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**How well do clinical students know the dermatomes?**

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Familiarity with the dermatomes is important in clinical practice, especially in determining the level of compression in radiculopathy or spinal cord injury. This study aims to assess the knowledge of dermatomes in 177 fifth-year medical students at the University of Cambridge. At an anatomy revision session, they first completed a questionnaire about relevant teaching and their perceived confidence in knowledge of the dermatomes, from 0 (not at all confident) to 8 (very confident), and were then asked to draw anterior and posterior dermatome maps on a diagram. No opportunity for revision was given and the task had to be completed in 5 minutes. Data were tabulated and analysed using Microsoft Excel 2013 and Stata/IC14. Results showed that anterior dermatomes were attempted by 168/178 (94%) students and posterior dermatomes by only 36/178 (20%). Of these 36, 17 labelled dermatomes above T4, but without areas supplied by C5-8. The following regional dermatomes were correctly drawn: upper limb (with the middle finger as C7 and others arranged accordingly) by 58%; trunk (with the nipple at T4 and umbilicus at T10) by 44%; lower limb (with L4 and L5 on medial and lateral calf respectively, and S1 on plantar foot and/or posterior calf) by 25%; and perineum (concentric circles with S3, S4 or S5 represented) by 60% of students. The mean ‘perceived confidence’ score was 3.64/8 (SD=1.58). This was significantly higher in students who correctly traced upper limb dermatomes (3.88 *vs.* 3.32, *p=0.019*). It was also higher for students who correctly traced lower limb, trunkand perineal dermatomes, but the differences were not statistically significant. Students who had revised dermatomes in the past 6 months and those who had been taught in the past 12 months were more likely to accurately label all regional dermatomes, although this did not reach statistical significance. Overall, these results would indicate that medical students lacked confidence in their knowledge of dermatomes. Possible reasons include the existence of conflicting dermatome maps, difficulty in appreciating the importance of dermatomes, and lack of use prior to clinical placements. Recommendations for ways to improve this knowledge in anatomy teaching will be discussed.