

NUCLEAR FREE LOCAL AUTHORITIES
ALL IRELAND 2021

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THE BEAUFORT'S DYKE:

:

A SANE AND LOGICAL CHOICE FOR NUCLEAR
SUBMARINE TRAINING, & CROSS CHANNEL
BRIDGE & TUNNEL CONSTRUCTION?

TIM DEERE-JONES:

MARINE RADIOACTIVITY RESEARCH & CONSULTANCY

timdj@talktalk.net

Beaufort's Dyke :

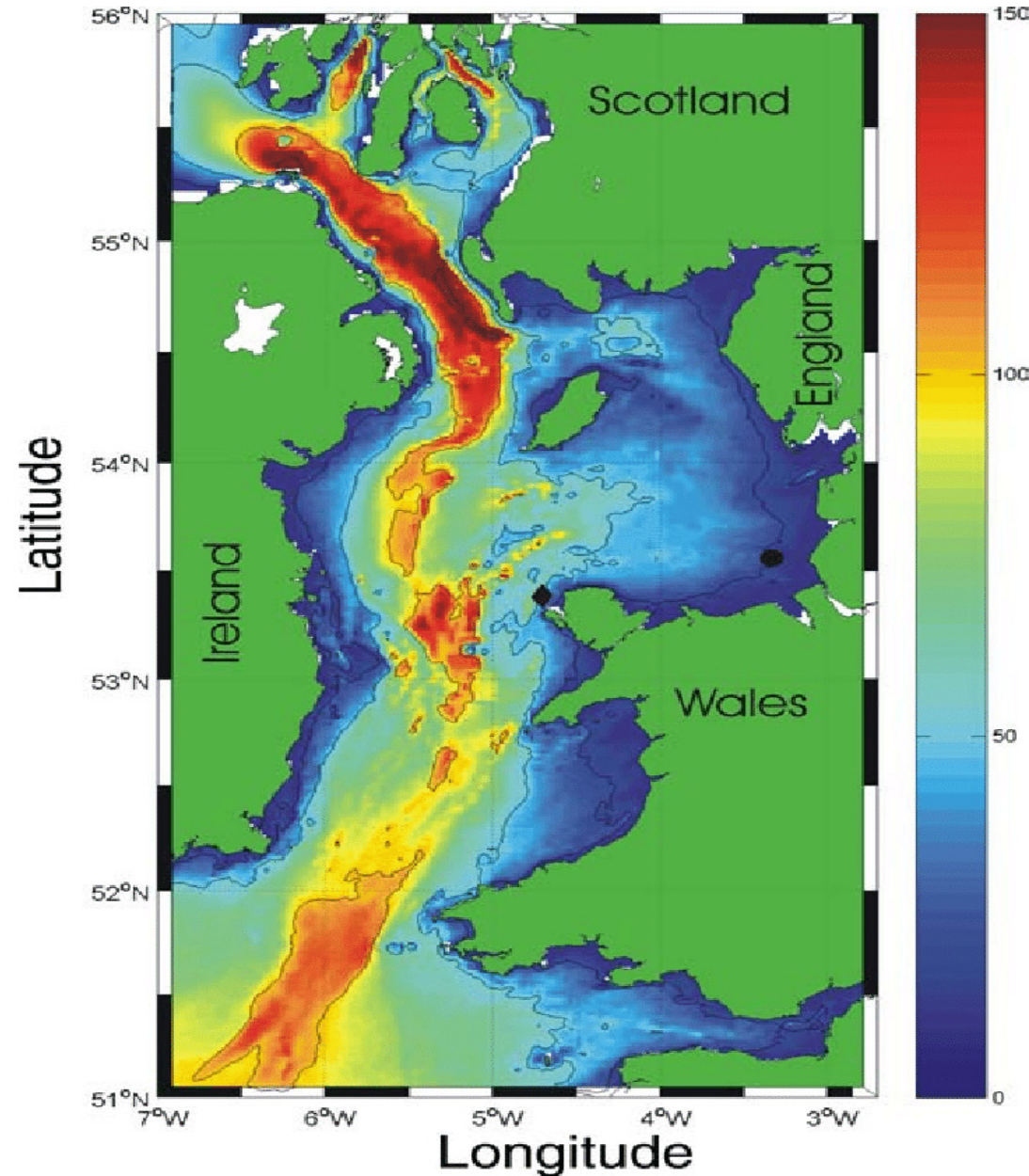
Beaufort's Dyke is THE major seabed feature of the North Channel of the Irish Sea

Lying between Northern Ireland and S.W. Scotland

Beaufort's Dyke is a deep water feature approx 30 miles long and (on average) approx' 2 miles wide

Notable for it's unusual depth (312 metres/1023 ft) and one of the deepest areas of the European continental shelf

Beaufort's Dyke links and connects to a series of other regional deep water features



Significance as a shipping route

- Beaufort's Dyke lies beneath the very busy shipping routes of the North Channel
- Multiple daily and annual vessel movements into and out of the Irish Sea
- Transports too and from North America, northern Europe etc to Irish Sea Ports
- Oil and gas tankers Container ships and car carriers
- General merchant vessels including those carrying nuclear and chemical cargo

- Multiple cross channel ferry routes from England & Scotland to ports in Northern Ireland and Irish Republic
- RoRo and Passenger ferries transit each route up to several times per day throughout the year
- Average about 300,000 vehicles and 1.2 million passengers per year
- Productive fishing grounds are present throughout North Channel and B'fort's Dyke region

Shipping

- Beaufort's Dyke/North Channel identified as the major Irish Sea "CHOKE POINT"
- Geographical constriction
- Intensity of shipping
- Relatively "random" movements of commercial fishing activity
- Complexity of routes and direction of travel: north/south and east/west crossing
- crowded seaway and technically demanding navigation of vessels
- Potential for extreme weather and sea state
- On of UKs more Maritime High Risk Area status
- Traffic separation schemes in operation

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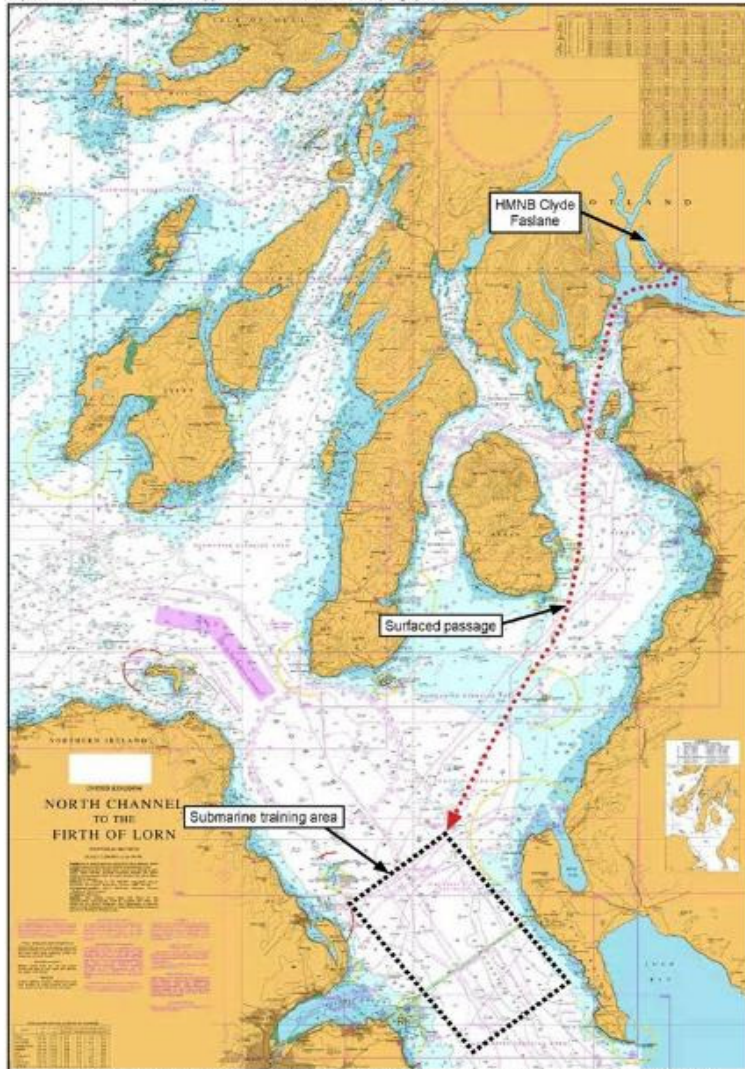


Figure 1: Overview of the submarine's operating base and allocated area for safety training

Submarine Training Area

Beaufort's Dyke is a major feature of UK's nuclear submarine training programme

Long established as a training ground for new crews, and crews returning from leave,

and as a trial ground for post re-fit and maintenance submarine testing prior to full operational patrol duty

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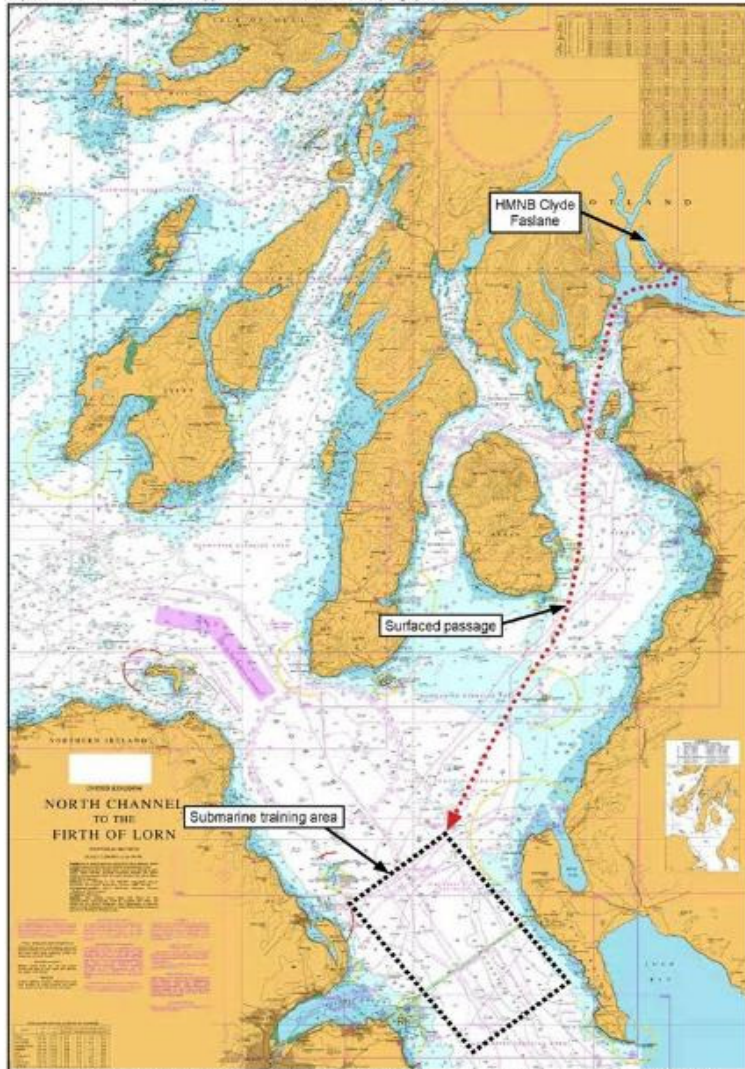


Figure 1: Overview of the submarine's operating base and allocated area for safety training

Beaufort's Dyke is a Submarine Warfare Strategic Asset

The Beaufort's Dyke has been heavily involved in both submarine training exercises and UK and NATO warfare/combined operations training exercises using both conventional and nuclear submarines

Normal routine patrols and exercises involve not only the deployment of "friendly" submarines but also appear to "draw in" hostiles (reported presence of Russian n.subs in the area)

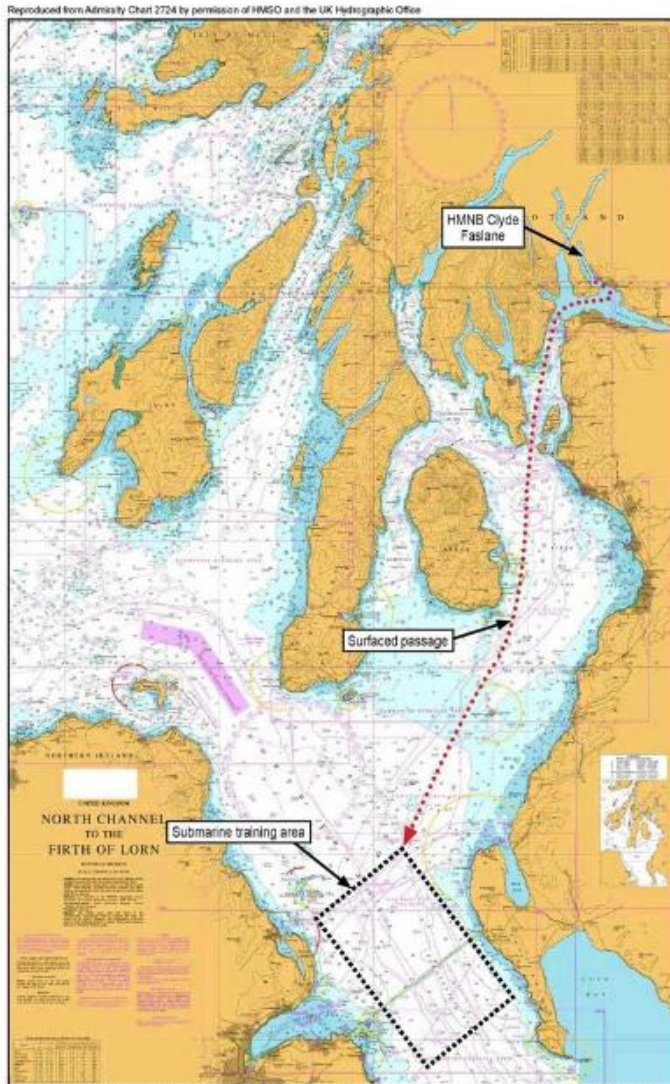


Figure 1: Overview of the submarine's operating base and allocated area for safety training

The use of the North Channel/Beaufort's Dyke area as an N.Sub patrol and training area has led to significant conflicting interaction with other vessels

NFLA is not alone in having commented/campaigned on this issue over a number of years

Most specifically on the issue of repeated destructive interactions between N.Subs and fishing boats: loss of life to crews, total loss of vessels and loss of fishing gear

More recently the Beaufort's Dyke STA was the scene of a very close "near miss" event between a loaded Stena Ferry (*Cairn Ryan/Belfast*) and a UK Nuclear Submarine preparing for operational duties after maintenance work and a change of crew

2020 MAIB investigation found that the N Sub was travelling at speed at periscope depth: that the submarine failed to alter course/take avoiding action and that a collision was narrowly avoided when ferry crew noticed periscope closing at speed and took drastic action (rapid change of course)

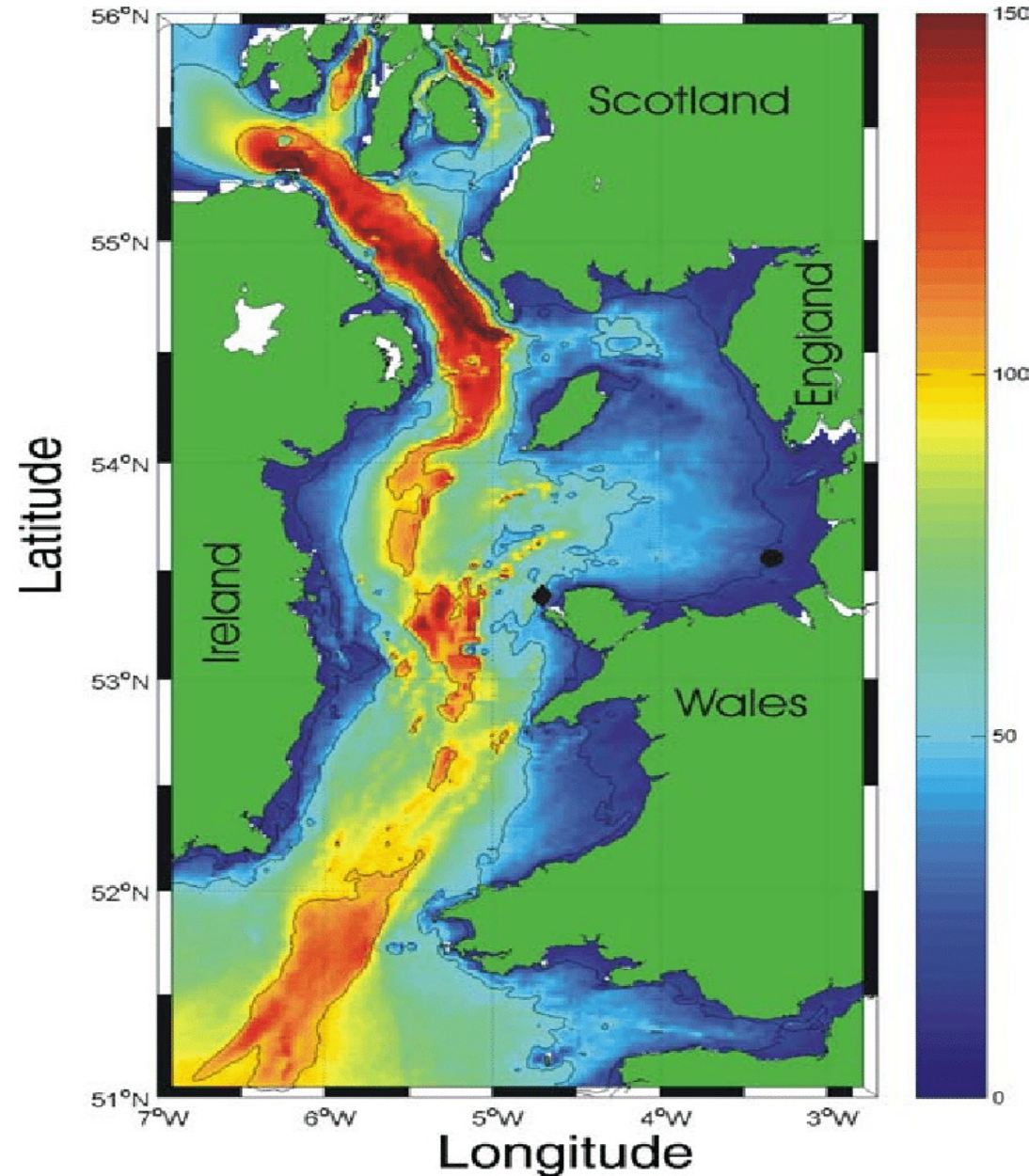
Beaufort's Dyke : Deep water Inter-connectivity

A major requirement of Submarine Warfare is secrecy and concealment

Beaufort's Dyke enables UK N.Subs to access deep water relatively close to the Clydeside home port and "disappear"

Beaufort's Dyke interconnected to deep water features of Irish Sea providing concealed access via Celtic Deep to more southern Atlantic Deeps

Beaufort's Dyke also interconnected to deep water features off Northern Ireland's coast which providing concealed access to more northern regions of Atlantic



Beaufort's Dyke Munitions Dumping

Government confirms that both WW1 and WW2 munitions were dumped at the Beaufort Dyke site

No records until post WW2

1945: 14,000 tonnes phosgene gas shells

1946-1949 (inclusive) 45,000 tonnes per year "conventional" munitions

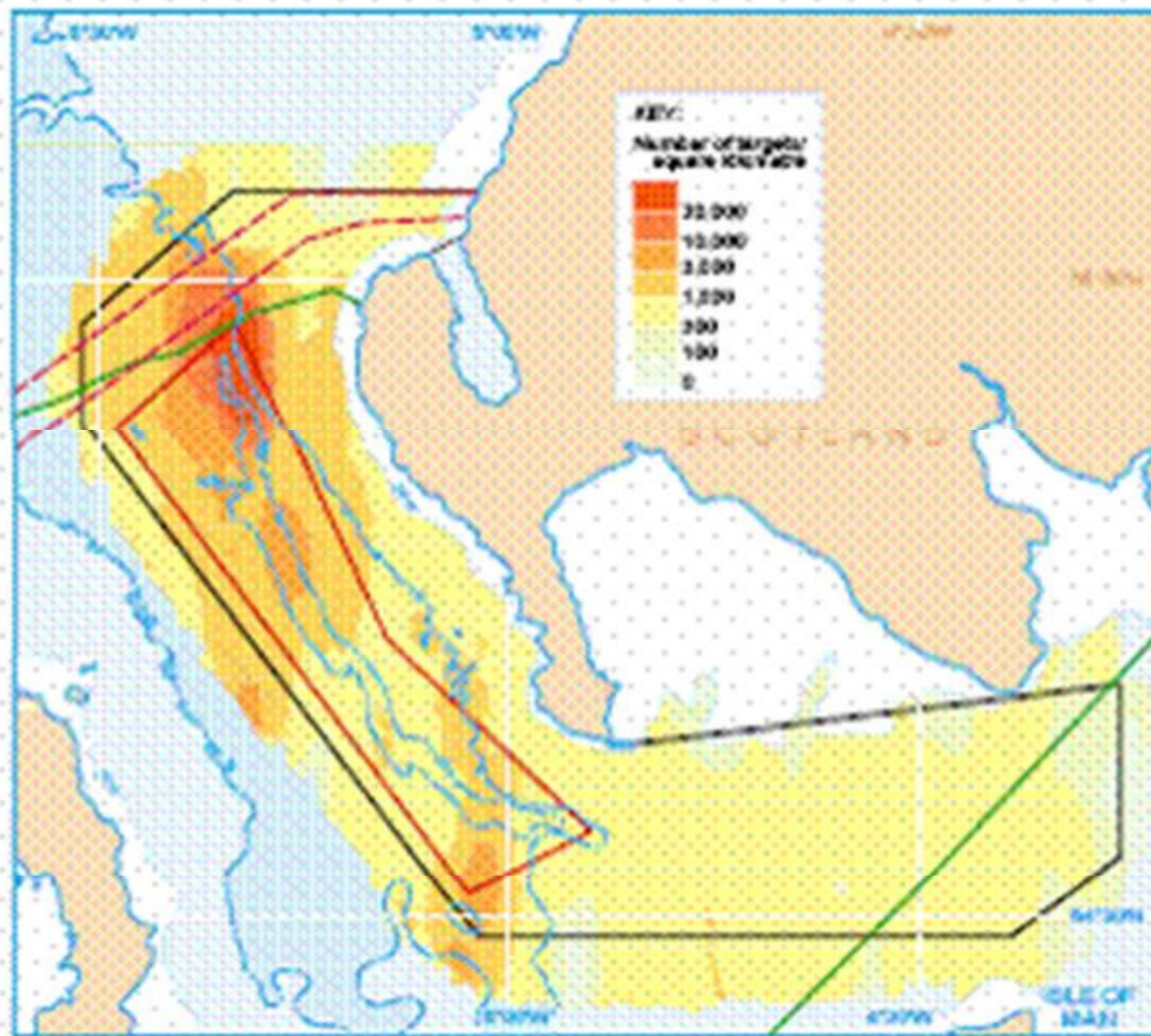
1950 to "late 1950s": 20,000 tonnes per year of additional conventional munitions

Dumping continued into 1970s (decreasing to "about 3,000 tonnes per year)

1976 last dump (un-quantified volume) 40 mm artillery shells

MOD/UK Gov do not deny reports that total weight of dumped munitions = approx 2 million tons

MOD/UK Gov do not deny that much material was "short dumped"



Beaufort's Dyke Munitions Dumping

**MOD/UK Gov do not deny that “conventional weaponry”
includes phosphor bombs,**

**canisters of chemical warfare agents
(*sarin, tabun, mustard gas, cyanide phosgene*)**

Anthrax biological agent

grenades, anti-tank rockets, bullets and explosives

Beaufort's Dyke Munitions Dumping

- Some items of “dumped munitions” have subsequently surfaced and come ashore following storm events
- **And also more significantly following SEABED CONSTRUCTION ACTIVITY**
- 1995 British Gas began laying a gas pipeline across the North Channel after consultation with the MOD in order to plan a “safe” route
- Following MOD advice British Gas chose a route north of the designated dump site
- But only three days after starting the seabed work phosphorus bombs began to surface and come ashore on local coasts
- British Gas underwater video footage showed phosphor bombs and other metallic wastes lying next to the pipeline OUTSIDE the designated dump site
- Over 4,500 phosphor bombs recovered from regional shorelines along the Scottish coasts
- 1 person was burned after handling one

Beaufort's Dyke: seabed explosions!

The British Geological Society seismic recorders have over many years, detected seabed explosions in the Beaufort's Dyke

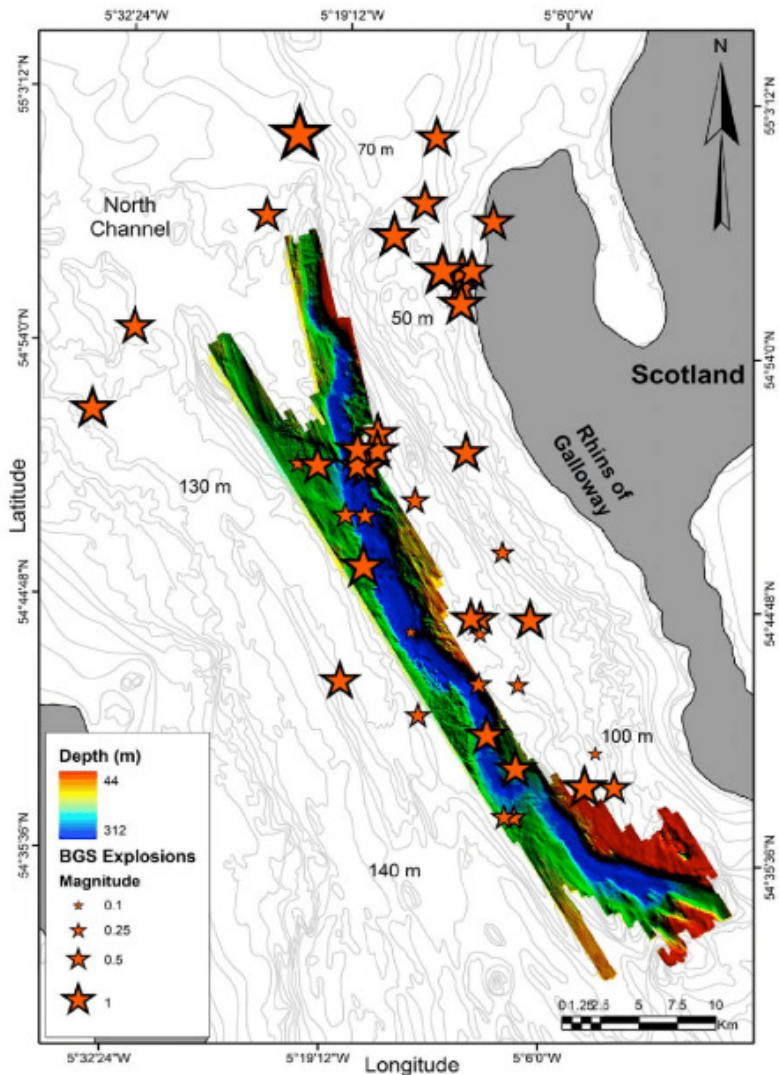
These are confirmed as "explosions" and NOT seismic activity

While BGS confirm that their list of explosions is not complete, it is confirmed that BGS had detected 47 "significant" explosions up to 2004

BGS assume that these significant explosions are due to bombs and anti tank munitions rather than smaller munitions such as grenades and light artillery shells

According to the BGS the maximum force explosions detected were equivalent to around 5 and 5.6 tonnes of TNT

Potential impact on N. Subs and/or proposed tunnels or bridges likely to be catastrophic



Beaufort's Dyke Radioactive Waste Dumping

After initial strenuous denials UK Government confirmed that the Beaufort 's Dyke has been used as a dump site for radioactive wastes:

No mapping exists of rad waste dump site but assumed that it is the same area as the munitions dump

Poor record keeping BUT evidence for dumping of

radioactive laboratory waste

Radioactive luminous paint

Radium coated luminous aircraft dials

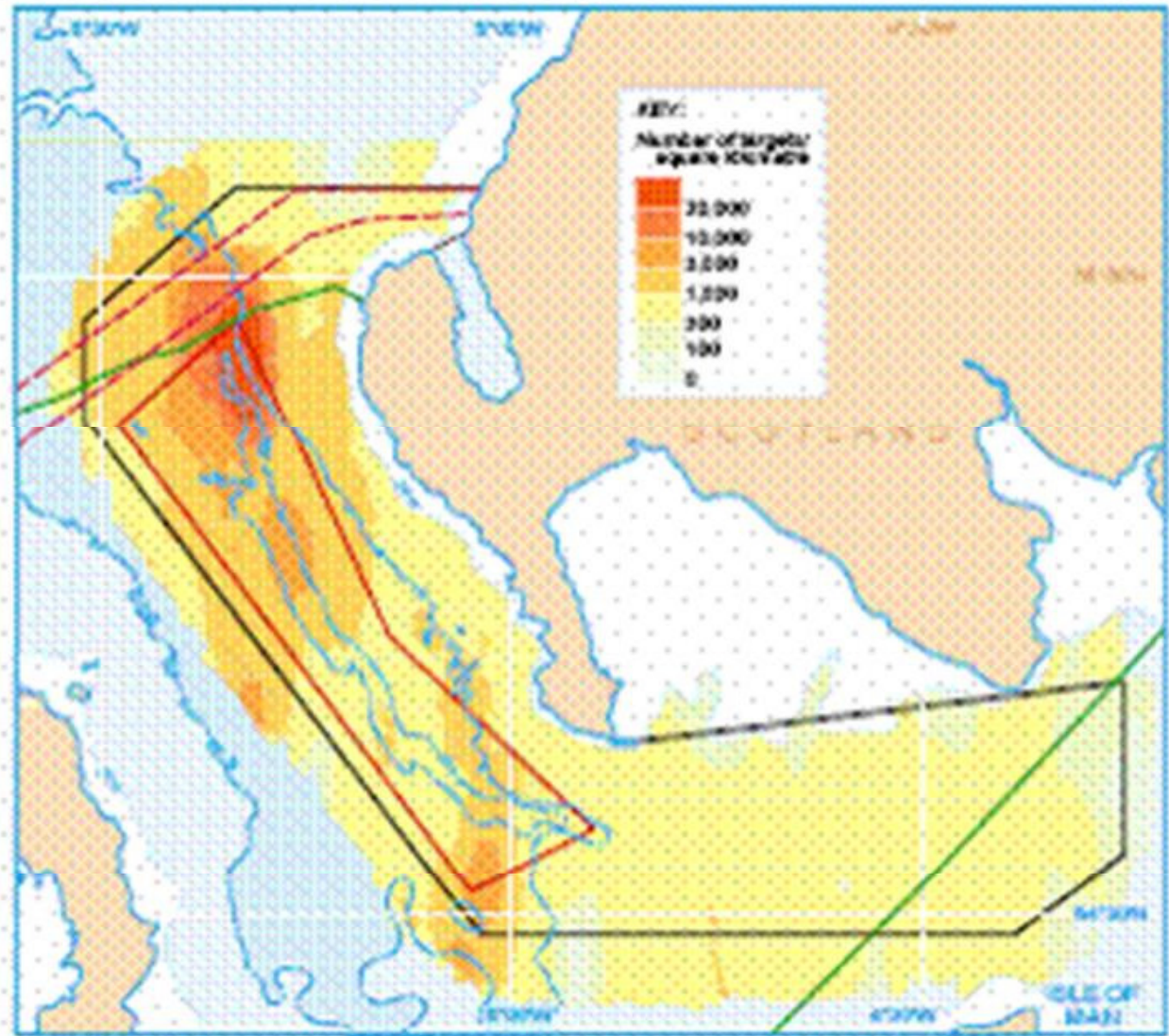
Radioactive antistatic devices

Contaminated "rubble"

"radioactive accident waste"

Radioactive Caesium 137 (gamma), Strontium 90 (beta), Polonium (alpha) sources

Other "sources" likely but not confirmed



Bridges and Tunnels (Seriously???)

- Beaufort's Dyke/North Channel is already a region of major conflicting and unsolved issues which needs no additional complication
- Hard rock tunnelling : unlike Channel Tunnel
- Major route diversions and extensions would be needed
- to avoid the risk of contact with explosions, seabed dumped munitions and radioactive wastes

- Both ideas uncostered and looking like a massive sinkhole of public money
- London's Millenium Bridge : HS2 with it's ever ballooning cost and unforeseen environmental destruction: HPC, Trident expansion etc
- Best to assume/hope these proposals were merely Politicians vanity schemes and that they will continue to sink into obscurity as they currently seem to be doing!!!!!!!