

Canadian Food Dollar:

Breakdown between the Farm Share and the Marketing Bill

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INTRODUCTION

The farm share and marketing bill provide a valuable snapshot of the dynamics of the agri-food supply chain, changing consumer demands, and the resultant value distribution of the retail food dollar.

Motivation for recent interest in the farm share metric include:

- How have recent rises in nominal agricultural commodity prices affected retail food prices and value distribution?
- Why has Canada experienced relatively low food inflation rates compared to global indices?

KEY DEFINITIONS

Food Dollar [Expenditure]: Annual purchases, by people living in Canada, on food products that are produced on a Canadian farm or are processed at a Canadian food manufacturer.

Farm Share: Average payment from each dollar of food dollar expenditure that is received by farmers for raw agricultural commodities.

Marketing Bill: Average value added to raw agricultural commodities for each food dollar expenditure.

METHODS

The techniques developed by Patrick Canning (2011) were applied to Canadian Input-Output data from Statistics Canada. The method is based around three primary steps.

Step 1: Import-inclusive Gross Farm Sales

Trace the domestic demand for food to the value of the agricultural commodities required to produce it. This requires a total requirements (Leontief) matrix.

Step 2: Import-inclusive Net Farm Sales

Subtract direct and indirect farm-to-farm sales to avoid double counting the value of agricultural commodities.

Step 3: Domestic Farm Share

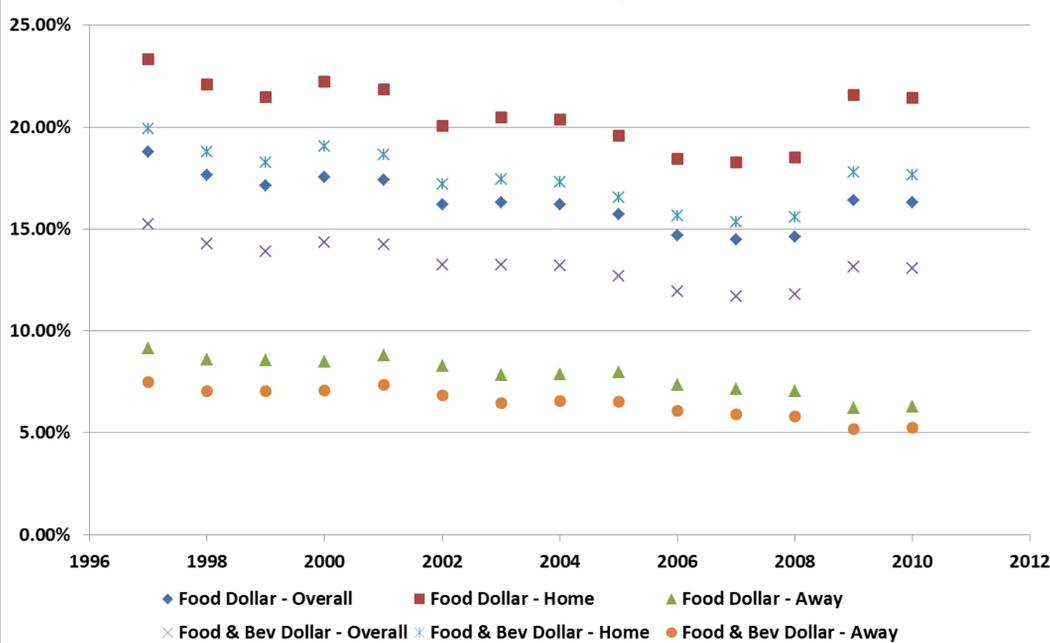
Reduce net farm sales by the demand for agricultural commodities that is fulfilled with imported product. Divide this value by import-exclusive demand for food.



CANADIAN RESULTS

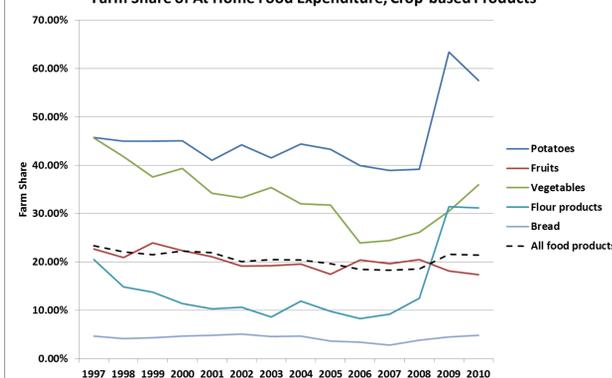


Canadian Farm Share Values, 1997 to 2009

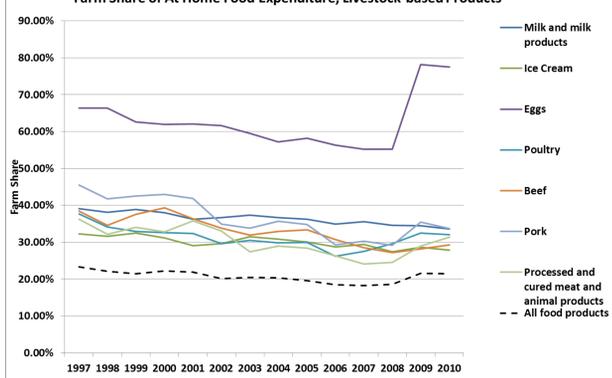


From 1997 to 2009, there is a slight decreasing trend in all farm share measures, but year-over-year variability exists. Farm share of the food and beverage dollar (includes soft drinks and alcohol) is lower than its food-only counterpart. Note: the structure of Canadian Input-Output data was changed significantly between 2008 and 2009, so comparisons across this period must be done with caution.

Farm Share of At Home Food Expenditure, Crop-based Products



Farm Share of At Home Food Expenditure, Livestock-based Products



One possible explanation for the decreasing farm share is a shift in food products being purchased. This motivated a farm share analysis for specific food products. From these results, a few patterns emerge:

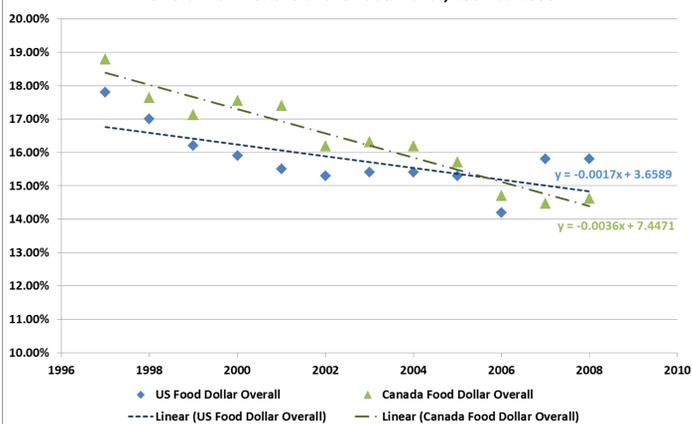
- Products that involve more processing tend to have lower farm shares
- Variation exists among commodity categories with dairy and meat generally higher than produce and grains

Among these select food commodities, it is notable that only grain products are consistently lower than the overall farm share. Therefore, consumer purchases of food products with more value-added must be contributing to the overall result.

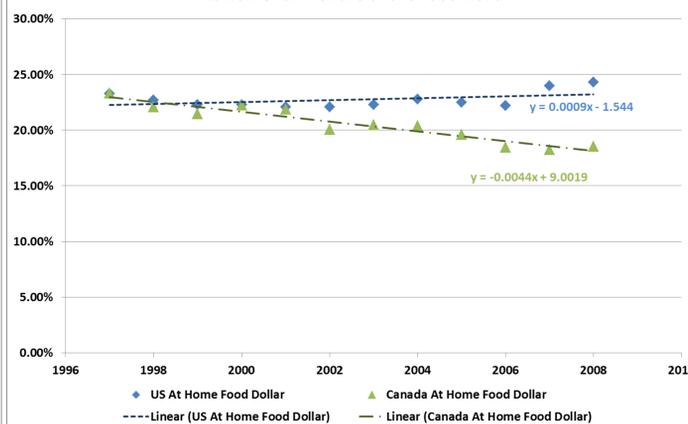
CANADA VERSUS US COMPARISON



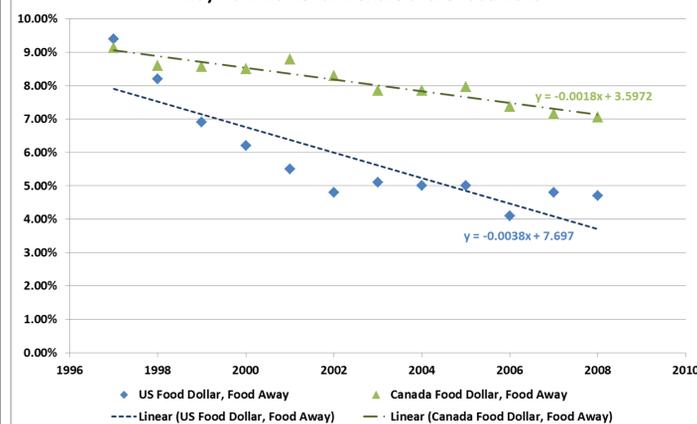
Overall Farm Share of the Food Dollar, 1997 to 2008



At Home Farm Share of the Food Dollar



Away from Home Farm Share of the Food Dollar



The overall farm share values are declining in both Canada and the US, but when decomposed into food at home and food away, there are distinct trends. The steady at home farm share for the US suggests that the overall decline is driven by a demand substitution from at home consumption to consumption away from home. In Canada, declines are evident in both at home and away from home farm shares, so the driver of the overall decline is uncertain.

NEXT STEPS & FUTURE RESEARCH

- Further explore the underlying reasons for the declining farm share in Canada, such as potential links between input costs and farm share.
- Further explore the underlying reasons for the contrasting Canadian and US results for at home versus away from home farm share