An Estimation of the Economic Impacts of Tobacco Consumption

Summary of Main Findings

Dr. Jad Chaaban
American University of Beirut
• Presentation based on the paper “The Economics of Tobacco in Lebanon: An Estimation of the Social Costs of Tobacco Consumption”, by Dr. Jad Chaaban, Ms. Nadia Naamani and Dr. Nisreen Salti
• Produced as part of the AUB Tobacco Control Research Group
• Sponsored by the Issam Fares Institute for Public Policy and International Affairs at AUB
• First study of its kind in Lebanon
Presentation Outline:

1. What’s the size of the smoking problem in Lebanon?
2. Who benefits from the local tobacco sector?
3. Methodology for computing the economic costs of cigarettes
4. Cost of smoking-related diseases
5. Productivity costs
6. Costs of environmental degradation
7. Indirect costs due to tobacco mortality
8. Total costs of tobacco on the economy
9. Policy recommendations

موجز العرض

1 - ما هو حجم مشكلة التدخين في لبنان؟
2 - من يستفيد من قطاع التبغ في لبنان؟
3 - كيفية احتساب الكلفة الحقيقية للسجائر على الاقتصاد اللبناني
4 - فاتورة الأمراض من التدخين
5 - الفاتورة المتصلة بالعمل
6 - الفاتورة البيئية للتدخين
7 - أثر الوفيات المتصلة بالتدخين على الإنتاجية
8 - الكلفة الإجمالية للتدخين على الاقتصاد
9 - توصيات
Size of the problem:

- 53% of Lebanese adults are smokers (all types of tobacco)
- 60% of Lebanese youth aged 13-15 are smokers (mainly water-pipe)
- 35% of adults smoke cigarettes (43% males, 27% females)
- Lebanese women have the highest female smoking rates in the region
- Almost 900,000 Lebanese consume 7.8 billion cigarettes every year
• Lebanese adults consume 12.4 packs of cigarettes per month
• One of the highest rates in the world
Size of the problem:

- At least 2,700 Lebanese die every year because of smoking
- 1,000 new cases are diagnosed with smoking-related cancer every year
- 7% of the population has cardiovascular disease linked to smoking
- The poorest Lebanese families spend more on tobacco than on education
Methodology for Computing the Economic Costs of Cigarettes:

- Computed the benefits and costs of the tobacco sector
- Assessed cost of various smoking-related diseases
- Evaluated the cost of working inefficiency due to absenteeism from work
- Estimated the environmental cost of smoking
- Calculated productivity cost as a result of premature death linked to smoking
Organization of the Local Tobacco Market

Government:
Régie (State-owned monopoly)
Ministry of Finance

Tobacco Farmers

International Tobacco companies

International Tobacco companies

Tobacco Consumers

Licensed Distributors and Retailers

管理局 (State-owned monopoly)
财政 財政部

政府

農民

國際烟草公司

消費者

獲許可的分銷商及零售商

 تنظيم سوق التبغ المحلي

الدولة

ريجي (إدارة الحصر التبغ و التنباك اللبنانية)
وزارة المالية

مزارعو التبغ

الدولية

موزعون وتجار التجزئة للتبغ المرخصون
Tobacco production and trade:
• Production: 9,000 Metric Tons/year tobacco leaf
• Purchased by Government at subsidized price (51 million US$ subsidy)
• Exported for a value of 34 million US$
• Imports: 10,000 tons/year Manufactured Tobacco
• Value of 158 million US$
• Consumers spend 437 million US$ on cigarettes per year
24,000 registered tobacco farmers
40% rely on other sources of revenue, 23% rotate crops
Tobacco revenue (2000 US$/year) constitutes one third of their income
Tobacco growing license used as collateral for bank loans

<table>
<thead>
<tr>
<th>Number of Farmers</th>
<th>24,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dependants on Cultivation</td>
<td>55,200</td>
</tr>
<tr>
<td>Land Used (hectares)</td>
<td>9000</td>
</tr>
<tr>
<td>% Agriculture Land Used</td>
<td>3.2%</td>
</tr>
<tr>
<td>% Farmers Relying on Other Sources</td>
<td>40%</td>
</tr>
<tr>
<td>Production Level (MT)</td>
<td>9000</td>
</tr>
</tbody>
</table>
إدارة الحصر التبغ و التنباك اللبنانية (الريجي):
الريجي التي تديرها الدولة مسؤولة عن تصدير وتوريد التبغ

• 1500 موظف تقريباً يعملون في الريجي
• تشتمل الريجي التبغ من المزارعين بسعر مدعوم
• تبيع الريجي التبغ في سوق الدولي بأسعار منخفضة
• تستورد التبغ المصنوع من الشركات الدولية
• تعطي تراخيص للمزارعين والموزعين المحليين

Régie:
• State-run monopoly in charge of exporting and importing tobacco
• Employs about 1500 persons
• Purchases tobacco from farmers at subsidized price
• Sells raw tobacco in the international markets at a lower price
• Imports manufactured tobacco products
• Issues and manages licenses for local tobacco farmers, distributors and retailers
Licensed Distributors and Retailers:

- There are approximately 450 licensed tobacco retailers and roughly 100,000 licensed retailers.
- License validity varies between 6 months and 1 year.
- Distributors sell at about a 5% profit margin to wholesalers.
- Wholesalers then sell to retailers at a 1.7% profit margin.
- Retailers have a lower margin gaining about $0.07 per pack on average.
### Fiscal Revenues:

- Manufactured tobacco tax accounts for 97% of total tax revenue

### 2008

<table>
<thead>
<tr>
<th>Description</th>
<th>Amount</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Tobacco Excise Tax (100%)</td>
<td>$163,748,000</td>
<td>مجموع عائدات ضريبة التبغ (100%)</td>
</tr>
<tr>
<td>Total Tobacco Customs Tax Collected (5%)</td>
<td>$8,459,371</td>
<td>مجموع العائدات الجمركية (5%)</td>
</tr>
<tr>
<td>Total Tobacco VAT Collected (10%)</td>
<td>$16,918,742</td>
<td>مجموع الإيرادات من الضرائب على القيمة المضافة</td>
</tr>
<tr>
<td>Total Tobacco Tax Revenue</td>
<td>$189,126,112</td>
<td>مجموع الضرائب على التبغ</td>
</tr>
</tbody>
</table>
Advertising Revenues:

- On average 11 million $ / year
- Tobacco brands are not among the top ten advertised brands in Lebanon
- Tobacco advertising spending constituted only 4.5% of advertising spending in 2009
- Over a five year span tobacco advertising only made up 9.6% of total advertising spending
<table>
<thead>
<tr>
<th></th>
<th>2008</th>
<th>Net (million$)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Régie</td>
<td></td>
<td>$50.3</td>
</tr>
<tr>
<td>Distribution Channels</td>
<td></td>
<td>$84.4</td>
</tr>
<tr>
<td>Government</td>
<td></td>
<td>$121.6</td>
</tr>
<tr>
<td>Advertising</td>
<td></td>
<td>$15</td>
</tr>
<tr>
<td><strong>Total Local Net Revenue</strong></td>
<td></td>
<td><strong>$271.3</strong></td>
</tr>
<tr>
<td><strong>International Tobacco Companies</strong></td>
<td></td>
<td><strong>$114.9</strong></td>
</tr>
</tbody>
</table>
Cost of Smoking-Related Diseases:

• Smoking related diseases sum up to 27 different diseases
• Only 3 diseases are tackled in this paper: cardiovascular disease, bladder cancer and lung cancer, and respiratory diseases
• Estimations of cost for these diseases includes only parts of treatment costs
### Cost of Smoking-Related Diseases:

<table>
<thead>
<tr>
<th>Disease</th>
<th>Cost (in million $)</th>
<th>Arabic Translation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cardiovascular Disease</td>
<td>$104.5</td>
<td>أمراض القلب والشرايين</td>
</tr>
<tr>
<td>Cancer (Lung and Bladder)</td>
<td>$33.6</td>
<td>سرطان الرئة والمثانة</td>
</tr>
<tr>
<td>Respiratory Disease</td>
<td>$8.6</td>
<td>أمراض الجهاز التنفسي</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>$146.7</strong></td>
<td>المجموع</td>
</tr>
</tbody>
</table>
Productivity Costs:

- Smokers and past smokers feel physically ill more often than non-smokers.
- Employed smokers and past smokers are more likely to be absent from work.
- Missed working days constitute an economic loss in the working sector.
- Working inefficiency due to smoking costs $102 million per year.
Costs of Environmental Degradation:

- 1% of forest fires are a result of disposed lit cigarettes
- Approximately 3 fires are caused by cigarettes per year
- Cigarette waste constitute 46% of all items disposed on the streets
- Picking up street waste consumes most of the working time of street waste collectors
- The aggregate cost of environmental degradation totals $13.2 million
Indirect Costs Due to Tobacco Mortality:

- Approximately 25% of annual deaths are a result of tobacco smoking
- Pre-mature deaths affect national productivity as people pass away before reaching retirement age
- The foregone productivity is evaluated at its present value for the economy
- Indirect opportunity cost of $64.6 million
## Total Costs of Tobacco on the Economy:

<table>
<thead>
<tr>
<th></th>
<th>Million $</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total Cost</strong></td>
<td>326.7</td>
</tr>
<tr>
<td><strong>Direct Cost</strong></td>
<td></td>
</tr>
<tr>
<td>Cost of Disease</td>
<td></td>
</tr>
<tr>
<td>Of Which:</td>
<td></td>
</tr>
<tr>
<td>Cardiovascular Disease</td>
<td>104.5</td>
</tr>
<tr>
<td>Smoking-Related Cancer</td>
<td>33.6</td>
</tr>
<tr>
<td>Respiratory Diseases</td>
<td>8.6</td>
</tr>
<tr>
<td>Productivity Cost</td>
<td>102.2</td>
</tr>
<tr>
<td>Environmental Degradation</td>
<td>13.2</td>
</tr>
<tr>
<td>Of which:</td>
<td></td>
</tr>
<tr>
<td>Forest Fires</td>
<td>6.5</td>
</tr>
<tr>
<td>Street Waste</td>
<td>6.7</td>
</tr>
<tr>
<td><strong>Indirect Cost</strong></td>
<td>64.6</td>
</tr>
</tbody>
</table>
Tobacco costs Lebanon more than what the country invests every year in upgrading its infrastructure.
Our costs are only a fraction of the true economic costs:
• Costs only linked to cigarettes (water pipe excluded)
• Only 3 out 27 diseases are accounted for
• Economic effect of second hand smoking not included
• 79% of children are exposed to second hand smoke at home
• Second hand smoking increases the chances of heart diseases by 25%
Policy considerations

- People are free to smoke: Freedom is a right in the Constitution
- But they don’t incorporate in their decision the costs they are imposing on themselves and others
- Negative externality
- Need for Public Intervention to correct the heavy consumption of toxic substances
- Need a strict Tobacco Control Law NOW

الاعتبارات السياسة العامة

- الدستور يضمن الحرية، بما فيها حرية التدخين
- لكن المدخنين لا يدرجون الأثر السلبي لاستهلاكهم على نفسهم وعلى غيرهم
- عوامل خارجية سلبية
- حاجة إلى تدخل للسياسات العامة للحد من إستهلاك التبغ
- إقرار قانون الحد من التدخين في لبنان الآن
Some policy recommendations

- Increase tax on tobacco products
- Increase the size of health warnings on cigarette packs
- Ban smoking in public areas (educational buildings, health facilities, government buildings)
- Ban tobacco advertising to the public
- NO grace period for new law
- Give tax incentives to restaurants and cafés which are smoke-free (income tax break for 2 years or reducing VAT to 5% for 1 year)
- Increase research and awareness campaigns on the negative effects of smoking, especially with youth
- Provide financing facilities and cash support to families in rural areas

بعض التوصيات

- زيادة الضريبة على جميع منتجات التبغ
- زيادة حجم ملصق التحذير الصحي على منتجات التبغ
- منع التدخين في الأماكن العامة
- لا فترة سماح في القانون
- منح حوافز ضريبية للمقاهي والمطاعم التي تمنع التدخين
- إلغاء ضريبة الدخل لمدة سنتين
- تقليص TVA إلى 5% لمدة سنة
- تكثيف الأبحاث وحملات التوعية حول التدخين، خصوصاً لدى الشباب
- تأمين مصادر تمويل ومساعدات مالية سنوية للعائلات في الأرياف
For more information:
Dr. Jad Chaaban: jad.chaaban@aub.edu.lb
Dr. Nisreen Salti: nisreen.salti@aub.edu.lb
Ms. Nadia Naamani: nadia.naamani@aub.edu.lb