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Is it time to end the use of imperial measurements?

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When a baby is born in the UK, one of the first questions asked is about their weight, to which people often reply using pounds and ounces. So, why is this potentially problematic? When the UK joined the EU, formerly the European Economic Community, in 1973, the agreement included a commitment that it would undertake full metric conversion for measurements and weights. This became enshrined in law in 1985 under the Weights and Measures Act 1985 and supported by a further order in 1994 (HM Government, 1994). This combination of legislation and organisation membership has not been enough for the UK to fully convert to metric units and there are still examples of imperial units being used even though it is 48 years since the UK joined the EU. For example, when driving in the UK, distance is measured in miles and speed in miles per hour, which are both imperial measurements, rather than kilometres, although height restrictions are displayed in both systems. Healthcare documents request metric unit measurements, which allows for consistency and transparency, along with ease for calculating medication dosage. The move to electronic documentation has simplified this process. However, when using paper-based documentation staff may not always adhere to this, by, for example, writing a person's height in feet and inches. What impact does this have on healthcare? One key element is communication, which is a critical component of patient care for both the patient and their relatives, with failures in service and poor care often related to poor communication (Care Quality Commission, 2020). Perhaps to minimise any issues, we should use only metric measurements and weights in a healthcare setting, which would help provide consistency for everyone. The NHS relies on staff from outside of the UK who predominantly work with metric measurements and expect to continue this, but are often confronted with staff using a hybrid approach, which could cause misunderstandings and errors. Martin et al (2019) found that in a decade of retrospective analysis within the UK, there were 2627 health information technology failures that led to safety events. Perhaps similar research is needed to assess any issues linked with measurements and their communication, especially aspects related to the use of imperial measurements alongside accepted metric units. Generally, a person's height does not fluctuate as much as their weight, so one might expect people to know their height in metres or centimetres, but how many do? This relates to patient safety when we must calculate medications based on measurements. If we must also convert them this can lead to errors. A more effective solution would be to always measure a person's height and weight using the metric system and consistently inform them of these measurements so that people become accustomed to them. Patient harm has occurred where the incorrect units have been used (Slight et al, 2019). Removing a whole set of imperial units from our practice could be one solution. The introduction of electronic systems to support medicine administration can enable uniformity, but often different organisations will have different systems and some areas have not yet fully migrated to an electronic system. If we make some adjustments to our professional conversations by referring to metric measurements with the appropriate units, we can likely improve consistency. It may take some time to adjust but, as with any system change, once implemented it can become commonplace. And this is not a new system, but is more than 25 years since it should have been firmly in place. Communication is fundamental for safe and effective care. Why do we simply not fully embrace metric measurements and remove another potential variable for error from our discussions?

Care Quality Commission. 2019 adult inpatient survey. 2020. <https://tinyurl.com/yam8blhn> (accessed 14 January 2021)

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