Listening between the lines: what BAT really thinks of its consumers in the developing world

In an audio recording of the “Structured Creativity Conference” held in Hampshire, UK in June 1984, British American Tobacco (BAT) adds context to the written report of marketing and product applications. Employees are taped brainstorming creative ways to push their product in light of future marketing constraints and social pressure towards a smoke-free society. Project proposals included the sidestreaming low yield sidestream smoke cigarettes, “front end lift” cigarette design to give the smoker more “impact” on the first puff, pleasant smelling sidestream smoke, and another idear—”Forget about smoking…GO FOR A QUICKIE. No tar with nic is what makes the body kick.”

One of the most interesting proposals came from Ian Ross from a Finland subsidiary, who later became the head of international brand and product applications. Ross describes the “mental copy rule” to the US Department of Justice, which assumed that anything one writes could end up being used publicly or legally against the company. This leads to the obvious question: Are we overlooking important research tools in the form of non-written material?

M E Muggli
D R Hurt
St Paul, Minnesota, USA

Correspondence to: Monique E Muggli, 1345 Osceola Avenue, St Paul, MN 55105, USA; mmuggli@attbi.com

References

Eclipse: does it live up to its health claims?

We read the recent article by Slade et al with great interest and agree that reasonable regulation focused on the development and appropriate evaluation of potential reduced risk cigarettes is warranted. Furthermore, we agree with Slade et al that the results of our evaluation indicate that Eclipse may offer potential benefits to smokers. However, we disagree with several of the other conclusions drawn by the authors.

The article challenges the merits of Eclipse and questions the fundamental differences between Eclipse and other cigarettes. It is not possible within the context of this letter either to fully describe the scientific data that has been developed to characterise Eclipse or to address many of the criticisms of Eclipse raised in Slade’s article. However, we briefly address pertinent issues below and encourage interested parties to independently evaluate all of the available information.

Slade et al have inaccurately represented the claims that RJ Reynolds Tobacco Company (RJRT) has made regarding Eclipse. No cigarette is without risk, including Eclipse. Our advertising for Eclipse states: “The best choice for smokers who worry about their health is to quit. But Eclipse is the next best choice for those who have decided to continue smoking.” Our advertising also makes it clear that RJRT does not claim that Eclipse presents a riskless alternative to smoking. These claims have inaccurately represented the risks and benefits of cigarettes sold in the US market.

We disagree with several of the other conclusions drawn by Slade et al. The weight of the evidence from this research clearly shows that, compared to other cigarettes, Eclipse may present smokers with less risk of cancer, chronic bronchitis, and possibly emphysema. An independent panel of scientific experts reviewed the science and reached conclusions consistent with RJRT’s claims.

RJRT’s comparative studies were conducted using Kentucky reference cigarettes (K1R5F and K1R4F) and leading low “tar” and ultra low “tar” commercial brand styles. Combined, the cigarettes selected for comparison to Eclipse are representative of the vast majority of cigarettes sold in the US market. By contrast the entire market segment of the very low yielding ultra low “tar” cigarettes used by Slade et al as a comparison collectively represent less than 1% of the market. Furthermore, one of the two cigarettes selected as a comparison (Now Box) does not have a measurable US Federal Trade Commission (FTC) “tar” yield.
Comparisons of Eclipse mainstream smoke constituent yields to the yields of very yielding ultra low "tar" cigarettes (Now Box and Carlton Soft Pack) obtained by machine smoking do not change the fact that an extensive battery of scientific tests indicates that Eclipse cigarettes may present smokers with less risk of certain smoking related diseases than other cigarettes. RJRT scientists have recently demonstrated Eclipse is significantly less mutagenic on a per mg "tar" basis than either Carlton Soft Pack or Now Box over a wide range of machine smoking conditions. On a per cigarette basis, Eclipse was less mutagenic than Carlton Soft Pack under all machine smoking conditions tested and was less mutagenic than Now Box when evaluated using the machine smoking conditions mandated by both the Massachusetts Department of Health and the Canadian federal government. In addition, Eclipse was significantly less cytotoxic on both a per mg "tar" basis and a per cigarette basis under the same range of machine smoking conditions.

As noted by Slade et al.,1 smokers typically take larger and more frequent puffs than those specified by the US Federal Trade Commission puffing regime and they typically smoke Eclipse differently than their usual branded cigarettes. Therefore, it is essential that a weight-of-the-evidence approach, including studies in smokers, be used to characterise potential differences between Eclipse and other cigarettes.1 Urine mutagenicity studies conducted in smokers demonstrate that smokers of ultra low "tar", full flavour low "tar", and full flavour "tar" cigarettes all experience substantial, statistically significant reductions (p < 0.05) in mutagen exposure when they switch to Eclipse.9 Furthermore, additional studies conducted in smokers have demonstrated reductions in bronchial inflammation and inflammation of the lower lung when smokers switch to Eclipse.10 These findings are consistent with reductions in smoker exposure to smoke constituents under actual smoking conditions and support RJRT’s conclusion that Eclipse may reduce the risks of certain smoking related diseases relative to other cigarettes currently on the market.

Author’s reply

Swauger argues that based on the weight of the evidence, Eclipse, compared to other cigarettes, may present smokers with less risk of cancer and other smoking related diseases. He bases this conclusion on “weighing” the scientific research RJ Reynolds Tobacco (RJRT) has conducted on Eclipse. Our study drew the opposite conclusion.2 Our analysis of the Eclipse research suggests that Eclipse is as toxic or more toxic than a number of conventional cigarette brands.

RJRT claims “there is no cigarette like Eclipse” based on a comparison of the smoke chemistry of Eclipse with a typical ultralight, Merit. We tested Eclipse against two other ultralight cigarettes, Now and Carlton, and found the smoke concentrations of four major carcinogens to be substantially lower.2 This indicates that Eclipse claims of being “safer” than conventional cigarettes. These include Omni, Advance, Accord, and a soon to be released Philip Morris product called SCOR. Our study highlights the need for regulation of these products and associated claims by independent agencies such as the US Food and Drug Administration (FDA). RJRT could help “Clear the Air” by supporting pending FDA legislation. Food and drug manufacturers are not allowed to introduce new products into the market and make claims based solely on their own internal research, and nor should tobacco manufacturers. RJRT truly believes in reducing risks of lung cancer and other diseases, the company should request the FDA to evaluate its scientific research and claims before marketing it at the retail level nationally.

J E Swauger
RJ Reynolds Tobacco Co, Winston-Salem, North Carolina, USA

Correspondence to: James E Swauger, PO Box 1487, Winston-Salem, NC27102-1487, USA; swaugej@rjrt.com

References

1 Slade J, Connolly GN, Lyperis D. Eclipse: does it live up to its health claims? Tobacco Control 2002;11:suppl 1; i64–70.

Seasonality in cigarette sales: patterns and implications for tobacco control

Cigarette smoking is the leading public health problem in the USA, contributing to over 400 000 deaths a year.1 Given its importance, the tobacco control community should be aware of all significant patterns in the consumption of cigarettes and the potential of these patterns to be relevant to efforts aimed at tobacco control. Unfortunately, little attention has been paid to the seasonal nature of smoking. Findings on seasonal patterns may have major implications for the timing of interventions designed to manage the tobacco problem, both in the USA and in other countries.

In this letter, monthly data for cigarette sales at the state level for the USA are analysed to test for the presence of seasonality and to characterise the phenomenon. The results reveal a seasonal pattern that is significant both in the statistical sense and in its magnitude. This includes a significant drop in the winter months of January and February, and an increase during the summer months of June, July, and August.2 Because seasonality in sales does not reflect seasonality in production, it must be inferred that the seasonality is driven by wholesale and retail phenomena, including consumption.

The data used in this study are monthly figures for sales of cigarettes by wholesalers aggregated at the state level between January 1983 and July 2000. Until December 1997, the Tobacco Institute was responsible for their collection.3 For the period following this, the firm Orzechowski and Walker produced the data.4
Two methods were used to examine seasonality. The first was spectral analysis, which identifies cyclical patterns in the data. If a cycle of a particular length is revealed to be important, then a systematic phenomenon is identified cyclical patterns in the data. If a particular component is found, the spectrogram was significantly (5% level) different from that produced by a uniform random process (Bartlett’s test). The state level data contain a prominent 12 month cycle, indicating seasonality. In addition, for 46 of the 51 locations studied, the seasonality of the data would be statistically different from that produced by a white noise or uniform random process (Bartlett’s test). The second cycle of a particular length is revealed to be seasonal. In addition, for 46 of the 51 locations studied, the seasonality of the data would be statistically different from that produced by a white noise or uniform random process (Bartlett’s test).

Table 1 Summary statistics on seasonality of cigarette sales

<table>
<thead>
<tr>
<th>State</th>
<th>Spectral analysis (p value for Bartlett’s test)</th>
<th>Stable seasonality test (p value)</th>
<th>Seasonal factor range</th>
<th>Months with extreme seasonal effects (month name and number of times the month is a high-2 or low-2 seasonal factor)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Most frequent high month</td>
</tr>
<tr>
<td>Alabama</td>
<td>0.0133</td>
<td>&lt;0.0001</td>
<td>23.97</td>
<td></td>
</tr>
<tr>
<td>Alaska</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>56.45</td>
<td></td>
</tr>
<tr>
<td>Arizona</td>
<td>0.0016</td>
<td>&lt;0.0001</td>
<td>22.69</td>
<td></td>
</tr>
<tr>
<td>Arkansas</td>
<td>0.0175</td>
<td>&lt;0.0001</td>
<td>27.73</td>
<td></td>
</tr>
<tr>
<td>California</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>21.67</td>
<td></td>
</tr>
<tr>
<td>Colorado</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>28.50</td>
<td></td>
</tr>
<tr>
<td>Connecticut</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>24.17</td>
<td></td>
</tr>
<tr>
<td>Delaware</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>61.65</td>
<td></td>
</tr>
<tr>
<td>DC</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>50.25</td>
<td></td>
</tr>
<tr>
<td>Florida</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>13.90</td>
<td></td>
</tr>
<tr>
<td>Georgia</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>178.69</td>
<td></td>
</tr>
<tr>
<td>Hawaii</td>
<td>&lt;0.0001</td>
<td>0.0111</td>
<td>36.99</td>
<td></td>
</tr>
<tr>
<td>Idaho</td>
<td>0.0002</td>
<td>&lt;0.0001</td>
<td>36.28</td>
<td></td>
</tr>
<tr>
<td>Illinois</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>26.16</td>
<td></td>
</tr>
<tr>
<td>Indiana</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>27.35</td>
<td></td>
</tr>
<tr>
<td>Iowa</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>32.61</td>
<td></td>
</tr>
<tr>
<td>Kansas</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>24.35</td>
<td></td>
</tr>
<tr>
<td>Kentucky</td>
<td>0.2371</td>
<td>&lt;0.0001</td>
<td>41.76</td>
<td></td>
</tr>
<tr>
<td>Louisiana</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>30.75</td>
<td></td>
</tr>
<tr>
<td>Maine</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>30.63</td>
<td></td>
</tr>
<tr>
<td>Maryland</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>28.16</td>
<td></td>
</tr>
<tr>
<td>Massachusetts</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>30.49</td>
<td></td>
</tr>
<tr>
<td>Michigan</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>19.85</td>
<td></td>
</tr>
<tr>
<td>Minnesota</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>35.46</td>
<td></td>
</tr>
<tr>
<td>Mississippi</td>
<td>0.0913</td>
<td>&lt;0.0001</td>
<td>23.02</td>
<td></td>
</tr>
<tr>
<td>Missouri</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>20.18</td>
<td></td>
</tr>
<tr>
<td>Montana</td>
<td>0.0067</td>
<td>&lt;0.0001</td>
<td>38.40</td>
<td></td>
</tr>
<tr>
<td>Nebraska</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>29.32</td>
<td></td>
</tr>
<tr>
<td>Nevada</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>20.12</td>
<td></td>
</tr>
<tr>
<td>New Hampshire</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>38.16</td>
<td></td>
</tr>
<tr>
<td>New Jersey</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>27.43</td>
<td></td>
</tr>
<tr>
<td>New Mexico</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>29.30</td>
<td></td>
</tr>
<tr>
<td>New York</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>27.17</td>
<td></td>
</tr>
<tr>
<td>North Carolina</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>35.29</td>
<td></td>
</tr>
<tr>
<td>North Dakota</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>29.53</td>
<td></td>
</tr>
<tr>
<td>Ohio</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>23.43</td>
<td></td>
</tr>
<tr>
<td>Oklahoma</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>27.59</td>
<td></td>
</tr>
<tr>
<td>Oregon</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>28.45</td>
<td></td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>25.68</td>
<td></td>
</tr>
<tr>
<td>Rhode Island</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>30.87</td>
<td></td>
</tr>
<tr>
<td>South Carolina</td>
<td>0.1222</td>
<td>&lt;0.0001</td>
<td>29.95</td>
<td></td>
</tr>
<tr>
<td>South Dakota</td>
<td>0.0128</td>
<td>&lt;0.0001</td>
<td>34.99</td>
<td></td>
</tr>
<tr>
<td>Tennessee</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>29.62</td>
<td></td>
</tr>
<tr>
<td>Texas</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>27.65</td>
<td></td>
</tr>
<tr>
<td>Utah</td>
<td>0.1037</td>
<td>&lt;0.0001</td>
<td>34.04</td>
<td></td>
</tr>
<tr>
<td>Vermont</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>29.11</td>
<td></td>
</tr>
<tr>
<td>Virginia</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>33.38</td>
<td></td>
</tr>
<tr>
<td>Washington</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>26.53</td>
<td></td>
</tr>
<tr>
<td>West Virginia</td>
<td>0.2684</td>
<td>&lt;0.0001</td>
<td>21.95</td>
<td></td>
</tr>
<tr>
<td>Wisconsin</td>
<td>&lt;0.0001</td>
<td>&lt;0.0001</td>
<td>24.27</td>
<td></td>
</tr>
<tr>
<td>Wyoming</td>
<td>0.0237</td>
<td>&lt;0.0001</td>
<td>38.51</td>
<td></td>
</tr>
</tbody>
</table>

*All 34 (17×2) possible occurrences of “high-2” or “low-2” months are represented by the two tied “most frequent” months.
†This was confirmed by parallel analyses of production data and discussions with an expert on the production of tobacco.
Possible causes of seasonality include the effect of climate on smoking behaviour (low in cold weather and high in mild weather, especially in view of now widespread indoor smoking restrictions across the USA), the timing of tax changes (December-January or June-July), the timing of the new fiscal year (June-July), and the timing of quitting efforts tied to New Year's resolutions (December-January). In the obvious extension to this research, the determinants of this potentially important statistical phenomenon will be analysed in detail.

The present findings demonstrate that sales of cigarettes in the USA have a strong seasonal component. This has potential implication for the timing of cessation initiatives and other time dependent policies. The phenomenon of seasonality could hold the key to significant advances in tobacco control and in the management of a leading public health problem.

S Chandra
Graduate School of Public and International Affairs, University of Pittsburgh, Pittsburgh, Pennsylvania, USA

F J Chaloupka
Department of Economics, University of Illinois at Chicago, Chicago, Illinois, USA

Correspondence to: Siddharth Chandra, GSPIA, 3R25 Wesley W Posvar Hall, University of Pittsburgh, Pittsburgh, PA 15260, USA; schandra@pitt.edu

Acknowledgments
The authors gratefully acknowledge the support of the Substance Abuse Policy Research Program of the Robert Wood Johnson Foundation for supporting this work. Comments from Jonathan Caulkins and the excellent research assistance of Ascarya and Djamaludin AbuBakar are also gratefully acknowledged.

Way-out developments at BATCO
Working in tobacco control, it is easy to get the impression that the tobacco industry is a united front, with all parties carefully avoiding internal divisions that might undermine the greater struggle against the “antis”. However, tobacco industry documents that have been made public as a result of litigation in the USA frequently reveal ruthless competition for market share, as well as intense suspicion about competitors’ activities. This was brought home to us recently when reading a 1977 document on “developments in the scientific field” by Dr Sydney J Green, then British American Tobacco’s (BAT’s) senior scientist for research and development. After several pages of unremarkable reports on industry and external research on low tar cigarettes and smoking and health, Green informed his readers about two “way-out” developments at BAT:

• Way-out development 1: “A way-out development is that of compounds (such as etorphine) which are 10,000 times as effective as analgesics [such as morphine and which are very addictive. It is theoretically possible (if politically unthinkable) to add analytically undetectable quantities of such materials to cigarettes to create brand allegiance. But this thought may suggest the possibility of such compounds occurring naturally.”

We are grateful to Dr Green for clarifying what “brand allegiance” really means for the tobacco industry.

• Way-out development 2: “Another way-out development, which arises from work done in a quite different area, is that it would now be quite feasible and quite inexpensive to produce an unacceptable off-taste in cigarettes from some factories for a prolonged period without approaching nearer than half to one mile.”

In the same spirit of scientific curiosity which no doubt motivated the BATCO researchers, we would be very interested to know the formula for this substance.

On a more serious note, while we were not able to come up with any plausible candidates for a substance that could make way out development 2 feasible, we are concerned that Green was right about the feasibility of adding etorphine or some other addictive substance to cigarettes.

Green’s report followed an earlier memo from Kieth D Kilburn to CI Ayres, expressing
Concern about what BATCO’s competitors might be doing to their “low delivery cigarettes” (that is, low machine measured tar and nicotine yield cigarettes) in order to create brand allegiance. Kilburn proposed that a regular etorphine dose of as little as 0.2 μg per day would be sufficient to create an addictive craving for the source. He also claimed that the required delivery of around 7 ng per cigarette (or around half the delivery of benz[a]pyrene) would be analytically difficult to measure.

Etorphine is a powerful drug with heroin-like effects, which include respiratory failure in the case of overdose. It may be more familiar to many in the “elephant juice”—a veterinary drug with such high potency that a tiny quantity injected from a dart can immobilise an elephant.

The dangers of etorphine to humans have been dramatically demonstrated in accidents during veterinary use, as there have been fatal overdoses to veterinarians attempting to dart large unruly animals. Reputedly, a mere scratch from an etorphine dart has been sufficient in some cases to provide a fatal overdose. As a consequence of these fatalities, veterinarians who are registered to use etorphine must now have an assistant standing by with a dose of an etorphine antagonist in hand.

These observations on the dangers of etorphine underscore Green’s and Kilburn’s essential point: very low concentrations of certain psychoactive substances may be sufficient to produce important effects, including addiction. Fortunately, etorphine has become much more readily detectable in recent years than Green and Kilburn suggested was the case. Because forensic toxicologists have put considerable effort into developing highly sensitive detection methods, however, in a world market with minimal regulation of cigarette additives and limited testing capacity outside the industry’s own laboratories, we should remain concerned about what the tobacco industry might be willing to do in order to create “brand allegiance”.

W King, R Borland
VicHealth Centre for Tobacco Control, the Cancer Council Victoria, Victoria, Australia

M Christie
Department of Pharmacology and The Medical Foundation, University of Sydney, Sydney, New South Wales, Australia

Correspondence to: Bill King, VicHealth Centre for Tobacco Control, the Cancer Council Victoria, 1 Rathdowne St, Carlton, Victoria 3053, Australia; bill.king@cancervic.org.au

How to critique consultancy reports?
The recent proposals for smoke-free legislation in many countries have spawned a multitude of studies which attempt to predict the financial impact of such legislation. As described by Scollon et al in this issue of Tobacco Control, many of these studies fail to achieve basic quality standards and this is more likely when the tobacco industry funds the study. However, findings from such flawed studies can influence policy makers and it is essential that public health advocates have strategies to counter their impact.

In Hong Kong, in 2001, the government proposed to make all workplaces, including catering venues, smoke-free.1 A consultancy report for the catering industry, funded by the tobacco industry, was published shortly after and concluded that the legislation would cause catering industry revenues to drop by 10.6% leading to job losses. This report was based on a survey of customers to catering venues, self reported spend on eating and drinking out, and self predicted changes in the event that catering venues were made smoke-free. Since the methods used were not made clear in the report, we had to attempt to validate or refute the report mainly by an assessment of its findings. We found the following questions useful:

(1) Was the sample used for the consultant’s survey representative of the population being studied (customers of catering venues)1? Since we could not disclose the sample selection was done properly, we had to look at sample characteristics. The prevalence of smokers was much higher than in other survey data indicating a bias in the sample.

(2) Did the consultant’s data, when extrapolated/aggregated, agree with other standard data sources—for example, government statistics? Much of the basic data collected by the consultants was not disclosed in their report but in their case, they had to present some—for example, average weekly spends in the different types of catering venues. From these data we could estimate (a) expected weekly revenue in the catering industry, (b) approximate market shares for the different types of venues, and (c) weekly spend on eating out per household if the consultant’s data were valid. Each of these estimates was quite implausible when compared with data from the census and other government sources.

(3) Could the consultant’s findings be reproduced to shed light on the methods used? Using a subset of data based on random sampling, we tried to recreate the consultant’s findings by deliberately introducing biases and incorrect aggregations which we suspected were present in the consultant’s methods. In this way we were able to produce an almost identical set of results from the new data. On the other hand, when we analysed the new data in an appropriate fashion, we predicted a rise of 5% rather than a drop of nearly 11% in catering revenues.

The best means of influencing policy on smoke-free policies on the hospitality industry.

References

Interest in nicotine replacement therapy among pregnant smokers
In the UK nicotine replacement therapy (NRT) may now be considered for those pregnant women who cannot otherwise stop smoking. However, very little research has been carried out with NRT during pregnancy and the level of interest in using NRT is not known. This letter reports the results of a survey to assess the level of interest in using NRT among pregnant smokers.

Across a seven month period pregnant smokers were identified using the patient administration system of a large district general hospital in south west London. Ethical approval was obtained and participants gave verbal consent via the ward sister. Identified as smokers at their first antenatal booking visit were telephoned within one week of this visit and invited to take part in the survey. The interview took place during the initial telephone call or during a further call within 48 hours of the initial call. All statistical tests were two tailed.

Demographic information was obtained from patient records. All the women were asked “Can I just check, are you still smoking at the moment?” (yes” or “no”). Those still smoking were asked “About how many a day would you say you are smoking at the moment?”, and “Are you thinking of trying to stop?” (yes” or “no”). Those expressing an interest in stopping were asked “Do you think you might want to stop in the next month, or might you prefer to try a bit later on?”. Of the 207 smokers interviewed (fig 1) the large majority were not in professional/managerial occupations (85.0%, 176/207), were white (75.8%, 157/207), and attended their first antenatal booking visit in the hospital (66.7%, 138/207) rather than in the community. The mean (SD) duration of pregnancy was 18.6 (5.6) weeks and the mean (SD) reported number of cigarettes smoked per day was 7.3 (6).

Of those women reporting that they were thinking about stopping smoking 44.7% (67/150) expressed an interest in using NRT. Interest in NRT was higher among women who reported smoking more cigarettes per day (analysis of variance (ANOVA); F = 7.6,
The distinction between a cigarillo and a cigarette has important legal and financial implications. Since the wrapper of a cigarillo contains tobacco, cigarillos are taxed at the same rate as small cigars. In 2002, the US federal tax rate for small cigars was 4 cents per pack of 20, while the rate for cigarettes was 95 cents per pack of 20. While all 50 states impose a tax on cigarettes, only 45 states impose a tax on cigar, which are lower than their cigarette tax.

If Voodoo cigarillos are taxed at the rate of cigars, the lower federal and state taxes mean a higher profit margin for the merchant and/or lower prices for consumers.

In addition to tax differences, labeling the Voodoo product as a cigarillo has important consequences for their regulation. Several states have expanded their definition of tobacco products to include bids, making sales to minors illegal. Illinois, Vermont, and West Virginia banned the sale of bids completely. More recently, California passed a bill prohibiting the sale, distribution or importation of bids except by businesses that prohibit minors, such as bars and casinos. Also, federal legislation to halt the importation of bids into the USA was introduced in 2002.

This new product emerges at a time when bids sales are vulnerable to increased regulation at the state, and possibly the federal level, as well as higher cigarette excise taxes in 19 states in 2002. The Voodoo cigarillo may be a clever way for the tobacco industry to circumvent the regulations and restrictions imposed on bids. Voodoo cigarillos should be reliably tested to determine if manufacturers and vendors are in compliance with federal and state laws.

C Delnevo, M Hrywna, M J Lewis, S Yulis
University of Medicine and Dentistry of New Jersey School of Public Health, New Brunswick, New Jersey, USA

Correspondence to: Cristine Delnevo, 335 George Street, Liberty Plaza Suite 2200, New Brunswick, NJ 08903-2688, USA; delnevo@umdnj.edu

References
1 Kretke International Website. Access date: October 2002. URL: http://www.kretkek.com
Smoking in children’s picture books

The other day, one of the authors went to a public library with his 3 year old daughter to read some picture books to her. Various picture books, from classic to newly published, were available. Classic books are her favourite. First, she chose a book portraying adventures of a naughty monkey named Curious George (by HA Rey). He came to an industrialised country with a man in a yellow hat. My daughter pointed to a picture of the man holding a pipe between his lips. A smoking scene in a picture book for small children!

The next book she chose depicted an elephant named Babar (by Jean De Brunhoff) that fled from his country to Europe after his mother was killed by men. After coming back to his country with western technologies, he changed elephant society into Western-style society and became a king. Again, the King Babar was holding a pipe.

The third book was depicting a monster named Barbapapa living with François’ family (by Tison and Taylor). He had a mysterious ability to metamorphose into anything he desired. Unfortunately, in this attractive book, François’ father was always holding a pipe. Another supporting character was smoking a cigar. Smoking seems to be a symbol of manhood in these children’s picture books.

My daughter then opened books about Moominvalley (by Tove Jansson) and Tintin’s adventures (by Herge) in which some characters were smoking. Finally, I myself selected a book depicting Father Christmas (by Raymond Briggs). On Christmas Eve, Father Christmas delivered presents to children all over the world. After the labourious job, he took a rest smoking a cigar and a pipe.

Picture books reflect the norms or perceptions of our societies. These classic children’s books were first published in times when smoking was not widely acknowledged as harmful and a smoking male adult was one of the sex stereotypes. In addition, pipe smoking seems acceptable in such picture books compared with cigars or cigarettes which are seldom seen.

Caregivers frequently read picture books aloud to children at home, kindergartens, or daycare centres, which may have a considerable influence on preschool children. Young children receive strong messages from pictures. Seeing adult males smoking in picture books, they may take it as a desirable behaviour.

It would be unacceptable to remove smoking scenes from these classic books or eliminate the books themselves. What we can do is to become aware of the potential influence of these books and take a negative attitude to smoking when we read to children. Fortunately, the man in a yellow hat seems to have quit smoking in the new series of George’s adventures.

S Nakahara, S Wakai, M Ichikawa
Department of International Community Health, Graduate School of Medicine, The University of Tokyo, Japan

*Correspondence to: S Nakahara, 7-3-1, Hongo, Bunkyo-ku, Tokyo 113-0033, Japan; shinji@m.u-tokyo.ac.jp

Getting them while they’re young in China. Submitted by Professor TH Lam, Hong Kong.
Smoked-filled rooms: a postmortem on the tobacco deal


Smoke and mirrors

Cigarettes are a major cause of premature death. Cigarettes are addictive. Secondhand smoke can be annoying, but is really not enough of a health risk to justify banning smoking in indoor environments. Payments to states in the Master Settlement Agreement were unjustified since cigarettes are self-financing. States actually save money because smokers die young. Lawsuits against the tobacco industry are without merit, since smokers have long known about the health risks. Continuing efforts to warn the public about the health risks of smoking are unwar- ranted since public awareness of these risks are now universal. Filters and low tar technology have made cigarette smoking safer, but may be counterproductive in encouraging cigarette manufacturers to produce a less toxic cigarette. The government should focus on giving smokers information about the risks posed by different types of cigarettes, which would foster greater competition in the development of safer cigarettes while at the same time preserving individual choice.

Such are the views expressed by Harvard Law Professor W Kip Viscusi in his new book. Is he correct? If cigarette smoking hasn't already caused one to become short of breath, reading this book surely will. Viscu- si's selective presentation of data on what consumers know about the health risks of smoking, the dangers of secondhand smoke, the benefits of filtered and low tar cigarettes, and ultimately who should be held accountable for the massive death toll caused by smoking cigarettes is breathtaking. This book leaves one with the impression that the cigarette industry and not the American public has been the victim in what has been a massive money grab by greedy trial lawyers and some of whom have risked their own personal fortunes to shed light on the lies and deceit of the cigarette industry. He acknowledges that he has served as an expert witness for the cigarette industry. Thus, his diatribe against plaintiff lawyers, some of whom have risked their own personal fortunes to shed light on the lies and deceit of the cigarette industry, seem misplaced. Viscusi ought to take a look in the mirror.

Reading this book leaves one with the impression that the cigarette industry bears no responsibility for marketing what is admittedly a lethal and addictive product that results in the premature death of one out of every two users. Viscusi dismisses the evi- dence that cigarette manufacturers knowingly misrepresented the dangers of smoking to the American public on the grounds that smokers knew everything they needed to know about smoking in order to make an informed choice. However, one needs to question whether this assumption is correct. The evidence presented in chapter 7 to support the claim that smokers are fully informed is far from compelling. Viscusi mis- represents polling data showing that the pub- lic has long been aware of medical reports linking smoking and cancer as evidence that smokers were fully informed of health risks. He must surely recognise that having a general awareness that smoking causes cancer does not necessarily translate into a belief that one is more likely to develop cancer. In fact studies conducted by Viscusi himself demonstrate that smokers as a group are less likely to perceive health risks from smoking compared to nonsmokers. He also fails to mention the known- edge deficits that many smokers have regard- ing compensatory smoking, the lack of benefits from smoking filtered and low tar cigarettes, and the dangers of secondhand smoke.

Viscusi ignores evidence revealing how cigarette manufacturers have designed their cigarettes to induce dependence on nicotine. He also conveniently ignores the data showing that most people begin their smoking careers during their teenage years when health concerns about smoking and addiction are not in the realm of consciousness. Viscusi's chapter on the factors involved in youth smoking behaviour represents an exer- cise in selective recall, laying the blame for youth smoking mainly on parents. Hardly a mention is made of the millions of dollars spent annually by cigarette companies to advertise and promote cigarettes. Viscusi also ignores the mountains of internal industry documents that openly discussed the importance of targeting children to the eco- nomic viability of the cigarette industry. Instead he accepts at face value the industry's claims that they don't want kids to smoke. Viscusi's remedy for the youth smoking prob- lem is to get parents do more to keep their kids from smoking and to enact policies to prohibit the sale of unconventional cigarettes like bids. The discussion of bids is especially odd since he encourages smokers to smoke these products; instead teenagers smoke Marlboro, Newport, and Camel. Thus, while one can hardly argue with Viscusi's plea for better parenting, his failure to recommend stronger measures to curb how tobacco companies market their cigarettes to attract the attention of youthful smokers makes the sincerity of his recommendations suspect.

Viscusi's chapter on the health risks associ- ated with secondhand smoke is grossly uninformed. Much of this chapter reads like it was drawn from industry sponsored websites that have been designed to spread misinformation, downplaying the well documented scientific evidence linking secondhand smoke exposure to a wide array of health risk. Remarkably, Viscusi suggests that limits on indoor smoking are unjustified and bad for the economy because such restrictions cause smokers to consume fewer cigarettes, and, therefore, “losses accrue to society in terms of foregone taxes”. Viscusi's sharp criticism of current public health campaigns to warn the public about the health risks of smoking defies common sense. According to Viscusi, since public awareness of the health risks of smoking are nearly universal, there is no need to keep repeating these messages. In fact he argues that such efforts are counterproductive because people are likely to form unrealistic risk perceptions about smoking. Such reasoning is illogical. By analogy, if one were to accept Vis- cusi's premise that once the public recognises the health risks of smoking there is no need to reinforce health messages, then one would also have to accept the idea that there is no need to spend a dime advertising Marlboro cigarettes since Marlboro Man is nearly universally recognised. Apparently, cigarette manufacturers don't accept Viscusi's logic and nor should the public health community.

Declining cigarette consumption in the USA since the 1960s corresponds directly to in- creased efforts to inform the public of the dangers of tobacco use. Viscusi's criticism of the current wave of edgy in your face counter-advertising campaigns ignores the evidence that these programmes are actually reducing cigarette consumption. Instead of continuing these effective public health campaigns Viscu- si recommends that the government re- focus its efforts towards giving smokers infor- mation about the risks posed by different types of cigarettes in the hope that this would move smokers to use less toxic cigarettes. Viscusi is correct in noting an important deficiency of the Master Settlement Agree- ment that has made it difficult for new tobacco companies to enter the market, thus dampening competition for the development of potentially safer tobacco products. How- ever, his credibility on this subject is dimin- ished by his acceptance of the view that the filtered and low tar cigarettes have actually benefited the public health. Convincing evi- dence to demonstrate a measurable public health benefit gained from lowering the machine measured tar yield of cigarettes has proven elusive. Moreover, on a population wide basis, a strong argument can be made that the marketing of lower tar cigarette brands had an adverse impact on the public's health by convincing a segment of smokers who might have otherwise stopped smoking to maintain their smoking behaviour under the illusion that their disease risk would be reduced by switching to a filtered low tar cigarette.

In summary, Smoked-filled rooms reads more like a legal brief written by a team of tobacco industry lawyers instead of a thoughtful comment- ary on the legal, financial, and social consequences of smoking. As such this book is a must read for plaintiffs' attorneys, but for the rest of us we should stick with "smoke- free rooms".

K M Cummings

References


Hurt RD, Robertson CR. Prying open the door to the cigarette industry’s secrets about nicotine – the Minnesota tobacco trial. JAMA 1998;280:1173–81.


Disclosure
K Michael Cummings is not an unbiased observer of Dr Viscusi’s research and writings. He has served as a paid expert witness on behalf of plaintiffs counsel in several of the same cases in which Dr Viscusi also served as an expert for the cigarette industry. Dr Cummings is currently employed as a senior research scientist and is chairman of the Department of Health Behavior in the Division of Cancer Prevention and Population Sciences at the Roswell Park Cancer Institute in Buffalo, New York, USA. His salary support comes primarily from Roswell Park Cancer Institute and from research funding provided by the National Cancer Institute, the Robert Wood Johnson Foundation, the American Legacy Foundation, and New York State Department of Health. Dr Cummings serves on the medical advisory board for the Flight Attendant Medical Research Institute (FAMRI) and has served on various scientific advisory boards and grant review committees for National Institutes of Health, Centers for Disease Control and Prevention, American Cancer Society, Canadian National Cancer Institute, Robert Wood Johnson Foundation, and state and local health agencies for which he has received honoraria. Dr Cummings has also received honoraria and has accepted hospitality and on a few occasions, travel costs, from pharmaceutical companies making tobacco dependence treatment products.