Crowding-out and **impoverishing effect of tobacco in Mexico.**

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The crowding-out and impoverishing effect of tobacco in Mexico

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1. Key Messages

- In Mexico, tobacco consumption crowds out spending on essential goods and services like education and health care while increases expenditure on harmful goods like alcoholic beverages.

- Lower-income households are most impacted by crowding out, as they see the greatest reduction in expenditure on health care and education. An increase in tobacco expenditure can have long-term impacts on the well-being of household members, especially children, when less is spent on education and health care. This hampers their ability to generate income in the future, increasing the likelihood they will fall into poverty.

- Tobacco control policies are effective at reducing consumption. The additional revenue from tobacco taxes can be used to fund implementation of comprehensive tobacco control policies aimed at maximizing smoking cessation and channeling more resources into the health and education sectors.

- Tobacco use increases extreme poverty in Mexico. About one million Mexicans—who would not otherwise fall below the official extreme poverty line due to their income level—are unable to cover their basic needs because of spending diverted to tobacco. Smoking results in a 1.8 percent increase in the number of people living in extreme poverty in Mexico.

2. Executive Summary

Smoking is a global problem that affects about 1.3 billion people and has harmful effects not only on health but also on people's current and future financial situations and quality of life.

Spending on tobacco crowds out household spending on other goods and services. In Mexico, spending on tobacco results in decreased spending on essential goods and services, like education and health care, and increased spending on harmful goods such as alcoholic beverages. These effects are common across all income levels but are more pronounced in low-income households. When spending on tobacco increases, for example following regular price increases made by tobacco industry, the crowding out effect is exacerbated.

In addition, smoking has an impoverishing effect on population. This is because some families find that their remaining income level falls below the poverty line after deducting money spent on tobacco (a concept known as secondary poverty). In Mexico, 909,132 people are left with a disposable income level below the extreme poverty line because of expenditure on tobacco and smoking-related diseases.

Tobacco control policies succeed in reducing tobacco consumption. Reductions in tobacco spending free up income that households can use on health, housing, and education. Fiscal measures are not only effective in reducing the prevalence and consumption of tobacco, but also allow generating additional revenue that can finance the implementation of comprehensive tobacco control policies aimed at cessation, as well as the health and education sectors.

3. Introduction

Smoking is a global problem that affects 1.3 billion people, around 80% of whom live in low- or middle-income countries (World Health Organization, 2020). Smoking is not just a health problem; it also poses economic and social challenges. From the perspective of economic growth and development, smoking translates into a less healthy and therefore less productive workforce, growing health care costs, and environmental degradation (Hussain, et al., 2018).

While higher-income individuals spend a higher amount on tobacco, low-income smokers spend a higher proportion of their income on tobacco (Nguyen & Nguyen, 2020). This reality has several implications on the distribution of household expenditure. First, lower-income households are not always able to afford the cost of treating diseases caused by smoking and may therefore experience worse health outcomes. Second, tobacco expenditure distorts spending on other household expenses.

Given limited household budgets, spending money on tobacco can mean less money is available for food, education, health care, and other goods and services essential for human development. This displacement of spending is known as the crowding-out effect. Areas in which the crowding-out effect of tobacco expenditure has been studied include but are not limited to education, food, health care, housing, clothing, transportation, and entertainment (John, et al., 2019).

The opportunity cost of smoking is very high for the lowest-income households, as it results in families spending less on children's education, opting for less nutritious food, and otherwise negatively impacts the health of household members (World Health Organization, 2020). Because food is arguably the most essential good, its crowding-out effect tends to be less significant than with education and health care. Education expenditures are most heavily affected by smoking.

From the turn of the century, efforts have been made to quantify the crowding-out effect,

mainly in China (Wang, et al., 2006), Bangladesh (Hussain, et al., 2018), Vietnam (Efroymson et al., 2011), Taiwan (Pu, et al., 2008), and India (John, et al., 2011), with few studies exploring Latin American countries.

One study that analyzed the crowding-out effect in 40 low- and middle-income countries—including some in Latin America—found that an increase in tobacco expenditure crowds out spending on education and health care, but no consistent relationship was found with spending on food (Do & Bautista, 2015). A study focusing specifically on Chile found comparable results, with an increase in tobacco expenditure crowding out spending on health care and education (Paraje & Araya, 2018).

When spending on education is compromised by tobacco consumption, it is the children of the household who are most heavily affected, as this reduces their future income potential while establishing a long-term intergenerational gap (World Health Organization, 2020).

Compared to spending on food and education, the effect on health care expenditure is less clear and is liable to vary on a case-by-case basis, as two opposing effects are produced (Do & Bautista, 2015). Smoking is associated with higher levels of spending on health care because of the health conditions caused by tobacco, but at the same time the drop in disposable income that results from tobacco expenditure may make it harder to treat medical issues. Therefore, the direction and magnitude of the crowding-out effect on health care depends on the magnitude of both effects.

As a greater share of disposable income is spent on tobacco, households find their ability to meet their basic needs diminished. This creates a vicious cycle that drives people deeper into poverty in what is known as an impoverishing effect (John R., Sung, Max, & Ross, 2011). This impoverishing effect primarily affects households already living in poverty, with insufficient income to meet their basic needs, and households that do have the necessary basic resources but are pushed into secondary poverty due to their tobacco-related spending.

There are four ways in which smoking can directly affect a household's state of poverty.

1) Purchase of tobacco: Money spent on tobacco reduces the amount of family disposable income for other basic goods and services.
2) Treatment of smoking-related morbidity: Medical expenses associated with diseases caused by smoking—both for active smokers and passive smokers (people who do not smoke themselves but breathe in other people's cigarette smoke, or secondhand smoke (World Health Organization, 2015))—reduce the amount of household income available.
3) Indirect costs: Health problems resulting from tobacco use lead to indirect costs through lost productivity and working days lost due to smoking-related illness (Tobacconomics, 2019).
4) Smoking-related mortality: Diseases caused by smoking often cause premature death, reducing future income and thus directly affecting the well-being and development of other household members.

Few studies have estimated the impoverishing effect of tobacco in Latin American countries, but evidence is available from countries in other regions. In India, it is estimated that tobacco expenditure increases urban poverty by 0.72% and rural poverty by 1.5%. Similarly, out-of-pocket expenses due to diseases caused by smoking increase urban and rural poverty in India by 0.07% and 0.09% respectively. This translates into an increase of 15 million people in India living under the poverty threshold (John, et al., 2011). In Bangladesh, it is estimated that 10.5 million people who suffer from malnutrition could eat an adequate diet if no money were spent on tobacco, saving the lives of 350 children a day (Efroymson, et al., 2001).

The importance of implementing measures to reduce tobacco consumption lies in the fact that smoking does not only have an impact on health. Tobacco expenditure also crowds out spending on goods and services like health care and education, and it impoverishes people whose income would otherwise be just above the poverty line.

3.1 Study objectives

This report aims to generate evidence on the effects of smoking on household expenditure and the number of people living under the poverty threshold. This is achieved by estimating the crowding-out effect by income group and the impoverishing effect of tobacco use in Mexico.

3.2 Structure of the report

This study is structured as follows. Section four presents the methodology employed to estimate the crowding-out and impoverishing effects. Section five presents the results, and section six offers some concluding remarks.

4. Methodology

The methodology described in this section is based on the 2019 Tobacconomics product, "Using Household Expenditure Surveys for Research in the Economics of Tobacco Control. A Tobacconomics Toolkit" (John, et al., 2019).

4.1 Crowding out

The theory behind estimating the crowding-out effect is that a household would maximize the following utility function:

Equation 1

$$Max\ U = U\ (q_1, \ldots . \bar{q}_n, Y; a)\ s.a. \sum_{n-1}^{i=1} p_i q_i = M\ \&\ q_n = \bar{q}_n$$

where q_i is the quantity of good *i*, p_i is the price of good *i*, $\bar{q}_n$ denotes a household's demand for tobacco, *Y* is the total expenditure, and M = Y – $p_n * \bar{q}_n$ where p_n is the price of tobacco. Solving for n - 1 yields the following demand function, conditional on the consumption of good *n*, in this case tobacco:

Equation 2

$$q_i = g^i(p_1, \ldots, p_{n-1}, M; \bar{q}_n; h)\ \ \forall\ i\ \neq n$$

In Equation 2, the demand function of any good (q_i) is conditional on the prices of all commodities except the conditioning good (q_n), total remaining expenditure (M) after deducting expenditure on the conditional good, the quantity of the conditional good ($\bar{q}_n$) and a vector of household characteristics (h). Therefore, an increase in expenditure on tobacco caused by an increase in taxes may influence expenditure on other goods and services. The crowding-out effect refers to this estimated variation in the consumption of various products and services caused by an increase in tobacco expenditure.

4.1.1 Specification of the econometric model

Given that price information is not available for the different commodity groups, Engel curves are used for the econometric specification. The conditional Engel curve takes the following form for good *i* and household *j*:

Equation 3

$$w_{ij} = \alpha_{1i} + \alpha_{2i} p_{nj} \bar{q}_{nj} + \delta_i' h_j + \beta_{1i} lnM_j + \beta_{2i} \left(lnM_j\right)^2 + \mu_{ij}$$

where $w_{ij} = p_{ij} q_{ij} / M_j$ is the budget share allocated by household *j* to commodity group *i* out of the remaining budget (M_j) after deducting expenditure on tobacco, $p_{nj}\bar{q}_{nj}$ is expenditure on tobacco, *h* is a vector of household characteristics that enables preference heterogeneity, *lnM* and lnM^2 are the natural logarithms of *M* and M^2, which is the expenditure after deducting expenditure on tobacco, and u_{ij} is the random error term.

The variables $p_n\bar{q}_n$ and *lnM* are probably endogenous due to the simultaneity involved, which will cause a correlation with the random error term. If this is the case, an estimation using the ordinary least squares (OLS) method would yield biased results. Therefore, one of the following three estimation methods must be used:

1. Equation-by-equation instrumental variables estimation (2SLS),
2. Instrumental variable system estimation (3SLS), or
3. GMM 3SLS estimation.

To decide which is the most appropriate method, first it is necessary to test whether the endogenous variables are truly endogenous to reject an OLS estimation. Once this is confirmed, the validity of the instruments must be tested. The estimators are consistent only under the assumption that there is a valid instrument that satisfies both inclusion and exclusion restrictions. Next, a heteroskedasticity test must be conducted. If the heteroskedasticity test finds that errors are independent and identically distributed, a traditional 3SLS estimation is appropriate. Otherwise, a GMM 3SLS estimation is needed

to obtain efficient parameter estimates. According to Wooldridge (2010), a GMM 3SLS estimation is never worse than traditional 3SLS, so it is better to employ a GMM 3SLS estimation regardless of the results of the heteroskedasticity test.

Annual household expenditures on ten goods are considered in the crowding-out analysis:

- Food at home: Food and non-alcoholic beverages consumed at home;
- Food away from home: Food consumed outside the home;
- Education;
- Housing: Includes rent, property tax, water and electricity, cleaning, and communication services like the internet and television;
- Clothing: Clothes and footwear;
- Entertainment: Expenditure on leisure activities;
- Transport: Expenditure on public transport, intercity transport, and car maintenance;
- Durable goods: Purchase of automobiles and household goods;
- Health care; and
- Alcoholic beverages.

The following control and instrumental variables are used:

- lnM: Natural logarithm of total household expenditure, excluding expenditure on tobacco;
- lnM^2: Square of the variable above;
- hsize: Number of household members;
- meanedu: Average number of years of education in the household;

- maxedu: Maximum number of years of education of a household member;
- pminors: Proportion of individuals under 12 years of age in the household; and
- sd1, sd2, sd3, sd4: Variables representing socioeconomic groups, with sd1 representing the lowest socioeconomic level.

The variable *pq* represents the total pre-allocated expenditure on tobacco and gives an indication of the extent of the crowding-out effect.

To evaluate the crowding-out effects of the increase in tobacco expenditure, an exercise is conducted to simulate how much expenditure would increase if the specific component of the Excise Tax on Production and Services (IEPS) applied to tobacco were to increase by one peso (MXN) in 2020, from MXN 0.4944 to MXN 1.4944.[1]

The simulations are conducted following the methodology described in CIEP (2020) and using the elasticities by income group calculated in CIEP (2019).

4.2 Impoverishing effect

The head count ratio (HCR) is used to measure the amount of poverty. HCR is defined as the proportion of the population living below the national poverty line (NPL). This measure is useful when working with household survey data, as it allows for calculation of consumption per capita, which can be compared against the NPL.

HCR is calculated using the following equation:

Equation 4

$$P_0 = \frac{1}{N}\sum_{i=1}^{N} I(x_i \leq z)$$

where P_0 is the HCR, I (.) is an indicator function that takes the value of 1 if its argument is true and 0 otherwise, z is the NPL, and x is per capita consumption. Using weights

[1] For more information about the structure of tobacco taxes in Mexico, see CIEP (2019).

obtained from the National Survey of Household Income and Expenditure (ENIGH), P_0 multiplied by *N* gives the total number of people living in poverty in the country.

Excess poverty attributed to forgone income due to purchasing tobacco can be estimated with the following equation:

Equation 5

$$P_1 = \frac{1}{N} I \sum_{i=1}^{N} I([x_i - t_i] \leq z)$$

where *t* is the per capita tobacco expenditure in the same time period. Using the two equations above, (P_1-P_0) multiplied by *N* is the excess number of people impoverished by tobacco expenditure.

To calculate the total effect of tobacco consumption on poverty, it is also necessary to include expenses from treating tobacco-related morbidity. This can be done using the following equation:

Equation 6

$$P_2 = \frac{1}{N} I \sum_{i=1}^{N} I([x_i - t_i - h_i] \leq z)$$

where *h* is the per capita expenditure on health care attributable to active or passive smoking in the same time period. The additional number of people impoverished by tobacco use and expenditure on medical treatment related to passive smoking is obtained by multiplying *N* by (P_2-P_1). Similarly, (P_2-P_0) multiplied by *N* gives the total excess of people impoverished after accounting for forgone income due to spending on tobacco and associated health care costs.

The per capita expenditure on health care attributable to active or passive smoking (variable *h*) can be estimated with the following equation:

Equation 7

$$h_i = \left(\frac{exphealth_i}{hsize_i}\right) * (SAF_{tob} + SAF_{SHS})$$

where exphealth is household expenditure on health care and hsize is household size. Both of these variables can be obtained from the household survey data. SAF_{tob} and SAF_{SHS} are the fractions of health care expenditure attributable to tobacco consumption and passive smoking (secondhand smoke), respectively. Household surveys do not provide this information, so these last two parameters are taken from Palacios A. Reynales-Shigematsu et al. (2020).

One of the main flaws of a measure like HCR is that it does not consider the degree of poverty and will not change if impoverished people become poorer still. This can be addressed using a measure called the "poverty gap," which assigns greater weight to an individual in aggregate poverty the poorer he or she is, and it can be calculated using the following equation:

Equation 8

$$P_G = \frac{1}{N}\sum_{i=1}^{N}\left(1-\frac{x_i}{z}\right)I(x_i \leq z)$$

where P_G is the sum of all the shortfalls divided by the population and expressed as a ratio of the poverty line itself. $P_G * z * N$ gives the total amount by which the poor are below the poverty line. Comparing the number of people below the poverty line before and after taking into account spending on tobacco and associated health care provides a measure of the degree to which tobacco use impoverishes people by pushing them into secondary poverty.

4.3 Data

The main source of data is the National Survey of Household Income and Expenditure (ENIGH) for the year 2020, conducted by the National Institute of Statistics and Geography (INEGI). This survey contains information on the social, economic, and population composition of Mexican households and was administered to 105,483 homes using probabilistic sampling design (INEGI, 2021), which represents 106,846 households.

Table 1 shows the average total annual expenditure for households with smokers and

households without smokers, as well as the expenditure allocated to each variable. Households reporting tobacco consumption are further divided by level of income.

Table 1 Descriptive statistics

Variable	Non-smoking households	Smoking households			
	Total	Total	Low income (MXN)	Middle income	High income
Total expenditure (MXN)	111,844	136,639	95,119	118,418	171,301
	Resource allocation (% of total expenditure)				
Tobacco	-	5.2%	4.8%	5.0%	5.5%
Food at home	39.3%	34.1%	43.4%	36.5%	27.6%
Food away from home	3.6%	5.0%	2.7%	4.3%	6.7%
Health care	10.6%	8.9%	9.7%	9.4%	8.2%
Alcoholic beverages	0.3%	1.8%	1.2%	1.6%	2.2%
Education	3.4%	2.5%	2.3%	2.4%	2.7%
Entertainment	1.6%	1.8%	1.6%	1.7%	2.0%
Housing	22.6%	21.0%	19.7%	21.4%	21.4%
Clothing	2.9%	3.3%	3.1%	3.2%	3.4%
Transport	10.3%	9.7%	8.4%	9.6%	10.5%
Durable goods	1.9%	2.4%	1.3%	2.1%	3.3%
Other	3.3%	4.2%	1.7%	2.9%	6.4%
Individuals per household	3.6	3.4	4.6	3.7	2.5
Male/female	0.9	1.1	1.1	1.2	1.1

Source: Prepared by CIEP with data from ENIGH 2020 (INEGI, 2021)

Smoking households allocate, on average,[2] a greater proportion of total expenditure to alcoholic beverages, non-basic food items, entertainment, clothing, durable goods, and other items while spending a lower share on basic food, health care, education, housing, and transport.

Notably, a comparison of smoking households by income level shows that the only variables to which low-income households allocate a greater proportion of expenditure than high-income households are food at home and health care. Furthermore, low-income households are larger, with an average of 4.6 members compared to 2.5 for high-income households.

[2] The confidence intervals can be found in Appendix II.

The impoverishing effect is calculated using the urban extreme poverty line in December 2020, as published by the National Council for the Evaluation of Social Development Policy (CONEVAL), equivalent to MXN 1,713.89 per person per month, or MXN 20,566.68 per year. For the purposes of this analysis, households are classified as living in extreme poverty if their total annual monetary expenditure is below the poverty line used (CONEVAL, 2020).

The percentage used for medical expenses attributable to tobacco is 0.093 (9.3%), which is the average share of health care expenditure spent on tobacco-related diseases, obtained from Palacios A. Reynales-Shigematsu et al. (2020). This percentage includes costs covered by the public health system and costs borne by households. However, this parameter may vary between households depending on coverage by public and private medical insurance. For the lowest-income households that do not have social security benefits, the value of this parameter can be expected to be greater, while for households with access to social security this value may be lower. Ignoring the value of this parameter due to access to social security and insurance benefits is a limitation of this study. However, given that the value used is considered a minimum, the impoverishing effect of tobacco expenditure on lower-income households with no access to social security may be even greater.

5. Results

5.1 *Crowding out*

The results of the crowding-out analysis are shown in Table 2. A negative sign indicates that additional tobacco expenditure reduces spending on that particular good or service, whereas a positive sign indicates the opposite effect.

Table 2 Results of the crowding-out analysis

Variable	Total	Low income	Middle income	High income
Food at home	0.000094***	0.000214***	0.000001	0.000014
Food away from home	0.000017**	0.000038*	0.000024**	0.000027**
Health care	-0.000105***	-0.000115***	-0.000066***	-0.000086***
Alcoholic beverages	0.000022***	0.000032***	0.000021***	0.000021***
Education	-0.000102***	-0.000179***	-0.000129***	-0.000099***
Entertainment	0.000007**	0.000024**	0.000004	0.000003
Housing	-0.000089***	-0.000223***	-0.000046***	-0.000029*
Clothing	-0.000004	0.000016	-0.000006	-0.000013**
Transport	0.000141***	0.000143***	0.000132***	0.000138***
Durable goods	0.000021***	0.000043**	0.000034***	0.000019*
Other	-0.000001	0.000007	0.000031***	0.000005

Source: Prepared by CIEP with data from ENIGH 2020
Note: *** p<0.01, ** p<0.05, * p<0.1. The full results can be found in Appendix I.

At the population level, most variables are significant, with the exception of clothing and other items. The results show that an increase in tobacco expenditure increases spending on food at home, food away from home, alcoholic beverages, entertainment, transport, and durable goods. By contrast, more spending on tobacco means less spending on health care, education, housing, clothing, and other items.

Most variables are also significant by income group, except for food at home and entertainment for middle- and high-income groups, clothing for low- and middle-income groups, and other expenses for low- and high-income groups. Even though the coefficients tend to be greater for low-income households, the increase in expenditure on food at home and entertainment is only significant for the lowest-income group (see Appendix II). This means that, everything else held constant, an increase in tobacco

expenditure by the same amount across all households would result in greater increases in expenditure on food at home and entertainment among lower-income households, but no significant differences would be observed in expenditure for the remaining groups. There is a significant difference in expenditure on housing between low-income and high-income smoking households, as poorer smoking households will reduce their spending on housing to a greater extent than high-income smoking households. In sum, changes in tobacco expenditure distort to a greater extent the allocation of resources to food at home, entertainment, and housing among lower-income households.

The reductions in expenditure on health care and education occur in the same proportion for different income groups (the differences by income group are not significant[3]). The same effect is observed with expenditure on alcoholic beverages.

5.1.1 Exercise with monetary values

Table 3 shows annual tobacco expenditure by household before and after an increase in the price of cigarette packs from 58.1 pesos to 81.3 pesos.

Table 3 Expenditure on tobacco by income level

Variable	Low income	Middle income	High income
Elasticity	-0.587	-0.542	-0.466
Change in sales	-23.5%	-21.6%	-18.6%
Annual expenditure on tobacco (MXN)	3,563	4,490	6,227
Annual expenditure on tobacco after tax increase (MXN)	3,817	4,924	7,092
Difference (MXN)	277	411	760

Source: Prepared by CIEP with data from ENIGH 2020, CIEP (2019), and CIEP (2020)

Elasticity is greater in low-income households in absolute value, which means that their tobacco expenditure increases to a lesser extent as the price increases. With this in mind, Table 4 presents the monetary change in each expenditure variable.

[3] See Appendix I.

Table 4 Monetary change by income level

Variable	Low income	Change with respect to average household income	Middle income	Change with respect to average household income	High income	Change with respect to average household income
Food at home	5,678	6.9%	55	0.0%	2,257	0.7%
Food away from home	1,008	1.2%	1,317	0.8%	4,354	1.4%
Health care	-3,051	-3.7%	-3,621	-2.2%	-13,867	-4.5%
Alcohol	849	1.0%	1,152	0.7%	3,386	1.1%
Education	-4,749	-5.7%	-7,078	-4.2%	-15,963	-5.1%
Entertainment	637	0.8%	219	0.1%	484	0.2%
Housing	-5,916	-7.2%	-2,524	-1.5%	-4,676	-1.5%
Clothing	424	0.5%	-329	-0.2%	-2,096	-0.7%
Transport	3,794	4.6%	7,242	4.3%	22,252	7.1%
Durable goods	1,141	1.4%	1,865	1.1%	3,064	1.0%
Other	186	0.2%	1,701	1.0%	806	0.3%

Source: Prepared by CIEP with information from ENIGH 2020, CIEP (2019), and CIEP (2020)

Low-income households experience a smaller net monetary change than middle- and high-income households, except for expenditure on food at home, entertainment, and housing. The coefficients for food at home and housing are not significant for middle- and high-income groups. A comparison of the change in expenditure as a percentage of the average total household income at each income level shows that the reduction in expenditure on education and housing is greater in low-income households. Conversely, the increase in expenditure on food is greater for lower-income households, while alcohol exhibits a similar increase across the low- and high-income groups.

5.2 Impoverishing effect

Since tobacco's demand is inelastic, rising prices increases spending on tobacco by smoking households, crowding out spending on health and education, especially in low-income households. This implies a risk to future earning capacity due to their lower investment in education and health.

The results of the impoverishing effect of smoking are shown in Table 5.

Table 5 Results of the impoverishing effect analysis

	Individuals	Change
Individuals below the poverty line	50,208,947	N/A
Individuals below the poverty line, accounting for tobacco expenditure	50,376,097	167,150
Individuals below the poverty line, accounting for medical expenses attributable to tobacco	50,947,564	738,617
Individuals below the poverty line, combined effect	51,118,079	909,132

Source: Prepared by CIEP with data from ENIGH 2020 and CONEVAL

Table 5 shows that the number of individuals whose total expenditure lies below the extreme poverty line increases by 909,132 when tobacco expenditure and expenditure on smoking-related health care are subtracted. These are people on the border of the extreme poverty line, whose expenditure falls under this line after subtracting their spending on tobacco. One limitation of this analysis is that it only considers the additional costs incurred by smoking, with no distinction made between out-of-pocket expenses and health insurance coverage. It is recommended that future studies incorporate the level of health coverage for households with different income levels.

6. Conclusion

Smoking affects individual health and the finances of households in Mexico, particularly those of low-income people. Almost one million people in Mexico lack the necessary resources to maintain a level of expenditure above the extreme poverty line as a direct result of tobacco expenditure and the cost of health care to treat medical conditions associated with smoking. This means that smoking deprives almost one million Mexicans of the disposable income necessary to meet their basic food and non-food needs.

The crowding out effect is especially relevant for lower-income households, which have fewer resources to finance their spending and what their tobacco consumption puts their present and future well-being at risk. Tobacco control policies that effectively reduce the prevalence and consumption of tobacco allow to release resources that families can use in the consumption of other goods and services, improving their quality of life. If they decide to invest more in health, education and housing, they would potentially benefit themselves in the long run.

Benefits of increasing the price of cigarettes through taxes cannot be denied, since this reduces consumption and health expenses from diseases related to tobacco, for example. By increasing tobacco taxes, those who quit smoking increase their quality of life and well-being. However, those who continue to smoke and increase their tobacco spending are affected by a shift in their spending on other goods and services. For these reasons, the increase in tobacco taxes must be accompanied by public policies that help reduce tobacco consumption and compensate the crowding out on goods and services relevant to the development of households. The additional revenue could finance public policies focused on reducing crowding out effect through prevention and smoking cessation programs.

When tobacco use reduces families' spending on education and health, the ability of children from the poorest households to generate higher incomes in the future is

jeopardized, increasing the likelihood that they will remain in poverty. To face these problems, public policies focused on reducing consumption and spending on tobacco in households - with a main focus on the population with fewer resources - are necessary not only to reduce the harmful effects of tobacco consumption on health, but also to reduce the crowding-out and impoverishing effects related to tobacco use.

How raising tobacco taxes may alter households' consumption on other goods and services may be part of a further research which distinguishes this effect from that of a price increase made by the industry.

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8. Appendix I

1. Full results by variable

Food at home	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000936	0.0000203	4.6	0	0.0000537	0.0001334
lnM	0.639637	0.0283446	22.57	0	0.5840827	0.6951913
lnM2	-0.0327658	0.0013595	-24.1	0	-0.0354305	-0.0301012
hsize	0.0116243	0.0005626	20.66	0	0.0105217	0.0127269
meanedu	-0.002695	0.0004304	-6.26	0	-0.0035385	-0.0018515
maxedu	-0.0010477	0.0004565	-2.3	0.022	-0.0019424	-0.000153
sd1	0.0604064	0.0054709	11.04	0	0.0496835	0.0711292
sd2	0.0296975	0.0046304	6.41	0	0.0206221	0.038773
sd3	0.0057362	0.0042549	1.35	0.178	-0.0026032	0.0140756
pminors	-0.009613	0.0057353	-1.68	0.094	-0.020854	0.0016281
_cons	-2.669325	0.1530998	-17.44	0	-2.969395	-2.369255

Food away from home	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000172	6.98E-06	2.46	0.014	3.49E-06	0.0000308
lnM	0.0158656	0.0074821	2.12	0.034	0.001201	0.0305303
lnM2	-0.00001	0.0003836	-0.03	0.979	-0.0007619	0.0007419
hsize	-0.0046168	0.0001896	-24.35	0	-0.0049884	-0.0042451
meanedu	0.0015704	0.0001554	10.1	0	0.0012658	0.0018751
maxedu	-0.0004702	0.0001601	-2.94	0.003	-0.000784	-0.0001563
sd1	0.00685	0.0019845	3.45	0.001	0.0029604	0.0107396
sd2	0.0047545	0.0016697	2.85	0.004	0.0014819	0.0080271
sd3	-0.0001554	0.0015046	-0.1	0.918	-0.0031043	0.0027935
pminors	0.0201412	0.0020215	9.96	0	0.016179	0.0241034
_cons	-0.1514653	0.0383478	-3.95	0	-0.2266257	-0.076305

Health care	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0001049	0.0000186	-5.63	0	-0.0001414	-0.0000684
lnM	-0.2820684	0.0257238	-10.97	0	-0.332486	-0.2316508
lnM2	0.0135389	0.0012479	10.85	0	0.0110932	0.0159847
hsize	0.0010027	0.0005161	1.94	0.052	-8.88E-06	0.0020142
meanedu	-0.0038972	0.0003712	-10.5	0	-0.0046247	-0.0031696
maxedu	9.88E-06	0.000403	0.02	0.98	-0.00078	0.0007998
sd1	-0.0076553	0.0050411	-1.52	0.129	-0.0175357	0.002225
sd2	-0.0028876	0.0043866	-0.66	0.51	-0.0114851	0.00571
sd3	0.003601	0.0041794	0.86	0.389	-0.0045904	0.0117924
pminors	-0.0296369	0.0048187	-6.15	0	-0.0390814	-0.0201925
_cons	1.623395	0.1370187	11.85	0	1.354843	1.891947

Alcoholic beverages	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000223	4.01E-06	5.56	0	0.0000144	0.0000302
lnM	0.0167895	0.0044081	3.81	0	0.0081499	0.0254292
lnM2	-0.000852	0.0002254	-3.78	0	-0.0012938	-0.0004102
hsize	-0.0002834	0.0001054	-2.69	0.007	-0.0004901	-0.0000768
meanedu	0.0000184	0.0000765	0.24	0.81	-0.0001315	0.0001683
maxedu	0.0001779	0.0000856	2.08	0.038	0.00001	0.0003457
sd1	0.0045974	0.0010602	4.34	0	0.0025195	0.0066754
sd2	0.003047	0.0009085	3.35	0.001	0.0012664	0.0048276
sd3	0.0008757	0.0008512	1.03	0.304	-0.0007927	0.0025441
pminors	0.0030759	0.0009663	3.18	0.001	0.001182	0.0049699
_cons	-0.087137	0.0224745	-3.88	0	-0.1311863	-0.0430877

Education	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0001019	0.0000182	-5.61	0	-0.0001375	-0.0000663
lnM	-0.2543801	0.0211997	-12	0	-0.2959308	-0.2128293
lnM2	0.0131452	0.0010711	12.27	0	0.011046	0.0152444
hsize	0.005069	0.0004969	10.2	0	0.004095	0.0060429
meanedu	0.0002148	0.0003513	0.61	0.541	-0.0004737	0.0009033
maxedu	0.000162	0.000382	0.42	0.671	-0.0005867	0.0009108
sd1	-0.025088	0.0049971	-5.02	0	-0.0348821	-0.0152939
sd2	-0.0193347	0.0044077	-4.39	0	-0.0279737	-0.0106957
sd3	-0.0094991	0.0042129	-2.25	0.024	-0.0177563	-0.0012419
pminors	-0.0121571	0.0046386	-2.62	0.009	-0.0212487	-0.0030655
_cons	1.238513	0.1091235	11.35	0	1.024635	1.452391

Housing	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000893	0.0000175	-5.11	0	-0.0001236	-0.0000551
lnM	-0.109782	0.0255749	-4.29	0	-0.159908	-0.0596561
lnM2	0.0035712	0.0012177	2.93	0.003	0.0011845	0.0059578
hsize	-0.0029599	0.0004735	-6.25	0	-0.003888	-0.0020319
meanedu	0.0019348	0.0003552	5.45	0	0.0012387	0.002631
maxedu	-0.0009903	0.0003819	-2.59	0.01	-0.0017389	-0.0002418
sd1	-0.1359974	0.004859	-27.99	0	-0.1455209	-0.1264739
sd2	-0.0713243	0.0042505	-16.78	0	-0.0796551	-0.0629936
sd3	-0.0201332	0.0040312	-4.99	0	-0.0280342	-0.0122322
pminors	-0.0155649	0.0046243	-3.37	0.001	-0.0246283	-0.0065015
_cons	1.110482	0.1385436	8.02	0	0.838942	1.382023

Clothing	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-4.11E-06	3.85E-06	-1.07	0.287	-0.0000117	3.45E-06
lnM	-0.0293773	0.0085325	-3.44	0.001	-0.0461006	-0.0126539
lnM2	0.0017006	0.0003777	4.5	0	0.0009602	0.0024409
hsize	0.0003751	0.0001145	3.28	0.001	0.0001507	0.0005995
meanedu	0.0002894	0.0000861	3.36	0.001	0.0001205	0.0004582
maxedu	-0.000098	0.0000958	-1.02	0.306	-0.0002856	0.0000897
sd1	0.0146032	0.0010113	14.44	0	0.0126211	0.0165853
sd2	0.0083302	0.0008166	10.2	0	0.0067296	0.0099308
sd3	0.004139	0.0006702	6.18	0	0.0028255	0.0054526
pminors	0.0208634	0.0012297	16.97	0	0.0184533	0.0232735
_cons	0.1284615	0.0483594	2.66	0.008	0.0336787	0.2232442

Entertainment	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	6.71E-06	3.11E-06	2.16	0.031	6.09E-07	0.0000128
lnM	-0.0209917	0.0051441	-4.08	0	-0.0310739	-0.0109095
lnM2	0.0010089	0.0002399	4.21	0	0.0005387	0.0014792
hsize	-0.0011936	0.0000823	-14.5	0	-0.001355	-0.0010323
meanedu	0.0000333	0.0000704	0.47	0.636	-0.0001047	0.0001714
maxedu	0.000312	0.0000741	4.21	0	0.0001667	0.0004573
sd1	0.0073988	0.0008764	8.44	0	0.005681	0.0091166
sd2	0.0027311	0.0007321	3.73	0	0.0012963	0.004166
sd3	0.0002929	0.0006661	0.44	0.66	-0.0010126	0.0015984
pminors	0.0064034	0.0009538	6.71	0	0.0045339	0.0082729
_cons	0.1178105	0.0283152	4.16	0	0.0623137	0.1733074

Transport	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0001411	0.0000244	5.77	0	0.0000932	0.000189
lnM	0.3330701	0.0287606	11.58	0	0.2767004	0.3894398
lnM2	-0.0153199	0.0014436	-10.61	0	-0.0181493	-0.0124905
hsize	0.0004706	0.0006673	0.71	0.481	-0.0008374	0.0017785
meanedu	0.0017612	0.0004737	3.72	0	0.0008327	0.0026897
maxedu	0.0029936	0.0005179	5.78	0	0.0019786	0.0040086
sd1	0.0385567	0.0065767	5.86	0	0.0256665	0.0514468
sd2	0.02168	0.0057583	3.77	0	0.010394	0.0329661
sd3	0.002008	0.0055172	0.36	0.716	-0.0088056	0.0128215
pminors	0.0049517	0.0061819	0.8	0.423	-0.0071646	0.0170681
_cons	-1.807993	0.1491274	-12.12	0	-2.100278	-1.515709

Durable goods	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000208	6.72E-06	3.1	0.002	7.64E-06	0.000034
lnM	-0.2177615	0.0144595	-15.06	0	-0.2461016	-0.1894214
lnM2	0.0107786	0.0006758	15.95	0	0.009454	0.0121033
hsize	-0.0038588	0.0002066	-18.68	0	-0.0042637	-0.003454
meanedu	-0.0001734	0.0001542	-1.12	0.261	-0.0004756	0.0001287
maxedu	-0.0004004	0.0001627	-2.46	0.014	-0.0007193	-0.0000815
sd1	0.0256897	0.0019537	13.15	0	0.0218606	0.0295188
sd2	0.0194527	0.0016833	11.56	0	0.0161535	0.0227518
sd3	0.0112955	0.0015441	7.32	0	0.0082691	0.0143218
pminors	0.0189563	0.0019973	9.49	0	0.0150416	0.0228709
_cons	1.092153	0.0782388	13.96	0	0.9388076	1.245498

Others	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-1.41e-06	6.43e-06	-0.22	0.826	-.000014	.0000112
lnM	-.0910012	.0083849	-10.85	0.000	-.1074353	-.0745672
lnM2	.0052043	.0004173	12.47	0.000	.0043865	.0060221
hsize	-.0056291	.0001741	-32.33	0.000	-.0059704	-.0052878
meanedu	.0009433	.0001513	6.23	0.000	.0006467	.0012399
maxedu	-.0006489	.0001545	-4.20	0.000	-.0009518	-.0003461
sd1	.0106386	.0017867	5.95	0.000	.0071367	.0141406
sd2	.0038536	.0014886	2.59	0.010	.000936	.0067712
sd3	.0018394	.0013201	1.39	0.163	-.0007479	.0044268
pmenores	-.00742	.0017762	-4.18	0.000	-.0109013	-.0039386
pq	-1.41e-06	6.43e-06	-0.22	0.826	-.000014	.0000112

2. Full results by variable, based on income level

Food at home

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0002139	0.0000804	2.66	0.008	0.0000562	0.0003716
lnM	0.9909194	0.1155262	8.58	0	0.7644922	1.217347
lnM2	-0.0494197	0.0056922	-8.68	0	-0.0605762	-0.0382633
hsize	0.0040612	0.0010745	3.78	0	0.0019552	0.0061672
meanedu	-0.0009762	0.0009222	-1.06	0.29	-0.0027836	0.0008313
maxedu	-0.0022047	0.0009658	-2.28	0.022	-0.0040977	-0.0003118
sd1	0.0691636	0.0135253	5.11	0	0.0426545	0.0956727
sd2	0.04007	0.0127397	3.15	0.002	0.0151007	0.0650394
sd3	-0.0029443	0.0149505	-0.2	0.844	-0.0322467	0.0263581
pminors	-0.023319	0.0082809	-2.82	0.005	-0.0395493	-0.0070888
_cons	-4.469372	0.5955934	-7.5	0	-5.636714	-3.302031

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	8.73E-07	0.000021	0.04	0.967	-0.0000404	0.0000421
lnM	0.6182827	0.0492806	12.55	0	0.5216945	0.714871
lnM2	-0.0303175	0.0022465	-13.5	0	-0.0347205	-0.0259145
hsize	0.004178	0.0007553	5.53	0	0.0026976	0.0056583
meanedu	-0.0021226	0.0005899	-3.6	0	-0.0032787	-0.0009665
maxedu	-0.0024291	0.0005739	-4.23	0	-0.0035539	-0.0013043
sd1	0.025697	0.0055596	4.62	0	0.0148003	0.0365936
sd2	0.018091	0.0045437	3.98	0	0.0091855	0.0269965
sd3	0.007761	0.0049008	1.58	0.113	-0.0018444	0.0173663
pminors	-0.0688958	0.0071806	-9.59	0	-0.0829694	-0.0548222
_cons	-2.665653	0.2737958	-9.74	0	-3.202283	-2.129023

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000144	0.0000159	0.91	0.365	-0.0000168	0.0000457
lnM	0.5532807	0.0298653	18.53	0	0.4947458	0.6118156
lnM2	-0.0268307	0.0012659	-21.19	0	-0.0293119	-0.0243495
hsize	0.0103288	0.0008682	11.9	0	0.0086271	0.0120304
meanedu	-0.0040791	0.000585	-6.97	0	-0.0052257	-0.0029325
maxedu	0.0000921	0.0005292	0.17	0.862	-0.000945	0.0011293
sd1	0.0039331	0.0058721	0.67	0.503	-0.0075761	0.0154423
sd2	0.007135	0.0040755	1.75	0.08	-0.0008528	0.0151229
sd3	0.0087931	0.0032311	2.72	0.007	0.0024602	0.0151259
pminors	-0.0768938	0.0120808	-6.36	0	-0.1005718	-0.0532158
_cons	-2.454437	0.1771002	-13.86	0	-2.801547	-2.107327

Food away from home

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000383	0.0000218	1.76	0.078	-4.36E-06	0.000081
lnM	-0.0260402	0.0274056	-0.95	0.342	-0.0797542	0.0276738
lnM2	0.0018366	0.0013791	1.33	0.183	-0.0008663	0.0045396
hsize	-0.0030441	0.000286	-10.64	0	-0.0036046	-0.0024836
meanedu	0.0005169	0.0002552	2.03	0.043	0.0000169	0.001017
maxedu	0.000046	0.0002654	0.17	0.862	-0.0004742	0.0005663
sd1	0.0080273	0.0038941	2.06	0.039	0.000395	0.0156597
sd2	0.004003	0.0036808	1.09	0.277	-0.0032113	0.0112172
sd3	0.0011914	0.0042547	0.28	0.779	-0.0071476	0.0095305
pminors	0.0115933	0.0022612	5.13	0	0.0071615	0.0160252
_cons	0.0784834	0.1389059	0.57	0.572	-0.1937672	0.350734

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
Pq	0.000024	0.0000109	2.19	0.029	2.51E-06	0.0000454
lnM	-0.0141077	0.0147663	-0.96	0.339	-0.0430491	0.0148336
lnM2	0.0013087	0.0007556	1.73	0.083	-0.0001722	0.0027896
hsize	-0.0051792	0.0004554	-11.37	0	-0.0060718	-0.0042866
meanedu	0.0012965	0.0002875	4.51	0	0.0007329	0.00186
maxedu	-0.0001748	0.0002934	-0.6	0.551	-0.0007499	0.0004002
sd1	0.0074789	0.0029071	2.57	0.01	0.0017811	0.0131767
sd2	0.0050245	0.0024213	2.08	0.038	0.0002788	0.0097703
sd3	-0.0014751	0.0026514	-0.56	0.578	-0.0066718	0.0037217
pminors	0.0257399	0.0036378	7.08	0	0.0186099	0.0328699
_cons	0.0169281	0.0746831	0.23	0.821	-0.129448	0.1633042

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000272	0.0000122	2.22	0.026	3.21E-06	0.0000511
lnM	0.0589924	0.0109764	5.37	0	0.0374791	0.0805057
lnM2	-0.0021324	0.0005186	-4.11	0	-0.0031488	-0.0011159
hsize	-0.0058389	0.0006259	-9.33	0	-0.0070656	-0.0046121
meanedu	0.0025601	0.0003907	6.55	0	0.0017944	0.0033258
maxedu	-0.0007916	0.0003476	-2.28	0.023	-0.0014729	-0.0001102
sd1	0.0136793	0.0041079	3.33	0.001	0.0056279	0.0217307
sd2	0.0091139	0.0030695	2.97	0.003	0.0030977	0.0151301
sd3	0.0001034	0.002454	0.04	0.966	-0.0047064	0.0049131
pminors	0.0435183	0.0084404	5.16	0	0.0269754	0.0600612
_cons	-0.373875	0.0606812	-6.16	0	-0.492808	-0.2549421

Health care

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0001146	0.0000426	-2.69	0.007	-0.0001981	-0.0000311
lnM	-0.4124762	0.0650742	-6.34	0	-0.5400193	-0.284933
lnM2	0.0193724	0.003186	6.08	0	0.0131279	0.0256168
hsize	0.0029256	0.0005978	4.89	0	0.0017539	0.0040972
meanedu	-0.0052596	0.0004934	-10.66	0	-0.0062265	-0.0042926
maxedu	0.0021389	0.0005148	4.16	0	0.00113	0.0031478
sd1	0.0031031	0.0071581	0.43	0.665	-0.0109265	0.0171328
sd2	0.0083727	0.0067216	1.25	0.213	-0.0048013	0.0215467
sd3	0.0059869	0.007881	0.76	0.447	-0.0094596	0.0214333
pminors	-0.00493	0.0043396	-1.14	0.256	-0.0134355	0.0035756
_cons	2.306285	0.337241	6.84	0	1.645305	2.967266

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000663	0.0000181	-3.66	0	-0.0001018	-0.0000308
lnM	-0.2808027	0.0444645	-6.32	0	-0.3679516	-0.1936538
lnM2	0.0131008	0.0020604	6.36	0	0.0090626	0.0171391
hsize	0.0029534	0.0008162	3.62	0	0.0013537	0.004553
meanedu	-0.0049636	0.0004589	-10.82	0	-0.005863	-0.0040641
maxedu	0.0008407	0.0005022	1.67	0.094	-0.0001436	0.001825
sd1	0.0095295	0.0046159	2.06	0.039	0.0004824	0.0185765
sd2	0.0114365	0.0037709	3.03	0.002	0.0040457	0.0188274
sd3	0.0118596	0.0042274	2.81	0.005	0.003574	0.0201453
pminors	-0.0209353	0.0059147	-3.54	0	-0.0325279	-0.0093426
_cons	1.633478	0.2426261	6.73	0	1.157939	2.109016

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000855	0.0000268	-3.18	0.001	-0.0001381	-0.0000329
lnM	-0.2055547	0.0341989	-6.01	0	-0.2725832	-0.1385261
lnM2	0.0099493	0.001528	6.51	0	0.0069544	0.0129442
hsize	-0.0024689	0.0013517	-1.83	0.068	-0.0051182	0.0001804
meanedu	-0.004472	0.0008108	-5.52	0	-0.0060612	-0.0028828
maxedu	0.000107	0.0007195	0.15	0.882	-0.0013031	0.0015172
sd1	0.0017357	0.0082576	0.21	0.834	-0.0144489	0.0179203
sd2	-0.0058066	0.0063659	-0.91	0.362	-0.0182835	0.0066703
sd3	0.0015008	0.0050685	0.3	0.767	-0.0084333	0.0114349
pminors	-0.0784819	0.0175314	-4.48	0	-0.1128428	-0.0441211
_cons	1.243873	0.1951345	6.37	0	0.8614161	1.626329

Alcoholic beverages

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000318	0.0000103	3.09	0.002	0.0000116	0.0000521
lnM	0.0357567	0.014287	2.5	0.012	0.0077547	0.0637586
lnM2	-0.0017478	0.0007128	-2.45	0.014	-0.0031448	-0.0003508
hsize	-0.0001958	0.0001436	-1.36	0.173	-0.0004773	0.0000856
meanedu	-0.0000105	0.0001234	-0.09	0.932	-0.0002524	0.0002314
maxedu	0.0001449	0.0001258	1.15	0.25	-0.0001018	0.0003915
sd1	0.0024632	0.0015425	1.6	0.11	-0.0005599	0.0054864
sd2	0.0009505	0.0014262	0.67	0.505	-0.0018448	0.0037458
sd3	-0.0014501	0.001808	-0.8	0.423	-0.0049937	0.0020935
pminors	-0.0006759	0.0010624	-0.64	0.525	-0.0027582	0.0014064
_cons	-0.1845109	0.0726772	-2.54	0.011	-0.3269555	-0.0420663

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000209	5.42E-06	3.85	0	0.0000102	0.0000315
lnM	0.0169133	0.0082303	2.05	0.04	0.0007821	0.0330444
lnM2	-0.0008712	0.0004152	-2.1	0.036	-0.001685	-0.0000574
hsize	-0.0003396	0.0002323	-1.46	0.144	-0.0007949	0.0001156
meanedu	0.0001164	0.0001176	0.99	0.322	-0.000114	0.0003468
maxedu	0.0002056	0.0001507	1.36	0.172	-0.0000897	0.0005009
sd1	0.0037445	0.0013293	2.82	0.005	0.0011391	0.0063499
sd2	0.0013911	0.0010652	1.31	0.192	-0.0006966	0.0034789
sd3	-0.0005792	0.0011954	-0.48	0.628	-0.0029222	0.0017638
pminors	0.0035274	0.0014973	2.36	0.018	0.0005926	0.0064621
_cons	-0.0857406	0.0418287	-2.05	0.04	-0.1677233	-0.003758

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000213	6.55E-06	3.26	0.001	8.48E-06	0.0000341
lnM	0.0103729	0.0054446	1.91	0.057	-0.0002983	0.0210441
lnM2	-0.0005609	0.0002638	-2.13	0.033	-0.0010779	-0.0000439
hsize	-0.000419	0.0003132	-1.34	0.181	-0.0010328	0.0001948
meanedu	0.0001638	0.0001886	0.87	0.385	-0.0002058	0.0005335
maxedu	0.0000566	0.0001687	0.34	0.737	-0.000274	0.0003871
sd1	0.0047094	0.0019451	2.42	0.015	0.0008972	0.0085217
sd2	0.0040255	0.0015305	2.63	0.009	0.0010259	0.0070251
sd3	0.0016577	0.0011899	1.39	0.164	-0.0006745	0.00399
pminors	0.0106421	0.004102	2.59	0.009	0.0026024	0.0186818
_cons	-0.0527283	0.0293797	-1.79	0.073	-0.1103115	0.0048549

Education

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0001789	0.0000582	-3.08	0.002	-0.0002929	-0.0000649
lnM	-0.3517853	0.0806628	-4.36	0	-0.5098815	-0.1936891
lnM2	0.0179471	0.0040216	4.46	0	0.0100648	0.0258294
hsize	0.00184	0.0007804	2.36	0.018	0.0003104	0.0033696
meanedu	0.0032289	0.0006377	5.06	0	0.001979	0.0044789
maxedu	-0.0009221	0.0006733	-1.37	0.171	-0.0022418	0.0003976
sd1	-0.0176252	0.0099713	-1.77	0.077	-0.0371685	0.0019181
sd2	-0.0126368	0.0094463	-1.34	0.181	-0.0311513	0.0058776
sd3	-0.0013059	0.0112491	-0.12	0.908	-0.0233538	0.020742
pminors	0.0028007	0.0055366	0.51	0.613	-0.0080509	0.0136523
_cons	1.727949	0.4109968	4.2	0	0.9224104	2.533488

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0001294	0.0000292	-4.44	0	-0.0001866	-0.0000722
lnM	-0.3280668	0.0515888	-6.36	0	-0.429179	-0.2269546
lnM2	0.017264	0.0025524	6.76	0	0.0122614	0.0222666
hsize	0.0034067	0.0013996	2.43	0.015	0.0006635	0.0061498
meanedu	0.0015602	0.00068	2.29	0.022	0.0002274	0.002893
maxedu	-0.0014205	0.0007928	-1.79	0.073	-0.0029742	0.0001333
sd1	-0.0244271	0.0080285	-3.04	0.002	-0.0401626	-0.0086916
sd2	-0.0156801	0.0069797	-2.25	0.025	-0.02936	-0.0020001
sd3	-0.001473	0.0077942	-0.19	0.85	-0.0167494	0.0138035
pminors	-0.0206918	0.0091341	-2.27	0.023	-0.0385944	-0.0027893
_cons	1.562951	0.2661554	5.87	0	1.041296	2.084606

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000993	0.0000308	-3.23	0.001	-0.0001596	-0.000039
lnM	-0.2526536	0.0283556	-8.91	0	-0.3082296	-0.1970777
lnM2	0.012929	0.0013409	9.64	0	0.0103009	0.015557
hsize	0.0100236	0.0015359	6.53	0	0.0070133	0.013034
meanedu	-0.001506	0.0009048	-1.66	0.096	-0.0032794	0.0002674
maxedu	0.000514	0.0007969	0.64	0.519	-0.001048	0.0020759
sd1	-0.0439219	0.0091263	-4.81	0	-0.061809	-0.0260348
sd2	-0.0299658	0.0073974	-4.05	0	-0.0444644	-0.0154671
sd3	-0.0158928	0.0058981	-2.69	0.007	-0.0274529	-0.0043326
pminors	-0.019724	0.0202037	-0.98	0.329	-0.0593226	0.0198746
_cons	1.254004	0.1554379	8.07	0	0.9493516	1.558657

Entertainment

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000239	0.0000121	1.98	0.048	2.45E-07	0.0000476
lnM	0.0383831	0.0153685	2.5	0.013	0.0082613	0.0685048
lnM2	-0.001865	0.0007623	-2.45	0.014	-0.0033591	-0.0003709
hsize	-0.0008099	0.0001447	-5.6	0	-0.0010935	-0.0005262
meanedu	0.0001283	0.0001391	0.92	0.356	-0.0001443	0.0004009
maxedu	0.0003749	0.0001449	2.59	0.01	0.0000909	0.000659
sd1	0.0108948	0.0018115	6.01	0	0.0073443	0.0144454
sd2	0.0045062	0.0016737	2.69	0.007	0.0012259	0.0077865
sd3	-0.0004558	0.0020008	-0.23	0.82	-0.0043773	0.0034657
pminors	0.0058579	0.0012377	4.73	0	0.0034321	0.0082837
_cons	-0.1943153	0.0790126	-2.46	0.014	-0.3491772	-0.0394535

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	4.16E-06	4.38E-06	0.95	0.342	-4.42E-06	0.0000127
lnM	-0.0020968	0.0072275	-0.29	0.772	-0.0162624	0.0120689
lnM2	0.0000984	0.0003527	0.28	0.78	-0.0005928	0.0007895
hsize	-0.0004888	0.000164	-2.98	0.003	-0.0008103	-0.0001673
meanedu	-0.000012	0.0001218	-0.1	0.921	-0.0002507	0.0002267
maxedu	0.0001818	0.0001215	1.5	0.135	-0.0000563	0.0004199
sd1	0.0066978	0.0012405	5.4	0	0.0042665	0.0091291
sd2	0.003211	0.0010535	3.05	0.002	0.0011462	0.0052758
sd3	-0.0000539	0.0011338	-0.05	0.962	-0.0022761	0.0021683
pminors	0.0069963	0.0015088	4.64	0	0.0040391	0.0099534
_cons	0.0208085	0.0383569	0.54	0.587	-0.0543697	0.0959867

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	2.63E-06	4.22E-06	0.62	0.534	-5.64E-06	0.0000109
lnM	-0.0378913	0.0112552	-3.37	0.001	-0.059951	-0.0158316
lnM2	0.0017771	0.0004752	3.74	0	0.0008457	0.0027086
hsize	-0.0010274	0.0002263	-4.54	0	-0.0014708	-0.0005839
meanedu	-0.0001132	0.0001439	-0.79	0.432	-0.0003953	0.0001689
maxedu	0.0003247	0.0001345	2.41	0.016	0.000061	0.0005884
sd1	0.0059656	0.001543	3.87	0	0.0029413	0.0089898
sd2	0.002546	0.0010721	2.37	0.018	0.0004448	0.0046472
sd3	0.0011234	0.0008794	1.28	0.201	-0.0006002	0.0028471
pminors	0.0080701	0.0032927	2.45	0.014	0.0016165	0.0145237
_cons	0.2135474	0.0661433	3.23	0.001	0.083909	0.3431859

Housing

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0002234	0.0000745	-3	0.003	-0.0003693	-0.0000774
lnM	-0.3233516	0.1078869	-3	0.003	-0.5348061	-0.1118971
lnM2	0.0145159	0.005323	2.73	0.006	0.004083	0.0249488
hsize	-0.0018223	0.0010002	-1.82	0.068	-0.0037825	0.000138
meanedu	0.000258	0.0008347	0.31	0.757	-0.0013779	0.0018939
maxedu	-0.0008399	0.0008814	-0.95	0.341	-0.0025674	0.0008875
sd1	-0.1401232	0.0131198	-10.68	0	-0.1658376	-0.1144089
sd2	-0.0714268	0.0124814	-5.72	0	-0.0958899	-0.0469637
sd3	0.0135291	0.0147331	0.92	0.358	-0.0153472	0.0424054
pminors	-0.0100067	0.0073168	-1.37	0.171	-0.0243474	0.0043339
_cons	2.140221	0.5551404	3.86	0	1.052166	3.228276

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000455	0.0000174	-2.61	0.009	-0.0000796	-0.0000113
lnM	-0.056937	0.0451182	-1.26	0.207	-0.145367	0.031493
lnM2	0.0002355	0.0020503	0.11	0.909	-0.003783	0.004254
hsize	0.0014223	0.0006955	2.04	0.041	0.0000591	0.0027855
meanedu	0.0016188	0.0004609	3.51	0	0.0007155	0.0025221
maxedu	-0.0002534	0.0004797	-0.53	0.597	-0.0011936	0.0006868
sd1	-0.1109726	0.0051519	-21.54	0	-0.1210703	-0.100875
sd2	-0.0577395	0.004526	-12.76	0	-0.0666103	-0.0488687
sd3	-0.0102741	0.004892	-2.1	0.036	-0.0198623	-0.000686
pminors	0.0065354	0.0057574	1.14	0.256	-0.0047488	0.0178196
_cons	0.8941207	0.2503245	3.57	0	0.4034936	1.384748

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000293	0.0000149	-1.96	0.05	-0.0000585	-1.60E-08
lnM	-0.1734716	0.0351395	-4.94	0	-0.2423438	-0.1045994
lnM2	0.0050929	0.0014766	3.45	0.001	0.0021987	0.007987
hsize	-0.0022454	0.0008039	-2.79	0.005	-0.003821	-0.0006698
meanedu	0.00356	0.0005061	7.03	0	0.0025681	0.004552
maxedu	-0.0011717	0.0004532	-2.59	0.01	-0.00206	-0.0002835
sd1	-0.1011508	0.0051956	-19.47	0	-0.111334	-0.0909675
sd2	-0.059475	0.0039877	-14.91	0	-0.0672908	-0.0516592
sd3	-0.0290038	0.0032801	-8.84	0	-0.0354326	-0.022575
pminors	0.0180704	0.0106979	1.69	0.091	-0.0028971	0.039038
_cons	1.607381	0.2079045	7.73	0	1.199895	2.014866

Clothing

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000164	0.0000128	1.28	0.2	-8.67E-06	0.0000415
lnM	-0.0119156	0.0171331	-0.7	0.487	-0.0454959	0.0216647
lnM2	0.0007486	0.0008464	0.88	0.376	-0.0009102	0.0024075
hsize	0.0004856	0.0001804	2.69	0.007	1.32E-04	0.0008392
meanedu	0.0002444	0.0001587	1.54	0.124	-0.0000666	0.0005555
maxedu	-0.0001714	0.0001592	-1.08	0.282	-0.0004834	0.0001406
sd1	0.0160639	0.0019294	8.33	0	0.0122824	0.0198454
sd2	0.006508	0.001772	3.67	0	0.0030348	0.0099811
sd3	-0.0022623	0.0020967	-1.08	0.281	-0.0063719	0.0018472
pminors	0.0211879	0.0014967	14.16	0	0.0182544	0.0241214
_cons	0.0484371	0.0884543	0.55	0.584	-0.1249301	0.2218043

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-5.92E-06	6.22E-06	-0.95	0.341	-0.0000181	6.27E-06
lnM	-0.0277832	0.0117026	-2.37	0.018	-0.0507199	-0.0048464
lnM2	0.0015943	0.0005468	2.92	0.004	0.0005226	0.0026661
hsize	0.0015705	0.000248	6.33	0	0.0010844	0.0020566
meanedu	0.0001349	0.000159	0.85	0.396	-0.0001766	0.0004465
maxedu	-0.0002156	0.0001678	-1.28	0.199	-0.0005446	0.0001134
sd1	0.0145406	0.001598	9.1	0	0.0114087	0.0176725
sd2	0.0081256	0.001298	6.26	0	0.0055815	0.0106697
sd3	0.0019404	0.0014023	1.38	0.166	-0.000808	0.0046888
pminors	0.0262777	0.0020734	12.67	0	0.0222139	0.0303414
_cons	0.1242575	0.0642747	1.93	0.053	-0.0017186	0.2502335

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	-0.0000134	6.81E-06	-1.97	0.049	-0.0000267	-4.37E-08
lnM	-0.0186388	0.0246211	-0.76	0.449	-0.0668952	0.0296176
lnM2	0.001143	0.0010119	1.13	0.259	-0.0008403	0.0031264
hsize	0.0022527	0.000353	6.38	0	0.0015608	0.0029447
meanedu	0.0003731	0.0002046	1.82	0.068	-0.000028	0.0007741
maxedu	-0.0001919	0.0002195	-0.87	0.382	-0.0006221	0.0002383
sd1	0.0104846	0.0021793	4.81	0	0.0062133	0.0147559
sd2	0.0082513	0.0016335	5.05	0	0.0050496	0.011453
sd3	0.0055191	0.0012031	4.59	0	0.0031611	0.0078772
pminors	0.0201095	0.0046914	4.29	0	0.0109145	0.0293045
_cons	0.0798149	0.1461952	0.55	0.585	-0.2067224	0.3663521

Transport

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0001432	0.000052	2.75	0.006	0.0000413	0.0002452
lnM	0.2339487	0.0727225	3.22	0.001	0.0914152	0.3764822
lnM2	-0.0104449	0.0036091	-2.89	0.004	-0.0175185	-0.0033713
hsize	0.0007403	0.000696	1.06	0.287	-0.0006239	0.0021045
meanedu	0.0019675	0.0005843	3.37	0.001	0.0008223	0.0031127
maxedu	0.0014932	0.0006157	2.43	0.015	0.0002864	0.0026999
sd1	0.0233015	0.0080884	2.88	0.004	0.0074485	0.0391544
sd2	0.0059085	0.0075436	0.78	0.433	-0.0088767	0.0206936
sd3	-0.0140578	0.009169	-1.53	0.125	-0.0320287	0.0039132
pminors	-0.00839	0.0052318	-1.6	0.109	-0.0186441	0.0018641
_cons	-1.282581	0.372529	-3.44	0.001	-2.012725	-0.552438

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0001317	0.0000305	4.31	0	0.0000719	0.0001916
lnM	0.3266037	0.0545827	5.98	0	0.2196236	0.4335839
lnM2	-0.0153069	0.0026813	-5.71	0	-0.0205622	-0.0100516
hsize	0.0017123	0.0014314	1.2	0.232	-0.0010932	0.0045179
meanedu	0.0025997	0.0007291	3.57	0	0.0011707	0.0040288
maxedu	0.002865	0.000839	3.41	0.001	0.0012206	0.0045094
sd1	0.0297559	0.0081119	3.67	0	0.0138569	0.0456548
sd2	0.0060811	0.0069126	0.88	0.379	-0.0074672	0.0196295
sd3	-0.0128739	0.0077613	-1.66	0.097	-0.0280858	0.0023379
pminors	0.0170295	0.0096022	1.77	0.076	-0.0017905	0.0358494
_cons	-1.730566	0.2838141	-6.1	0	-2.286831	-1.174301

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0001383	0.0000417	3.32	0.001	0.0000566	0.00022
lnM	0.3570523	0.0357203	10	0	0.2870418	0.4270629
lnM2	-0.0169665	0.0017005	-9.98	0	-0.0202995	-0.0136336
hsize	0.0075613	0.0020352	3.72	0	0.0035723	0.0115502
meanedu	0.0030949	0.0012107	2.56	0.011	7.22E-04	0.0054678
maxedu	0.0020444	0.0010689	1.91	0.056	-5.07E-05	0.0041395
sd1	0.0559234	0.0123105	4.54	0	0.0317953	0.0800515
sd2	0.0307765	0.0097983	3.14	0.002	0.0115721	0.0499809
sd3	0.0066586	0.0078109	0.85	0.394	-0.0086505	0.0219678
pminors	0.0712945	0.0265561	2.68	0.007	0.0192455	0.1233435
_cons	-1.890664	0.1959176	-9.65	0	-2.274655	-1.506673

Durable goods

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000425	0.000019	2.24	0.025	5.30E-06	0.0000797
lnM	-0.1192834	0.0291845	-4.09	0	-0.1764841	-0.0620828
lnM2	0.0060337	0.0014427	4.18	0	0.003206	0.0088613
hsize	-0.0026371	0.0003001	-8.79	0	-0.0032253	-0.0020489
meanedu	0.00001	0.0002242	0.04	0.964	-0.0004294	0.0004494
maxedu	0.0001715	0.0002395	0.72	0.474	-0.0002979	0.0006409
sd1	0.0151333	0.0033775	4.48	0	0.0085135	0.021753
sd2	0.0080708	0.0031843	2.53	0.011	1.83E-03	0.0143118
sd3	-0.0009896	0.0036669	-0.27	0.787	-0.0081765	0.0061974
pminors	0.0123562	0.002095	5.9	0	0.00825	0.0164623
_cons	0.5824102	0.1496854	3.89	0	0.2890322	0.8757881

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000342	1.15E-05	2.98	0.003	1.18E-05	0.0000567
lnM	-0.2201115	0.0340428	-6.47	0	-0.2868342	-0.1533889
lnM2	0.0109026	0.0015635	6.97	0	0.0078382	0.013967
hsize	-0.0056692	0.0005874	-9.65	0	-0.0068206	-0.0045178
meanedu	0.0001211	0.0002896	0.42	0.676	-0.0004464	0.0006886
maxedu	-0.000038	0.0003221	-0.12	0.906	-0.0006693	0.0005932
sd1	0.0221518	0.0030056	7.37	0	0.0162609	0.0280428
sd2	0.0148875	0.0024873	5.99	0	0.0100125	0.0197625
sd3	0.0059101	0.0027003	2.19	0.029	0.0006176	0.0112026
pminors	0.0249437	0.0039214	6.36	0	0.0172579	0.0326294
_cons	1.102245	0.1858767	5.93	0	0.7379336	1.466557

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000189	0.0000107	1.76	0.079	-2.16E-06	0.0000399
lnM	-0.2680367	0.0221304	-12.11	0	-0.3114116	-0.2246618
lnM2	0.0131332	0.0009955	13.19	0	0.0111821	0.0150844
hsize	-0.0067092	0.0006653	-10.09	0	-0.0080131	-0.0054054
meanedu	-0.000292	0.0003649	-0.8	0.424	-0.0010071	0.0004232
maxedu	-0.0007522	0.0003385	-2.22	0.026	-0.0014158	-0.0000887
sd1	0.0260377	0.0036977	7.04	0	0.0187905	0.033285
sd2	0.0218513	0.0027747	7.88	0	0.0164129	0.0272897
sd3	0.0139336	0.0022336	6.24	0	0.0095559	0.0183114
pminors	0.0196459	0.0080437	2.44	0.015	0.0038804	0.0354113
_cons	1.368899	0.123652	11.07	0	1.126546	1.611253

Other goods

Low income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	6.69E-06	0.0000187	0.36	0.72	-0.0000299	0.0000433
lnM	-0.0541556	0.02383	-2.27	0.023	-0.1008617	-0.0074496
lnM2	0.0030232	0.001196	2.53	0.011	0.0006791	0.0053672
hsize	-0.0015434	0.0002096	-7.36	0	-0.0019543	-0.0011326
meanedu	-0.0001079	0.0001903	-0.57	0.571	-0.0004808	0.0002651
maxedu	-0.0002312	0.0002141	-1.08	0.28	-0.0006507	0.0001883
sd1	0.0095976	0.0021271	4.51	0	0.0054285	0.0137666
sd2	0.005674	0.001842	3.08	0.002	0.0020637	0.0092842
sd3	0.0027583	0.0024005	1.15	0.251	-0.0019466	0.0074633
pminors	-0.0064744	0.0016653	-3.89	0	-0.0097383	-0.0032104
_cons	0.2469938	0.1212747	2.04	0.042	0.0092998	0.4846878

Middle income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	0.0000313	0.0000118	2.65	0.008	8.17E-06	0.0000544
lnM	-0.0318941	0.0191687	-1.66	0.096	-0.0694641	0.0056759
lnM2	0.0019913	0.0009551	2.08	0.037	0.0001193	0.0038633
hsize	-0.0035663	0.0004989	-7.15	0	-0.0045442	-0.0025885
meanedu	-0.0003493	0.0002936	-1.19	0.234	-0.0009249	0.0002262
maxedu	0.0004383	0.0003213	1.36	0.173	-0.0001914	0.001068
sd1	0.0158037	0.0029787	5.31	0	0.0099655	0.0216419
sd2	0.0051711	0.0023959	2.16	0.031	0.0004753	0.0098669
sd3	-0.000742	0.002589	-0.29	0.774	-0.0058164	0.0043325
pminors	-0.0005269	0.0036373	-0.14	0.885	-0.0076559	0.0066021
_cons	0.1271717	0.098733	1.29	0.198	-0.0663415	0.3206849

High income	Coefficient	Robust standard error	z	P > |z|	95% confidence interval	
pq	4.70E-06	9.42E-06	0.5	0.618	-0.0000138	0.0000232
lnM	-0.0234516	0.0132637	-1.77	0.077	-0.049448	0.0025448
lnM2	0.002466	0.0006026	4.09	0	0.001285	0.003647
hsize	-0.0114576	0.000565	-20.28	0	-0.012565	-0.0103502
meanedu	0.0007102	0.000357	1.99	0.047	0.0000105	0.0014099
maxedu	-0.0002314	0.0003217	-0.72	0.472	-0.000862	0.0003992
sd1	0.0226039	0.0035126	6.44	0	0.0157194	0.0294884
sd2	0.0115479	0.0024489	4.72	0	0.0067481	0.0163477

sd3	0.0056068	0.0019952	2.81	0.005	0.0016962	0.0095174
pminors	-0.016251	0.0069585	-2.34	0.02	-0.0298895	-0.0026126
_cons	0.0041854	0.0743367	0.06	0.955	-0.1415119	0.1498826

3. Results of econometric tests

Variable	Endogeneity	Overidentifying	Pagan-Hall	Preference heterogeneity
Basic food	0.0000	No overidentifying restrictions	0.0000	0.7547
Non-basic food	0.3431	No overidentifying restrictions	0.0000	0.0711
Health care	0.0000	No overidentifying restrictions	0.0000	0.8133
Alcoholic beverages	0.0000	No overidentifying restrictions	0.0000	0.7632
Education	0.0000	No overidentifying restrictions	0.0010	0.8244
Housing	0.0000	No overidentifying restrictions	0.0000	0.8130
Clothing	0.0000	No overidentifying restrictions	0.0000	0.7365
Entertainment	0.3182	No overidentifying restrictions	0.0000	0.6799
Transport	0.0000	No overidentifying restrictions	0.0010	0.8189
Durable goods	0.4188	No overidentifying restrictions	0.0000	0.0319

Exclusion restriction test			
	pq	lnM	lnM^2
Shea Partial R2	0.00083994	0.60916881	0.4925854

9. Appendix II

Smokers: 95% confidence intervals				
Type of good	Totals	Low income	Middle income	High income
Tobacco	(5.02%, 5.39%)	(4.44%, 5.20%)	(4.74%, 5.32%)	(5.24%, 5.83%)
Food at home	(33.59%, 34.58%)	(42.41%, 44.39%)	(35.68%, 37.24%)	(26.93%, 28.31%)
Food away from home	(26.93%, 28.31%)	(26.93%, 28.31%)	(3.85%, 4.76%)	(6.19%, 7.16%)
Health care	(8.73%, 9.16%)	(9.28%, 10.16%)	(8.98%, 9.72%)	(7.91%, 8.57%)
Alcoholic beverages	(1.61%, 1.93%)	(0.93%, 1.51%)	(1.31%, 1.83%)	(1.93%, 2.47%)
Education	(2.33%, 2.76%)	(1.94%, 2.67%)	(2.10%, 2.77%)	(2.38%, 3.11%)
Entertainment	(1.73%, 1.95%)	(1.44%, 1.85%)	(1.53%, 1.89%)	(1.85%, 2.21%)
Housing	(20.69%, 21.37%)	(19.02%, 20.39%)	(20.83%, 21.99%)	(20.87%, 21.95%)
Clothing	(3.12%, 3.38%)	(2.80%, 3.35%)	(3.00%, 3.46%)	(3.15%, 3.55%)
Transport	(9.44%, 9.99%)	(7.82%, 8.93%)	(9.09%, 10.02%)	(10.09%, 10.93%)
Durable goods	(2.19%, 2.66%)	(1.00%, 1.60%)	(1.72%, 2.44%)	(2.83%, 3.68%)
Other items	(3.92%, 4.45%)	(1.38%, 2.05%)	(2.48%, 3.23%)	(5.96%, 6.91%)

Non-smokers: 95% confidence intervals				
Type of good	Totals	Low income	Middle income	High income
Tobacco	(0.00%, 0.00%)	(0.00%, 0.00%)	(0.00%, 0.00%)	(0.00%, 0.00%)
Food at home	(39.13%, 39.38%)	(46.97%, 47.36%)	(39.81%, 40.20%)	(30.12%, 30.51%)
Food away from home	(3.56%, 3.68%)	(2.00%, 2.15%)	(3.27%, 3.46%)	(5.36%, 5.60%)
Health care	(10.58%, 10.70%)	(10.84%, 11.04%)	(10.44%, 10.64%)	(10.31%, 10.55%)
Alcoholic beverages	(0.33%, 0.37%)	(0.17%, 0.22%)	(0.27%, 0.33%)	(0.52%, 0.59%)
Education	(3.35%, 3.46%)	(3.05%, 3.22%)	(3.44%, 3.64%)	(3.44%, 3.66%)
Entertainment	(1.59%, 1.64%)	(1.38%, 1.44%)	(1.48%, 1.55%)	(1.87%, 1.97%)
Housing	(22.51%, 22.68%)	(20.85%, 21.11%)	(22.69%, 22.96%)	(23.87%, 24.19%)
Clothing	(2.91%, 2.96%)	(2.64%, 2.73%)	(2.92%, 3.02%)	(3.10%, 3.21%)
Transport	(10.28%, 10.41%)	(8.63%, 8.85%)	(10.49%, 10.72%)	(11.62%, 11.86%)
Durable goods	(1.88%, 1.98%)	(1.13%, 1.25%)	(1.72%, 1.87%)	(2.73%, 2.94%)
Other items	(3.26%, 3.37%)	(1.42%, 1.54%)	(2.47%, 2.62%)	(5.85%, 6.11%)