





William I "The Conqueror"
Norman Invasion 1066



Humphrey de Tilluel
Prefab fort



Gundulf of Bec
Father of Royal Engineers



Building Castle + Building Abbey

Early Engineer Duties

- Miners- Siege Warfare
- Carpenters/Woodcutters/Fossatores (Pioneers)- Siege Roads
- Early float bridges
- Ordnance
- Trenchmasters
- Surveyors of the Kings Works
- Master Masons
- Sappers
- Chemical

Engineers 1800-WWI

Peninsular War

Siege of Banajoz

War of 1812

Russian War

China War (Hong Kong)

Afghanistan- Siege of Kandahar

South Africa

Egypt

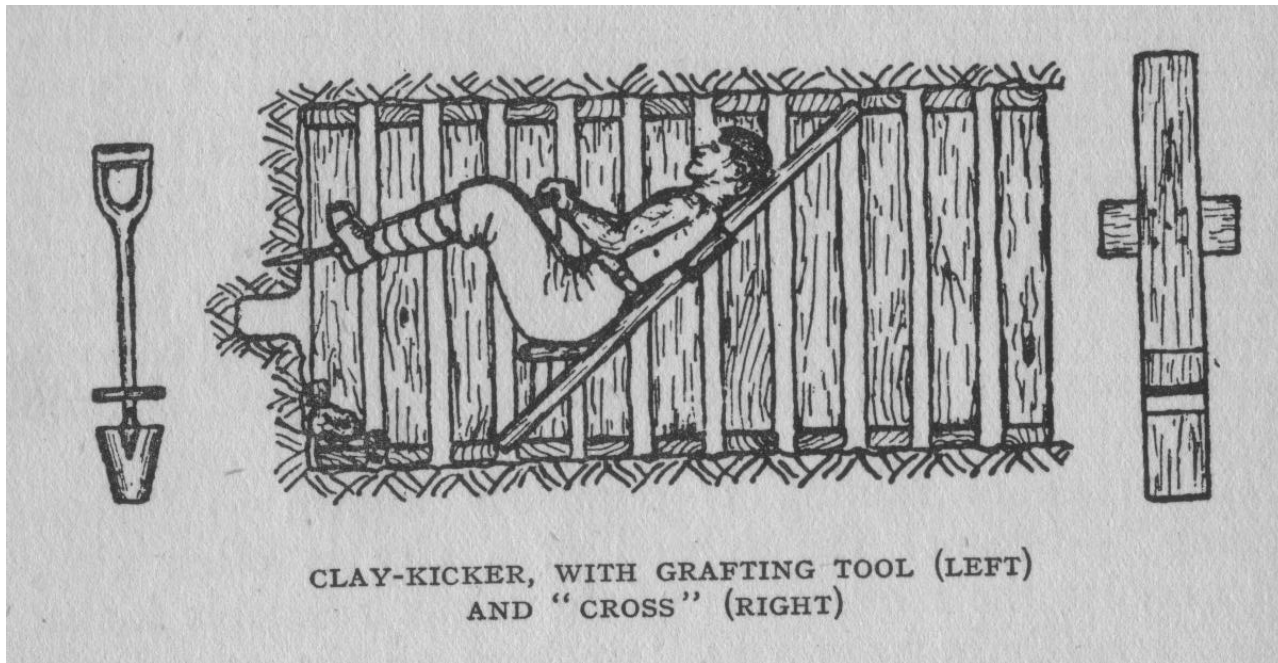
Sudan

Engineers Given Motto “Umbique” (everywhere) by William IV

WW I

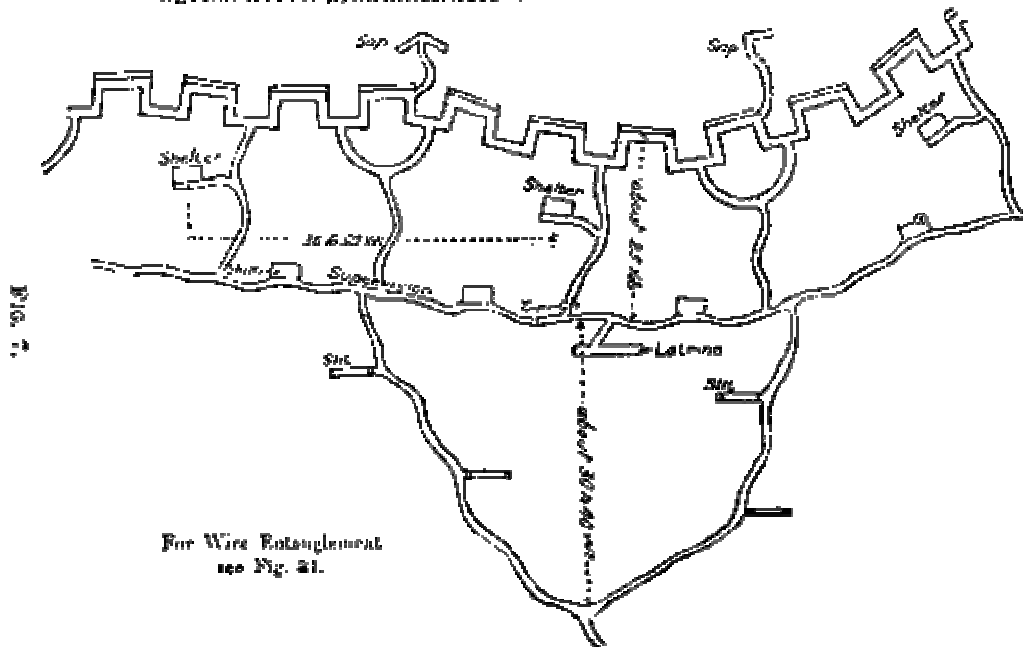
Mobile warfare gives way to Siege
Tunnelling/Mining
Trenches (Sappers)

Geologic Input
London Tunnellers (Kickers)
Rail Workers
Use of Piles
Tubbing





ALTERNATIVE DIAGRAMMATIC ORGANIZATION OF A FRONT LINE.



WW II

William Bernard Robinson King 1939

First Appointed Military Geologist

Operation Overlord – Normandy vs Cherbourg and Cotentin Peninsula

Quarrying

Topography

Mulberry Harbor

