

University of Wollongong

Research Online

Faculty of Social Sciences - Papers (Archive)

Faculty of Arts, Social Sciences & Humanities

2008

Does the detection of Hepatitis C match the distribution of methadone prescriptions and multiple deprivation in Scotland?

Thomas E. Astell-Burt

University of Wollongong, thomasab@uow.edu.au

Robin Flowerdew

University of St Andrews, r.flowerdew@st-andrews.ac.uk

P J. Boyle

University of St Andrews

J F. Dillon

Ninewells Hospital

Follow this and additional works at: <https://ro.uow.edu.au/sspapers>



Part of the [Education Commons](#), and the [Social and Behavioral Sciences Commons](#)

Research Online is the open access institutional repository for the University of Wollongong. For further information contact the UOW Library: research-pubs@uow.edu.au

Does the detection of Hepatitis C match the distribution of methadone prescriptions and multiple deprivation in Scotland?

Abstract

Abstract presented at the British Society of Gastroenterology Annual General Meeting, 10-13 March 2008, Birmingham, United Kingdom

Keywords

detection, prescriptions, deprivation, methadone, distribution, match, scotland, c, multiple, hepatitis, does

Disciplines

Education | Social and Behavioral Sciences

Publication Details

Astell-Burt, T. E., Flowerdew, R. T., Boyle, P. J. & Dillon, J. F. (2008). Does the detection of Hepatitis C match the distribution of methadone prescriptions and multiple deprivation in Scotland?. *Gut*, 57 (Suppl 1), A108.

Does the detection of Hepatitis C match the distribution of methadone prescriptions and multiple deprivation in Scotland?

¹TE Astell-Burt, ¹RT Flowerdew, ¹PJ Boyle, ²JF Dillon.

¹*School of Geography and Geosciences, University of St Andrews, St Andrews;* ²*Ninewells Hospital and Medical School, Ninewells Hospital, Dundee, UK*

Introduction: By December 2006, approximately one in 260 of Scotland's population had been diagnosed with Hepatitis C. It is estimated that the number of people infected with Hepatitis C remaining undiagnosed exceeds those known by a factor of 1.5. The lowest rates of referral of Hepatitis C patients are in more remote, rural locations. Some geographical factors that might explain this could be: poorer Hepatitis C screening practices; poorer access to treatment centres; and a lower exposure of rural populations to the major risk factors. Recent work in France suggests that geographic access to medical care may affect the diagnosis of Hepatitis C.¹ Unfortunately, that research did not control for the substantial difference in the number of Hepatitis C diagnoses expected between urban and rural areas, due to injecting drug use.

Aims & Methods: This paper tests the spatial inequality of Hepatitis C detection and the likely distribution of injecting drug use in Scotland. Negative binomial regression methods are used to examine the detection of approximately 20 000 Hepatitis C antibody positive tests and surrogate indicators of injecting drug use: (1) area deprivation; (2) methadone prescriptions.

Results: Positive relationships were found between Hepatitis C antibody positive tests, deprivation, and methadone prescriptions in increasingly urban areas.

Conclusion: Hepatitis C has been detected throughout Scotland, but is not evenly spatially distributed. People diagnosed with Hepatitis C are likely to live in urban areas characterised by high levels of deprivation and high numbers of methadone prescriptions. This information will be used in a follow-up study, building on and increasing the sophistication of previous research, which questions whether geographic access to healthcare influences the detection of Hepatitis C in Scotland.

1. Monnet E, Collin-Naudet E, Bresson-Hadni S, et al. Place of residence and distance to medical care influence the diagnosis of hepatitis C: a population-based study. *J Hepatol* 2006;44:499–506.