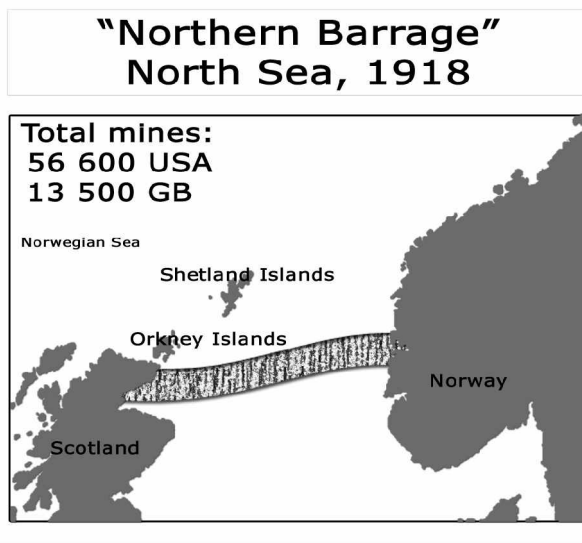


### Northern Mine Barrage

U-boats had been a serious threat to the Allies since 1916. Preventing U-boats from leaving the North Sea and sailing into the Atlantic Ocean seemed an essential thing to do. A long barrage between the Orkney Islands and Norway would be required in order



to 'close' the northern outlet of the North Sea, about 150 sea miles (approx. 275 km). Near the Norwegian coast, the water is 300 metres deep and near Orkney, about 100 metres. Sea currents can reach 3-4 nautical miles/hour. That was a challenge which required the development of a new mine, the MK6. The charge consisted of 300 pounds of grade B trinitrotoluol (TNT). The mine itself was supposed to have a destructive radius of 100 feet (approx. 30m) and to destroy submarines. Estimations showed that approximately 100,000 mines should effectively prevent U-boats from

passing the line. Actually, only about 70,000 mines were laid until October 1918.

By March 1918, mines were already available. Shortly after the placement of the mines, they began to explode. According to a report for the USA Government, between 3 and 4 per cent of 3,385 placed mines blew up prematurely. In the middle section "A", mines were supposed to be placed as it follows: 10 rows of mines at a depth of 80 feet, 4 rows of mines at 160 feet, 4 rows of mines at 240 feet. 20,000 mines were disposed of while the work was in progress. The placement of mines ceased in November 1918 when first signs of the armistice appeared.

Mine sweeping started in spring and ended in autumn 1919. From more than 73,000 mines

- *about 5,000 exploded prematurely soon after having been laid;*
  - *from the remaining approx. 50,000 mines*
  - *more than 30,000 mines were already 'gone' in spring 1919, either drifted away or exploded during winter storms;*
- *20,000 mines were swept in 1919.*

During six months of sweeping, operations consisted of seven sweeping missions involving more than 70 vessels and 10 supply vessels.