of the levee.

Special Flood Consideration

Historic Seepage Area (Sta 445+00)
District has historically experienced seepage at the base of the levee in the vicinity of Station 445+00. District has installed toe berms and drains to mitigate seepage at this location.

Special Flood Consideration

Mildred Seepage (Sta 500+00 to 610+00)
Mildred Island flooded in 1983 and McDonald Island has experienced seepage along Latham Slough area since then. The seepage has impacted the farming operation on McDonald Island.

Special Flood Consideration

P.G.&E. Pipeline (Sta 559+00)
Pacific Gas and Electric pipeline crossing, lack of all-weather facilities over location of pipeline at the top of levee.

Communications Plan

Field Command Posts
RD 2030-01 Spalletta shop & equipment yard 121°27'57.01"W 38°01'02.54"N (209-464-6701)
RD 2030-02 Duck Club 121°30'29.38"W 38°01'27.26"N

Communications Equipment
The District does not own communications equipment.

Internal Communications
Means of internal communications among district staff and levee patrols will be personal cellular telephones. Telephone numbers will be assigned for response functions at the time of activation.

Communications with outside Jurisdictions
Primary means of communications with outside jurisdictions will be personal cellular telephones. Secondary means of communications will be attendance at Central Delta Unified Flood Fight Command meetings.

Special Considerations

Reclamation District No. 2030 - McDonald Island
In the event of a flood on Reclamation District No. 684 (Lower Roberts Island), or Reclamation District 524 (Middle Roberts Island), access for McDonald Island would be cut-off. Access to and from McDonald Island under these circumstances would have to be by water.

In the event of a flood, the landside slope of Empire Cut and Turner Cut needs to be protected to prevent erosion on the inside of the levee from prevailing northwest wind.

The flooding of Reclamation District 2030 will result in seepage on the north side of Lower Jones Tract along the Empire Cut levee.

Pacific Gas and Electric Company has extensive gas compressor facilities, gas extraction facilities, well heads, high pressure gas collection piping system and high pressure gas distribution system on McDonald Island. Many of the pipes may have minimal (less than 36 inches) of cover. Note restricted access area on map.

Flood Fight History

1982
Catastrophic stability failure of levee occurred at approximately 3 a.m. on August 23, 1982 near District levee station 485+00. The break ultimately scoured to a depth of 75.0 feet and a width of approximately 650 feet. Primary flood fight issues include:
Interior of south and east levee sustained substantial damage due to northwest wind generated waves.
P.G.&E. electrical capacity on McDonald Island is limited. Location and size of dewatering pump station is based upon P.G.&E.'s ability to provide adequate service in 1982.
Whiskey Slough divides McDonald Island into two separate drainage basins. Dewatering facilities must be provided for both basins once water service is reduced to approximately -10.0 feet.
Seepage will occur on the north side of Lower Jones Tract along the Empire Cut levee.

River Gage Information

River Gage Monitoring
The California Department of Water Resources operates a gaging station on the San Joaquin River at Venice Island, Station ID: VNI, on the California Data Exchange Center (CDEC) website. This information could be useful during a highwater and/or flood event. In September 2006, the vertical datum on this website was converted from National Geodetic Vertical Datum of 1929 (NGVD29) to North American Vertical Datum of 1988 (NAVD88). The river stage elevations for the San Joaquin River at Venice Island reported on CDEC web site are on the NAVD88 datum. To convert the CDEC reported river stage elevation to NGVD29 datum, subtract 0.35 feet.

Survey Information

Basis of Elevations
Vertical Datum: NAVD88
100 Year Flood Elevation: 1992 USACE Sacramento-San Joaquin Delta Hydrology Special Study (Converted to NAVD88)
Contours: 2007 DWR LIDAR
Levee Crown Elevations: 2011 KSN Levee Profile Survey

Levee Patrol Plan

Reclamation District No. 2030
Levee patrols are performed by Reclamation District No. 2030 personnel as needed. District is capable of providing personnel for 24 hour patrols. Levee patrols are coordinated through Delta Bluegrass. Levee patrols will meet at the bridge and at that time will be given patrol assignments.
Venice Island gauge will be used to monitor tidal conditions. Initiate periodic levee inspections at EL+9.0. Initiate 24 hour continuous levee patrols at EL+9.0

Levee Patrol Legend
Lath Protocol
Red – Bolt/Seepage
Blue – Rock Slippage
White – Slope/Levee Distress