HYPOVITAMINOSIS D IN HOSPICE PATIENTS IN A CAUCASIAN WEST MIDS LANDS POPULATION

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Introduction Our hospice multi-disciplinary team was challenged by failing to deliver adequate pain relief to an elderly anicteric woman with locally advanced cholangiocarcinoma but with no known bone metastases. She was immobilised by severe knee pain resistant to optimal pain pathway prescribing and Allied Health Professional support. The patient was placed in a nursing home due to her immobility. Subsequently her serum vitamin D (VitD) was reported undetectable, and symptoms were explained by osteomalacia.

Aims and Methods To test patients with clinical symptoms and susceptible disease profiles for VitD deficiency. Serum VitD levels of 16 caucasian hospice patients (6 female; 10 male) with symptoms suggestive deficiency were compared to 10,474 caucasian hospital patients (7,140 female; 3,334 male) in the same 10 month period.

Results Hospice median VitD was 11.65 μg/L (Interquartile Range = 6.66 - 15.25) (sufficient >20 μg/l; insufficient 6-20 μg/L; severe deficiency <6μg/L) This differed significantly from the hospital median VitD of 16.50 μg/L (Interquartile Range = 9.70 - 33.40;) Mann-Whitney p=0.016. Age and gender distribution differed between the two groups but controlling for this with a general linear model the difference in VitD remained significant (p value=0.011).

Conclusion Hospice patients had lower VitD levels than hospital patients, despite the differences in age and gender. Resistant pain is a common problem in hospice patients and may lead to unnecessary morbidity and institutionalisation. As part of holistic care VitD deficiency requires exclusion as a cause of morbidity in patients with pain and susceptible disease profiles. Its incidence in hospice patients warrants further investigation.