Fat tax in Kerala: Panacea to the obesity problem?

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In July 2016, the Government of Kerala introduced a 14.5 per cent tax on burgers, pizzas, tacos, donuts, sandwiches, burger-patties, pastas, bread fillings and other cooked food items sold by branded restaurants. This article discusses the implications of this newly-levied ‘Fat Tax’.

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**Obesity**, defined as abnormal or excessive fat accumulation that presents a risk to health, has doubled since 1980 throughout the world. In the year 2014, more than 1.9 billion adults were overweight. Out of these 600 million were obese. Rise in the number of problems related to chronic diseases, diabetes, cardio vascular diseases (CVDs) and cancer has been observed. CVDs, with 17.5 million deaths in 2012 which was roughly 31 per cent of total deaths, are the number one cause of deaths globally. Overweight or obesity has financial implications too in the form of working days lost, increased benefits payments and social care costs. In 2008, WHO (World Health Organisation) estimated the total financial costs of obesity to be $147 billion worldwide.

**WHAT IS FAT TAX?**

Fat tax is a tax or surcharge that is placed on fattening food, beverages or on overweight individuals. It has been imposed in various countries but the structure of the tax is not same across these countries. One might presume that fat tax is imposed to discourage people from consuming unhealthy food products. By imposing a tax, the price of the commodity is increased, which in turn leads to a fall in the quantity demanded.
HISTORY

Japan implemented the ‘metabo’ law in 2008 which mandates local governments and employers to add a waist measurement test to the annual mandatory check-up of 40 to 74 year olds. Men and women failing this test, i.e. exceeding the maximum allowed waist size of 33.5 and 35.4 inches respectively, are required to attend counseling sessions, monitoring through phone and email correspondence, and motivational support. The overall goal is to cut the country’s obesity rates by 25 per cent by the year 2015. Failure to meet these goals results in fines of almost 10 per cent of current health payments. Employers are also required to have a participation rate of 65 per cent failing which they are penalised.

Denmark implemented a nutrient-based tax in October 2011 on butter, milk, cheese, pizza, meat, oil and processed food containing more than 2.3 per cent saturated fat. The tax was withdrawn in November 2012. The measure added 16 kroner per kilogram of saturated fat. The tax was based on the amount of fat used to produce the food and not the amount in the final product.

Hungary implemented ‘public health food tax’ in September 2011. People have to pay a tax of 10 forint on packaged products with high sugar, saturated fat and salt content. The tax is applicable on packaged snacks and sugary drinks but not on fast food.

Finland has reintroduced a tax on sweets including soft drinks and ice-cream in 2011.

France, in 2012, introduced a tax on drinks with added sugar or sweetener.

In November 2013, Mexico approved an excise tax on high-calorie packaged food including potato chips, peanut butter and sweetened breakfast cereals and an increase in tax on soft drinks.

IS FAT TAX A FORM OF PIGOVIAN TAXATION?

A Pigovian tax, after British economist Arthur C. Pigou, is a tax levied on any market activity that generates negative externalities. It is a tax which is intended to correct an inefficient market outcome by setting it equal to the social cost of negative externalities and is placed when the market price of the commodity has not internalised social costs. If one were to say that fat tax is a form of Pigovian taxation, the underlying assumption would be that obesity has negative externalities. In countries where the healthcare costs are borne by the government, the expenditures of citizens’ healthcare costs are met by raising taxes on citizens. An obese person’s healthcare costs are $700 more than that of a thin person in USA. But these costs are not all borne by the obese. This way obesity in some people becomes a burden for everyone and hence creates negative externalities.

EXPERIENCES OF OTHERS

In Denmark, consumers paid a tax of $1.26 per pound of saturated fat on domestic and imported food. It equated up to 30 per cent more for butter, 8 per cent more for potato chips and 7 per cent more for olive oil. Saturated fat consumption was expected to decrease by 4 per cent. According to OECD, the goal could not be reached. According to
IEA’s Current Controversy Paper no. 42, fat tax led to a rise in inflation to 4.7 per cent in a year in which real wages fell by 0.8 per cent. It also led to cross border purchase of food items.

In Finland, media reports indicate that the tax had only a short-term effect and the demand came back to normal over time.\textsuperscript{ix}

In France, a study showed that tax was fully passed on to the consumers for sodas, which had no untaxed substitutes. However, the tax was not fully passed on to consumers for flavoured water and food drinks for which substitutes were more widely available.

In Mexico, producers changed the production recipe of soft drinks. They substituted cane sugar with high fructose corn syrup which was relatively cheaper and unhealthy.

**FAT TAX IN KERALA**

Dr. T.M. Thomas Isaac, minister of finance and coir, Government of Kerala (GoK) presented the state budget on 8 July, 2016 where he levied a tax rate of 14.5 per cent as “Fat Tax” on burgers, pizzas, tacos, donuts, sandwiches, burger-patties, pasta, bread fillings and other cooked food items sold by branded restaurants. The government expects additional revenue of Rs. 10 crores.\textsuperscript{x} As per 2005-06 NFHS data, 24.3 per cent of males and 34 per cent of females were obese or overweight in Kerala while the national figures were 12.1 per cent and 16 per cent respectively. Data release for NFHS 2015-16 is awaited.

From this point onwards, we term these taxed products as ‘Taxed Fast Foods’.

**THEORETICAL ARGUMENTS**

It is unclear as to whether this tax is intended to decrease the obesity levels across state and change consumption habits of the people or to generate additional tax revenue or both. In a competitive market, the incidence of a tax will depend on the relative price elasticities of demand and supply of the product that is being taxed. If the demand curve is price inelastic, a tax imposition will result in a relatively smaller reduction of quantity demanded compared to a price elastic demand curve. Also if the demand curve is relatively more elastic than the supply curve, a major portion of the tax burden will fall on the suppliers rather than the buyers and vice versa.

With regard to the supply side, some producers of taxed fast food said that they will not be passing on the entire burden of tax to consumers. A fallout of this policy could be the manufacturers reformulating the production recipe by using cheaper inputs which are of lower quality, and might lead to even worse health outcomes.

John Nye in his paper titled *The Pigou Problem* argues that any tax collection which is determined using the size of negative externality, but not considering all regulations and transfers affecting equilibrium, will not tell us what the optimal tax will be. No empirical work could be found on how the GoK came up with the 14.5 per cent tax rate.

Another argument is that the government can justify Pigovian taxation only if the consumption generates negative externalities. After all, the government cannot dictate what the consumers should or should not eat.
simply on the grounds that it is harmful. We assume that consumers are rational and maximize utility. Therefore, consumers should have complete liberty over what to eat. The role of the government is to provide information to consumers so that they make the right choices instead of government making choices for them.

CONCLUSION

As of now there is no data to do a detailed economic analysis of the effects of this tax. If quantity demanded does not fall, health issues will still persist. In reality of course, consumption of these fast foods that have come under the purview of this tax will fall. The only exception is when demand or supply curve is perfectly inelastic. The argument that changing the eating habits was the goal of the government of Kerala becomes suspect considering that it did not tax other equally unhealthy local street fast foods.

On the positive side, fat tax may be progressive in India where the consumers of donuts, pizzas etc. are middle and upper middle classes. India’s poor cannot really afford these foods. There is a dearth of data and so we offer this as a conjecture, rather than as a proven fact. On the medical and scientific fronts, a number of studies highlight the debilitating effect of these fast foods on health. Experience from around the world also does not give conclusive evidence on whether their experiments with such Pigovian taxes have been effective in changing the consumption patterns of the people so taxed.

The Kerala government would have done well to have brought all the so called junk foods under the purview of this tax, if health of the citizens was its concern. Selectively applying the tax on products mostly supplied by multi-national companies, without adequate justification based on research, does not send the right signals to the consumers.

NOTES

i http://www.who.int/topics/obesity/en/
ii http://www.who.int/mediacentre/factsheets/fs311/en/
iii https://www.noo.org.uk/la/impact/economic
viii http://www.economist.com/node/14120903
ix http://yle.fi/uutiset/sweet_tax_fails_to_slow_candy_consumption/6992250
x https://kerala.gov.in/documents/10180/5bc7dd-d019-42f6-b9a5-836abada51f0

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