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Proportions of different types of fat consumed by the Scottish population: 2001–2010

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Total fat intake and the ratio of saturated to unsaturated fats have implications for population health. Evidence based Scottish Dietary Targets (SDTs)⁽¹⁾ focus on total and saturated fat intake and as such these are the only 2 fat indicators that are currently monitored in Scotland⁽²⁾⁽³⁾.

UK Living Costs and Food Survey (LCF) (Expenditure and Food Survey (EFS) until 2008) household food purchase data for Scotland was analysed to estimate total, saturated, monounsaturated and polyunsaturated fat intakes over the period 2001 to 2010. In addition, differences by socioeconomic status were examined, measured by the Scottish Index of Multiple Deprivation (SIMD). Adjustments were made for waste⁽⁴⁾ and data were analysed using general linear models within the complex samples module of SPSS (SPSS Inc., Chicago, IL, USA) weighting to the Scottish population and taking account of sampling methods. Results are presented as percentages of food energy, as population means (i.e. consumers and non-consumers) estimated from household and eating out food purchases.

Type of Fat	DRV ¹	Percentage (%) Food Energy		Change Between 2001 & 2010	P for Linear Association	Difference by SIMD ² n 5484 wt n 50200
		2001 n 619 wt n 5015	2010 n 464 wt n 5109			
Total	35% Food Energy	38.8%	38.7%	None	0.783	None
Saturated	11% Food Energy	15.5%	15.0%	↓	0.005	None
Monounsaturated	13% Food Energy	14.1%	14.9%	↑	<0.001	None
Polyunsaturated	6.5% Food Energy	6.6%	6.3%	None	0.406	None

¹Dietary Reference Values for Adults (Department of Health, 1991).

²SIMD = Social Index of Multiple Deprivation, for combined years 2001–2010.

n refers to the number of households and weighted wt n refers to the weighted number of people in the sample.

The results highlight that over the period of 2001 to 2010 total fat intake of the Scottish population has not changed and is above that desirable for health. The proportions of saturated and monounsaturated fat have moved in a favourable direction, but both remain above the DRV's. However polyunsaturated fat intake is similar to the DRV. Whilst differences have been found in the consumption of foods high in fat and saturated fat (e.g. red meat products, whole milk and takeaway foods), with the most deprived households consuming more than the least deprived, no differences were found in the intakes of each of the different fats by quintiles of SIMD. This suggests that there are other foods high in total and saturated fat that are not currently targeted in health promotion campaigns and investigation of this forms part of future work to inform policy.

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