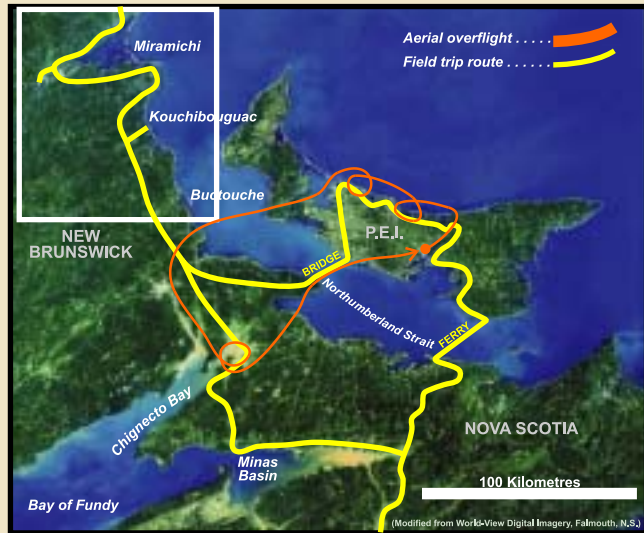


# AERIAL RECONNAISSANCE OF PRINCE EDWARD ISLAND, SOUTHEAST NEW BRUNSWICK COAST AND CHIGNECTO BAY, BAY OF FUNDY

## AERIAL AND GROUND ROUTES



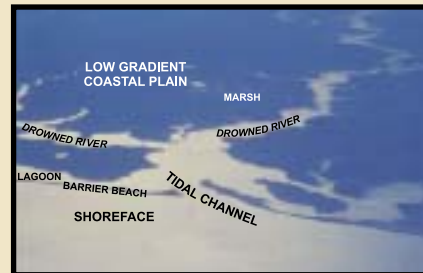
## EAST NEW BRUNSWICK COAST AND CHIGNECTO BAY

### BUCTOUCHE SYSTEM



*Buctouche is a classical drowned river valley with a large 15 km long recurved spit formed across its mouth.*

### KOUCHIBOUGUAC SYTEM



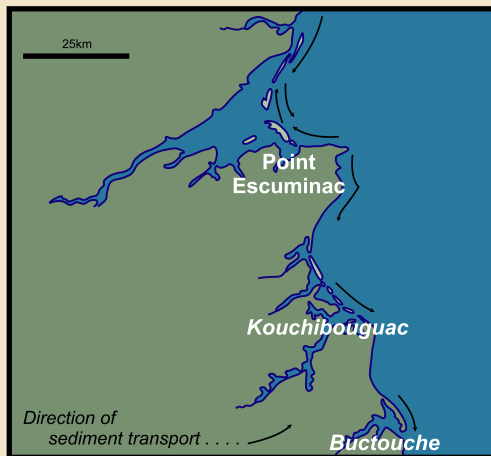
*Kouchibouguac is a multiple drowned river system semi-enclosed by a strand of barrier islands and spits*

### CHIGNECTO BAY



*The macrotidal coastal environments of Chignecto Bay and Minas Basin differ drastically from the microtidal wave-dominated, barrier-estuary/lagoon environments that characterize the southern Gulf of St. Lawrence coasts of P.E.I. and New Brunswick. Spring tidal ranges in the order of 16 metres at the heads of Chignecto Bay and Minas Basin, create broad intertidal sub-environments*

*dominated by muddy sediment deposition, tidal run-off creeks, and classical tidal point bar and tidal flat deposits.*



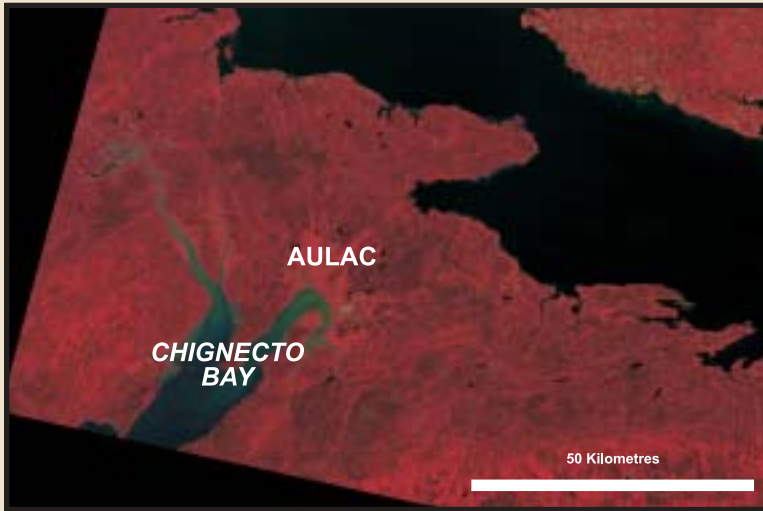
### POINT ESCUMINAC



*Pleistocene(?)-Holocene peat cliffs at Point Escuminac illustrating perched water table forming surface ponds, and active erosion of peat bog margin by high energy waves*

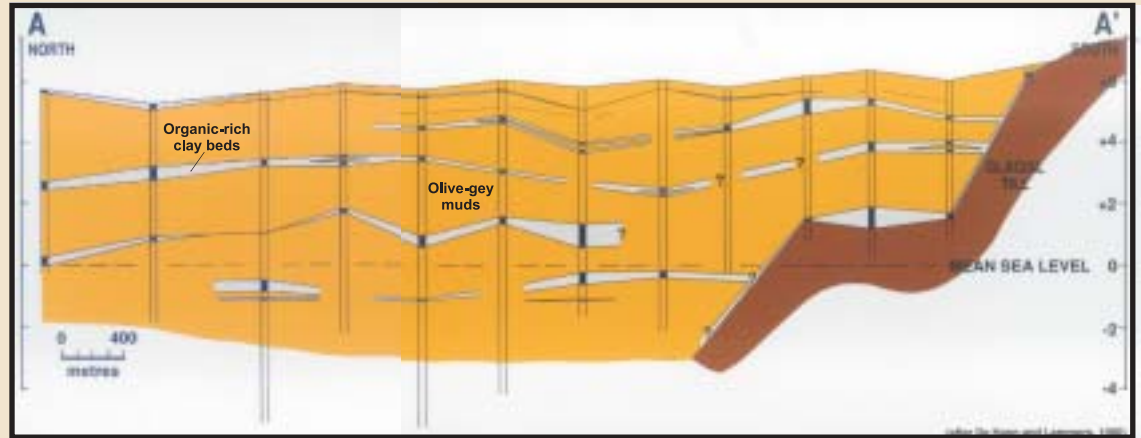


# MACROTIDAL CHIGNECTO BAY TIDAL FLATS, AULAC, N.B.

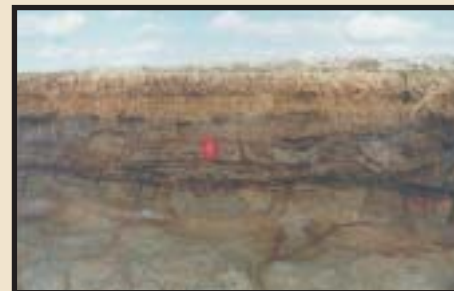
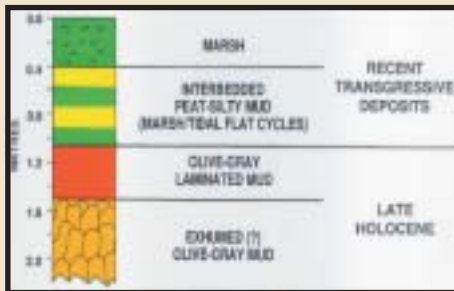


## HOLOCENE STRATIGRAPHY - TANTRAMAR MARSHES

*Tantramar Marsh stratigraphy consists of up to 12 metres of intertidal to supratidal mudflats (silty muds and clays), interbedded with thin organic layers representing marsh or bog deposits. Transgression began some 4100 ybp as indicated by the age of the lowest organic layer*



## TIDAL FLAT STRATIGRAPHY



INTERLAYERED MARSH/TIDAL FLAT CYCLES



VIEW OF RECENT TIDAL FLAT DEPOSITS OVERLYING EXHUMED LATE HOLOCENE MUDS

PALEO-MUDCRACKS OR PALEOPEDS ?

