Cardiovascular disease is the commonest cause of mortality in Australia, accounting for more than 30% of deaths.\(^1\) Hypertension, diabetes and lipid disorders account for 15.6% of the total problems encountered in general practice.\(^2\) Therefore all doctors should be familiar with well known risk factors for cardiovascular disease, as well as the benefits of interventions with them.\(^3\) There are a number of absolute risk calculators available such as the New Zealand Cardiovascular Risk Calculator (www.nps.org.au/docs/pdfs/cardiovascarrisk.pdf) and the Framingham Heart Study Prediction Score Sheets (www.nhlbi.nih.gov/about/framingham/riskabs.htm). There are also numerous guidelines on management,\(^4\) but these usually focus on single interventions and are liable to become outdated as new evidence emerges.

Method

A multidisciplinary group of physicians formulated a concise and up-to-date guide for the prevention of cardiovascular disease based on a rigorous analysis of the available published evidence.\(^3\) This information was condensed into a single page desktop chart for clinical use. Between July and October 2001, five meetings organised by a pharmaceutical company were held in Sydney, Brisbane, Adelaide, Melbourne and Perth. The meetings were about risk factors and management of cardiovascular disease to which general practitioners were sent postal invitations. They lasted 2 hours, attracted quality assurance and continuing medical education points from The Royal Australian College of General Practitioners and were chaired by a local GP. They took the form of two interactive presentations from a local cardiologist and GP academic, followed by questions and discussion, and ended with supper. During the course of the meeting, GPs were provided with the evidence based clinical aid.

Participants were asked to complete an 18 item questionnaire seeking their views on evidence based medicine (EBM) in general, and on the clinical aid in particular. This feedback guided the final development of the aid that was published 2 years later.\(^3\)

Results

Out of 335 questionnaires distributed, 259 were completed (77% response rate). The responding GPs were more likely than those participating in the Bettering the Evaluation and Care of Health (BEACH) program in 2001–2002 to be male and in solo or small practices (Table 1).

When asked the sources used to access the latest EBM; 75% cited clinical journals, 58% pharmaceutical company representatives, 42% clinical meetings, and 22% cited the internet. Asked about the relevance of EBM, 82% stated it was difficult to be continuously up-to-date with the latest evidence, 69% wanted to be aware of the evidence; but only 29% believed it was the basis for ‘gold standard’ clinical practice.

The evidence based clinical aid was thought appropriate and relevant to practice by 77%, although 39% suggested changes. These included having some linkage to a computerised format (71%), simplifying the text and layout (45%), and providing more explanation (8%). When asked the best way for GP colleagues to be introduced to the clinical aid, 53% identified small workshops, 44% meetings such as they were attending, and 28% identified divisions of general practice.

Discussion

Our primary aim was to provide a summary of the evidence for cardiovascular disease in a user friendly format according to the...
The strong support for having some linkage between clinical practice guideline authors and the pharmaceutical industry (of particular concern if there are strong interactions between this may reflect a considerable influence of the organised by a pharmaceutical company this popular source). As the meetings were latest evidence was from pharmaceutical company representatives (the second most useful pointers for guideline developers, policy makers and health service managers.

Table 1. Characteristics of the GPs responding compared with those participating in the BEACH program

<table>
<thead>
<tr>
<th>Characteristics</th>
<th>Respondents (%) (n=259)</th>
<th>95% confidence limits</th>
<th>GPs participating in BEACH (%) (n=1000)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Sex</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>80</td>
<td>(75.1–84.9)</td>
<td>64</td>
</tr>
<tr>
<td>Female</td>
<td>20</td>
<td>(15.1–24.9)</td>
<td>36</td>
</tr>
<tr>
<td><strong>Age range</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>&lt;35</td>
<td>7</td>
<td>(3.5–9.5)</td>
<td>7</td>
</tr>
<tr>
<td>35–44</td>
<td>23</td>
<td>(17.9–28.1)</td>
<td>27</td>
</tr>
<tr>
<td>45–54</td>
<td>42</td>
<td>(35.5–47.5)</td>
<td>37</td>
</tr>
<tr>
<td>55+</td>
<td>29</td>
<td>(23.5–34.5)</td>
<td>30</td>
</tr>
<tr>
<td><strong>Practice size</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Solo</td>
<td>27</td>
<td>(21.4–32.2)</td>
<td>15</td>
</tr>
<tr>
<td>2–4</td>
<td>46</td>
<td>(39.4–51.6)</td>
<td>40</td>
</tr>
<tr>
<td>5+</td>
<td>28</td>
<td>(22.2–33.0)</td>
<td>45</td>
</tr>
</tbody>
</table>

**Implications of this study for general practice**

- Out of 259 GPs surveyed at pharmaceutical company sponsored educational meetings on cardiovascular disease guidelines:
  - 75% said they used journals as a source of evidence
  - 58% pharmaceutical representatives
  - 42% clinical meetings, and
  - 22% used the internet.
- Many felt positive about EBM and decision aids, although 82% thought it was difficult to maintain being up-to-date with the latest evidence.
- Only 29% thought EBM was a basis for gold standard clinical practice.
- GPs thought being engaged in developing decision support tools before dissemination should increase acceptability and uptake.

Conflict of interest: the author received an honorarium for his presentations at the educational meetings. The development of the evidence based clinical aid was supported by an unconditional grant from Aventis Pharma, which had no input into the writing of this article.

References