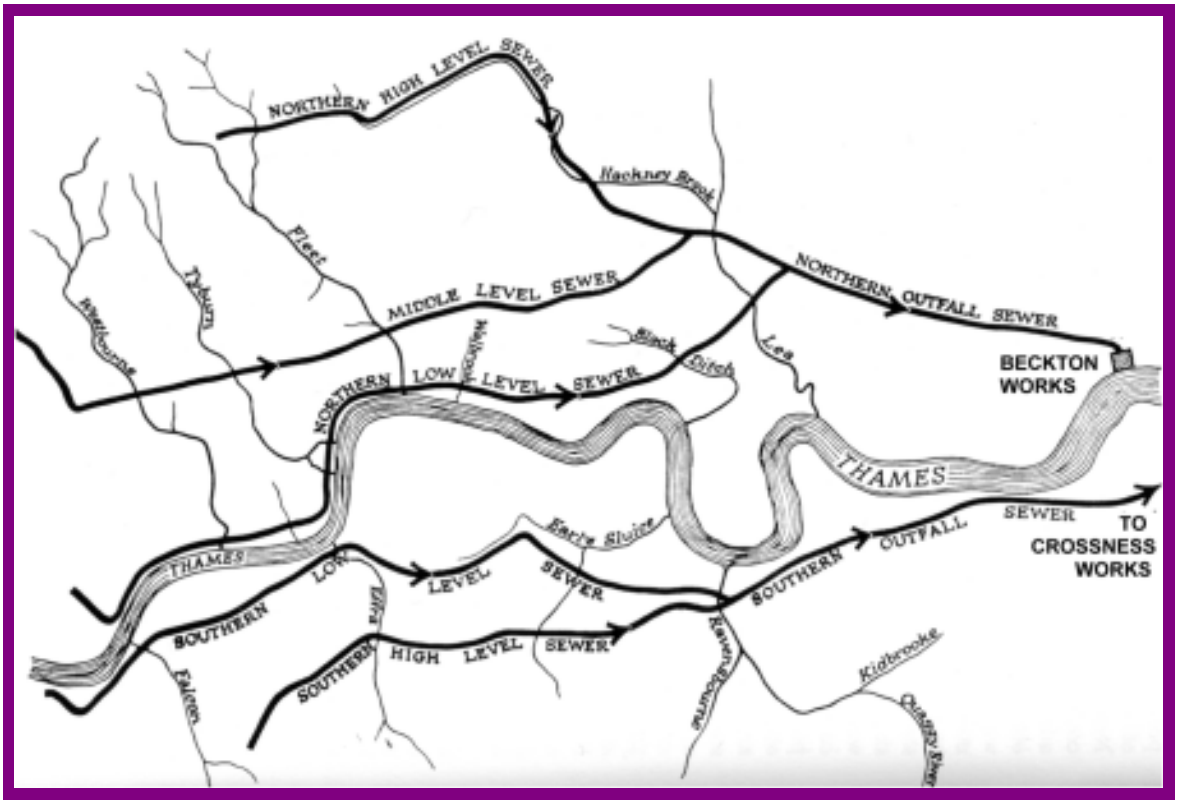
LONDON'S INTERCEPTING SEWER SYSTEM



London's Intercepting Sewer System

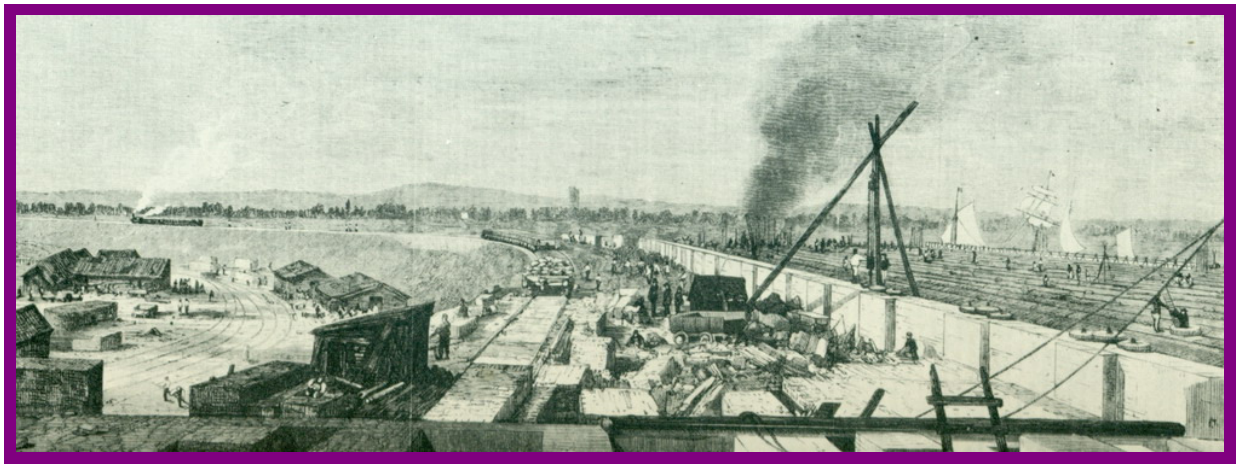
Originally sewage was passed untreated into the River Thames, the capital's main source of drinking water. To overcome this problem and reduce disease the scheme devised by Joseph Bazalgette, beginning in 1859, created two huge networks of sewer pipes, one on each side of the Thames known as the Northern and Southern Outfall Sewers.

In the north, sewage flows by gravity until it joins the main Northern Outfall Sewer at Abbey Mills where a pumping station raises its level enabling it to continue to the works at Beckton.

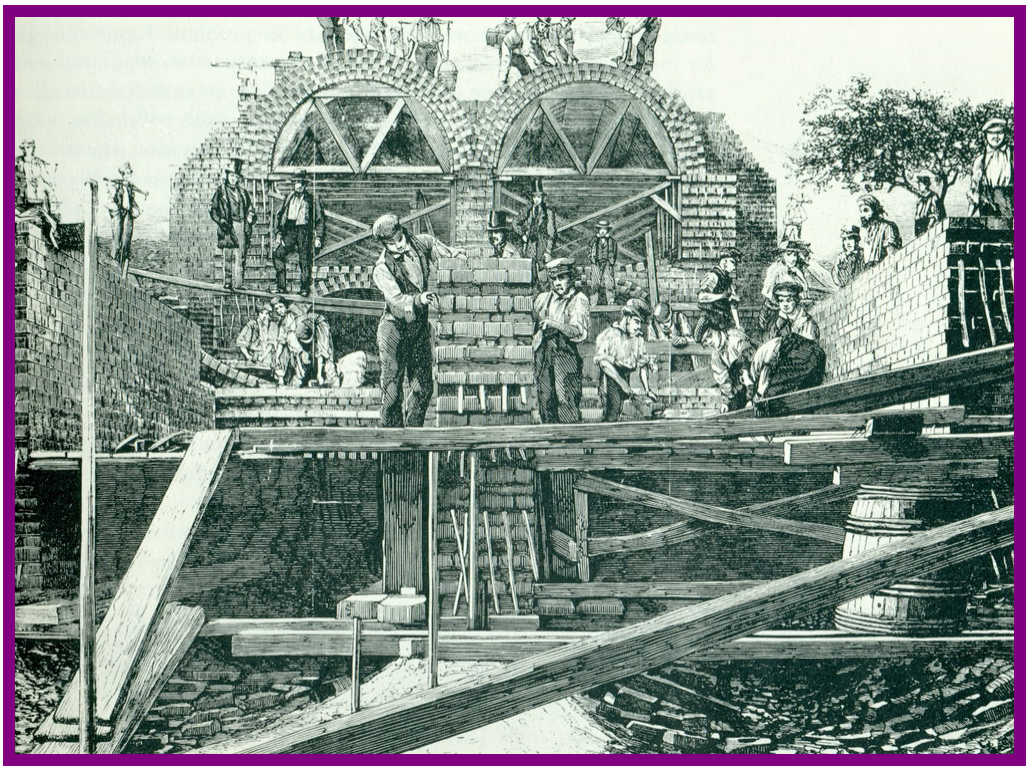
On the south side, sewage flows to the Crossness Works and Pumping Station where it was stored prior to being discharged at high tide.

The original scheme had some 100 miles of intercepting sewers, connected to 450 miles of main sewers and about 13,000 miles of smaller local sewers. The scheme was extended at the end of the 19th century and the early years of the 20th.

The original problem included open sewers like this one running underneath a lodging house in Fish Lane, Holborn, about 1840



Work on the Northern Outfall Sewer, running across Plaistow and East Ham to Beckton, started in 1861

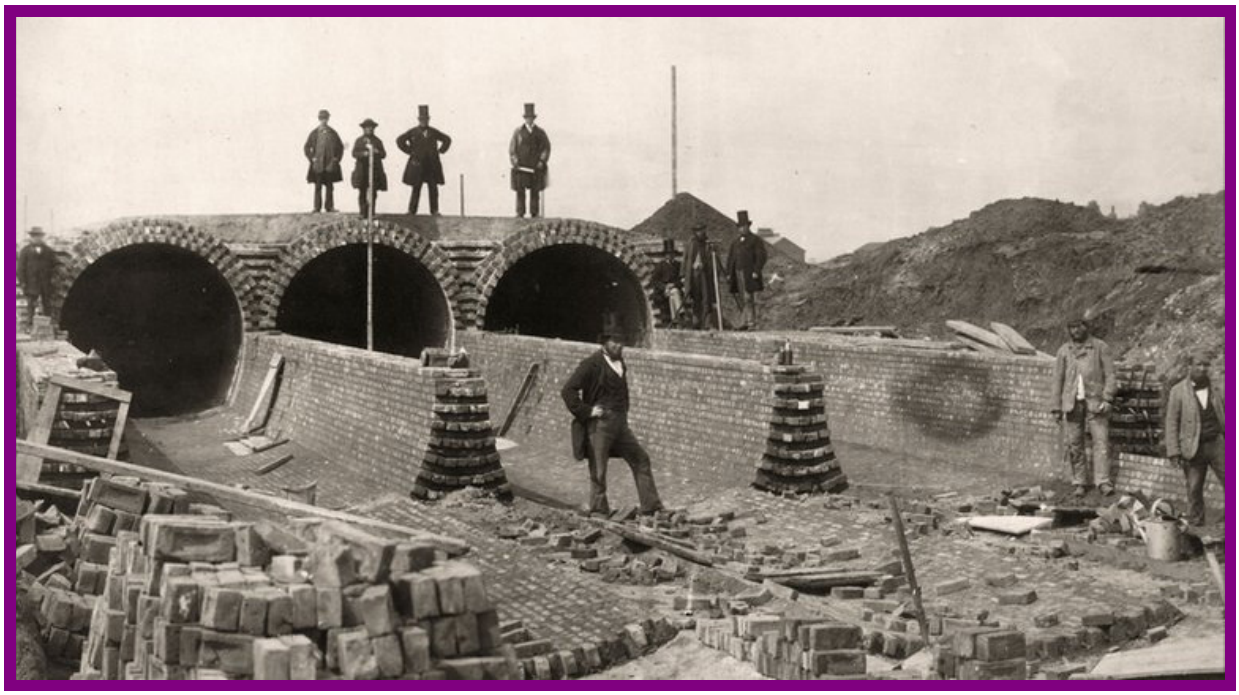


Tunnels under construction at Wick Lane, near Old Ford, Bow

Beckton under construction in 1865

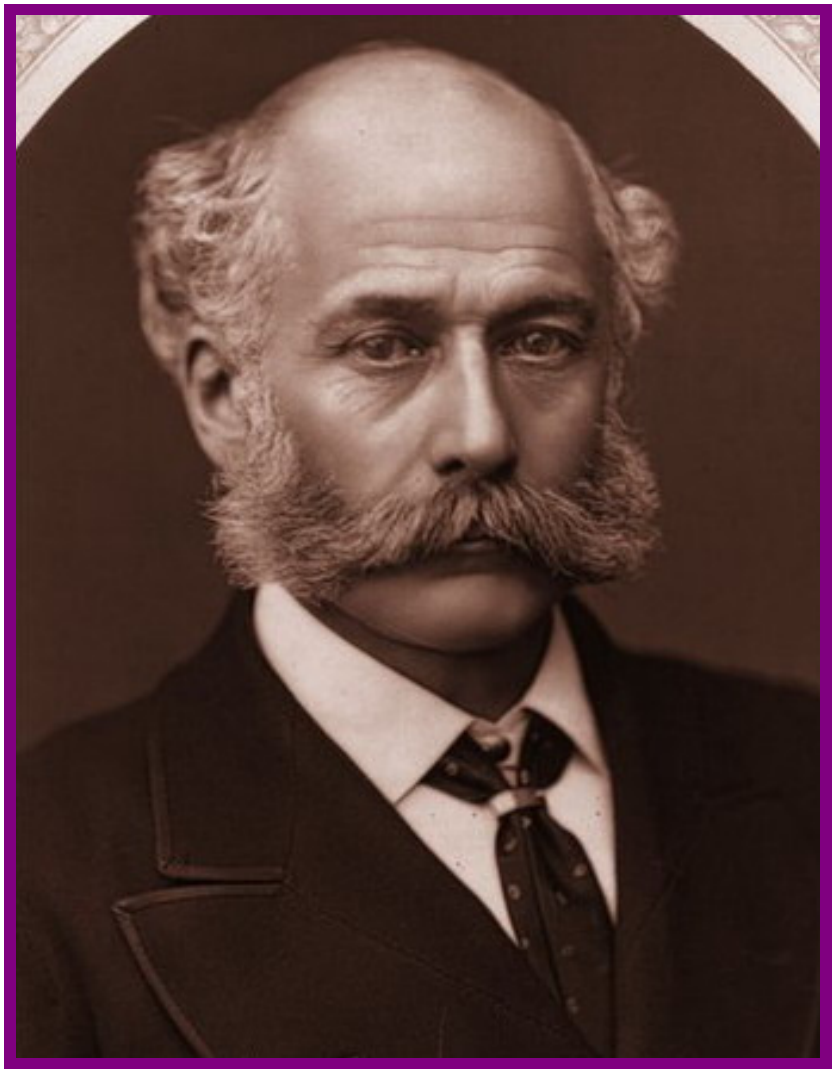
"London under London," Richard Trench & Ellis Hillman, 1984
(CIBSE Heritage Group Collection)

Overhead Sludge Tanks, Northern Outfall Works at Beckton, 1894-95



The construction of Northern Outfall Sewer near Abbey Mills

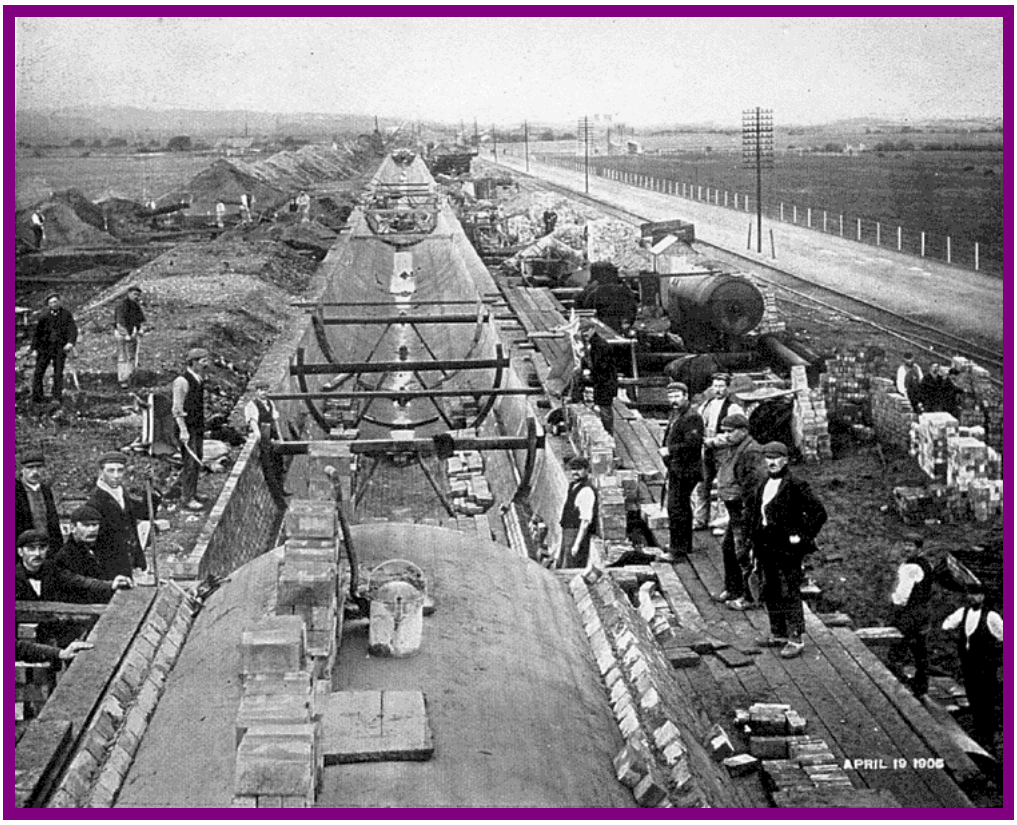
A tour of the sewer construction works



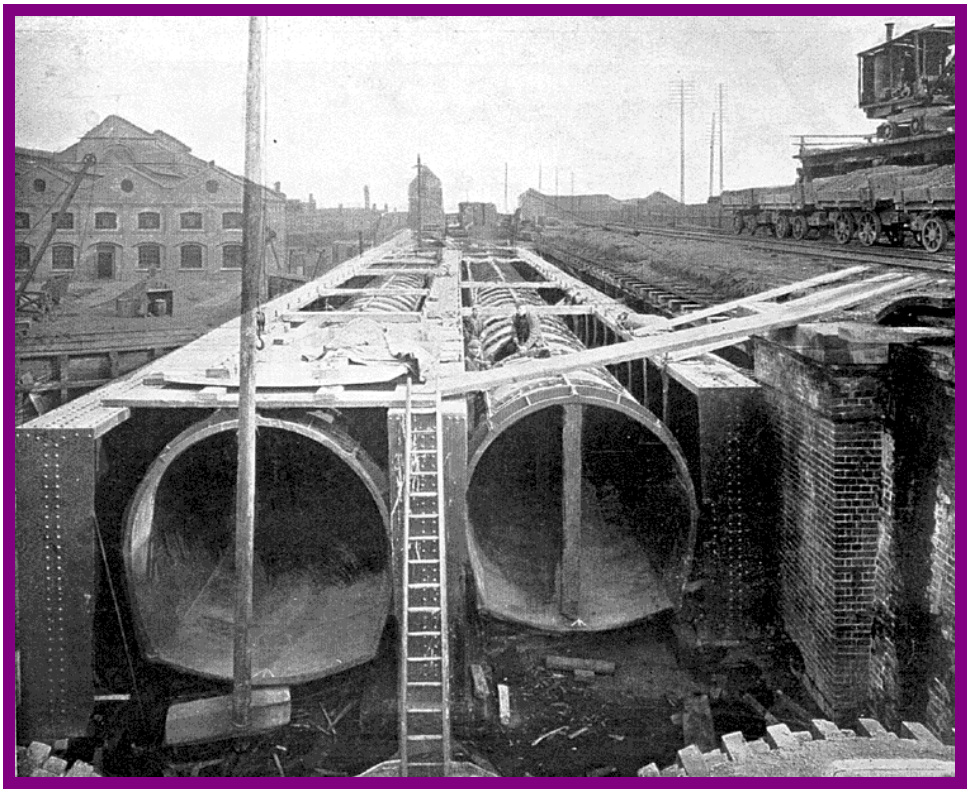
Sir Joseph Bazalgette 1819-1891
President of the Institution of Civil Engineers in 1884

Memorial to Sir Joseph Bazalgette on the Thames Embankment

Northern Outfall Sewer in course of construction, 1906-07



Southern high-level sewer, Crossness to Catford, under construction, 1904-06



Northern Outfall Sewer under construction, Abbey Creek and Channelsea River, 1902-06

Turn of the Century photographs from "Main Drainage of London," Sir George W Humphreys, LCC, 1930

Chimney at Beckton: currently dismantled, ready to be re-erected at a later date (English Heritage)