

Subject: Request for information of the number of deaths in Scotland between 2002 and 2020.

FOI reference: 202100240802

Date received: 16 September 2021

Date responded: 12 October 2021

Information requested:

Between 2002 and 2020 can you supply number deaths in Scotland where DVT/PE/VTE are mentioned as a contributory to death on a year by year basis please.

Further clarification determined that the causes were specifically deep vein thrombosis (DVT), pulmonary embolism (PE), and venous thromboembolism (VTE).

NRS Response:

Enclose is a copy of all of the information requested.

Deep vein thrombosis (DVT) has been taken to refer to thrombosis of the deep veins of the leg. Deaths from DVT frequently occur from complications of the DVT, principally pulmonary embolism, so deaths from pulmonary embolism have been included in these figures.

The International Statistical Classification of Diseases and Related Health Problems, Tenth Revision (ICD-10) system, which is used in the UK to classify deaths, does not allow deep venous thrombosis to be separated from phlebitis (inflammation of a vein), so these figures may include a small number of deaths due to phlebitis.

Deep vein thrombosis has been defined in our answer by the following ICD-10 codes:

- I26 - Pulmonary embolism
- I80.1 - Phlebitis and thrombophlebitis of femoral vein
- I80.2 - Phlebitis and thrombophlebitis of other deep vessels of lower extremities
- I80.3 - Phlebitis and thrombophlebitis of lower extremities, unspecified
- I80.9 - Phlebitis and thrombophlebitis of unspecified site
- O22.3 - Deep phlebothrombosis in pregnancy
- O87.1 - Deep phlebothrombosis in the puerperium
- O88.2 - Obstetric blood-clot embolism

Phlebitis (inflammation of a vein) and thrombophlebitis (clotting and inflammation) are combined in the various sub-categories of ICD-10 code I80, which is where deep venous thrombosis of the leg is coded. However, pregnancy is an exception. For DVT in pregnancy, ICD-10 code O22.3 specifies deep-vein phlebothrombosis (DVT) before delivery, and ICD-10 code O87.1 DVT after delivery.

DVT on its own is an unlikely cause of death, generally becoming life threatening when embolism occurs, usually to the lung. Pulmonary embolism is usually due to deep venous thrombosis, so has been included in the figures provided.

Venous thromboembolism (VTE) occurs when a blood clot (thrombus) forms in a vein, becomes detached and travels to another site in the circulation (embolism), causing obstruction of the circulation. ICD10 codes, used to produce mortality statistics, group phlebitis (infection of a vein) and thrombophlebitis (clots in a vein) in the same category, which does not specify whether embolism occurred.

VTE has been defined in our answer as using the following ICD-10 codes for causes of death:

- I80 - Phlebitis and thrombophlebitis
- I82 (excluding 182.0) - Other venous embolism and thrombosis
- O22.3 - Deep phlebothrombosis in pregnancy
- O22.9 - Venous complication in pregnancy, unspecified
- O87.1 - Deep phlebothrombosis in the puerperium
- O87.9 - Venous complication in the puerperium, unspecified

It should be noted that all of these figures may be underestimates of the true number of deaths from VTE, as VTE is believed to be substantially under-diagnosed.

Please note that our statistical database provides information about the numbers of deaths for which a particular medical condition was the underlying cause, and for which it was a contributory factor. These terms are defined in a note entitled "The bases on which figures can be produced", which is available from our website at <http://www.nrscotland.gov.uk/statistics-and-data/statistics/statistics-by-theme/vital-events/deaths/deaths-background-information/death-certificates-and-coding-the-causes-of-death>. Figures have been included for where these causes were mentioned in any way (contributory or underlying cause) as well as just underlying cause alone. This information provides context to the numbers presented.