# Heart screening for all 11-35yr olds who play sport

Y Pwyllgor Deisebau | 11 Medi 2023 Petitions Committee | 11 September 2023

**Reference:** SR23/6132/3

Petition Number: P-06-1351

**Petition title**: To bring in availability of heart-screening for all 11-35yr olds who play Sport.

**Text of petition:** Out of 269 sudden deaths in young people, 49 occurred in competitive athletes with undiagnosed heart conditions.

It is important to note that heart-screening has been compulsory in all teenagers and adults competing in athletic sports in Italy since 1982, with other European countries offering similar screening. Wales and the UK lacks sadly behind here. It would be good to see Wales taking the UK lead in this.

Based on our current ECG heart-screening sessions, we found that 1 in 4 screenings revealed the need for further investigation with an Echo Cardiogram.



## 1. Background

#### Cardiac (heart) screening

Screening examinations are tests performed to find disease before symptoms begin. The goal of screening is to detect disease at its earliest and more treatable stage. Cardiac screening is a diagnostic test used to detect and evaluate heart disease. All screening tests have the potential to cause harm as they carry a risk of false results.

Routine cardiac screening to detect an underlying cardiac condition is not provided by NHS Wales. Some charities such as <u>Calon Hearts</u> offer cardiac screenings for people aged 16 years and upwards.

The screening to diagnose cardiac abnormalities is done by having an ECG (electrocardiogram) test, which records the electrical activity of the heart. If a more detailed image is required, an ultrasound scan of the heart - an echocardiogram, is needed. From this, measurements are taken which give a guide to heart muscle thickness and the size of the chambers of the heart.

#### Cardiac screening policy in the UK

The UK National Screening Committee (UK NSC) advises Ministers in the four UK countries about all aspects of population screening. **Unselected whole-population screening to prevent sudden cardiac death in 12 to 39-year-olds has been considered by the UK NSC and is not recommended**.

<u>Sudden Cardiac Death</u> (SCD) is the sudden and unexpected death of a person caused by a problem with their heart. The causes in people under the age of 39 are often a thickening of the heart muscle or an electrical problem with the heart. In older people, it is more likely to be caused by a narrowing of the blood vessels that supply the heart.

The UK NSC concluded the harms of whole-population screening for SCD currently outweigh the benefits. There are uncertainties about the overall benefits of identifying people with risk factors; current tests are not reliable enough (many people would be missed and provided with false reassurance, and many would be given false positive results), and there is currently no agreed treatment for someone who has been identified at risk.

The UK NSC has published an <u>evidence summary</u> setting out the evidence on which its current recommendation is based.

The latest review was completed by the UK NSC in December 2019 and the **next review** is estimated to be completed in 2023/24.

#### 2. Welsh Government action

The letter from the Minister for Health and Social Services to the Petitions Committee on 7 August 2023 states that given that the UK NSC does not recommend whole-population screening for SCD for 12 to 39-year-olds due to the inaccuracy of current testing, the Welsh Government cannot introduce screening for all those in this age group.

The UK NSC keeps all its policy positions under regular review and the Minister notes that the Welsh Government would consider its position if these were subject to change.

The Minister states that population screening programmes should only be offered where there is clear evidence that screening will do more good than harm. The Minister says in the letter:

Population screening programmes generally can save lives through early risk identification but can also do harm by identifying risk factors that would never otherwise develop into a serious condition or complication. Screening programmes may have false negative results, so do not guarantee protection. Additionally, receiving a low risk result does not prevent the person from developing the condition at a later date.

For families of individuals who have suffered sudden cardiac death, the Minister advises that they should be offered individual clinical assessments to assess their risk. Additionally, young people who have symptoms or concerns, particularly if they are very physically active, should speak to their GP who will be able to advise them as appropriate.

### 3. Previous Petitions Committee action

The Committee considered petition P-06-1197 'Heart screenings free for all 11-35 year olds who represent their school or county in sport in November 2021 and the petition was considered to be completed at its meeting on 24 January 2022.

The Committee agreed that there was little more the Committee could do to take the petition forward and referred to the guidance issued by the UK NSC that it does not recommend the screening called for in the petition.

Every effort is made to ensure that the information contained in this briefing is correct at the time of publication. Readers should be aware that these briefings are not necessarily updated or otherwise amended to reflect subsequent changes.