# ACE-inhibitors – an analysis of marketing strategy

by Jean-Michel Peny

In the past, leading pharmaceutical companies have increased their sales forces considerably in an attempt to push up sales growth. But today the winning strategies are different.

Cost-containment measures currently being introduced by most European governments to reduce reimbursed drugs expenditure are slowing down pharmaceutical market growth as well as altering company profitability. Many European governments are limiting compagrowth nies' annual (eg Germany, France) and/or promotional investment (UK, France).

Optimising the productivity of marketing investment is probably the best way for research-based pharmaceutical companies to protect their profits. Marketing represents the largest business cost (typically 25% of the ethical drug selling price) but it has never been submitted to a stringent efficiency assessment.

There is an urgent need to evaluate, systematically, the return on companies' strategic marketing choices. In this context, the international consulting firm Bain & Co, in association with students of the Paris business school ESCP, has recently carried out a study\* of the ACEinhibitor market in France. The study analysed product performance, prescribers' behaviour and companies' marketing efficiency, revealing this sector's heavy reliance on a market share conquest strategy.

### Product performance

The ACE-inhibitor market in France is just 12 years old but it is already mature. In 1993

sales of pharmaceuticals in France reached US\$14 billion, of which the hospital market represented US\$2 billion. With sales of US\$358 million on the private market, ACE-inhibitors (excluding fixed combinations with diuretics) represent the second largest therapeutic class in the antihypertensive market, just behind the calcium channel blockers. Some 60% of this revenue is shared between three ACE-inhibitors - Lopril (captopril), Renitec (enalapril) and Coversyl (perindopril) - with 11 others competing for the remaining 40%.

On average, 81% of the revenue for ACE-inhibitors is from prescriptions to control blood pressure, although the compound annual growth rate (CAGR) for the period 1989-1993 was slightly lower than for the combined antihypertensive classes (5% vs 6%). The main growth driver is indications in cardiology – cardiac

insufficiency, ischaemic cardiomyopathy, etc – which currently contributes 19% of the revenue.

#### Time to market

The 14 ACE-inhibitor brands may be split into three groups based on their year of introduction on the market:

- •The 'precursors' (1982-1986).
- •The 'followers' (1987-1991).
- •The 'new entrants' (1992-1993).

Between 1989 and 1993 market growth was mainly driven by the followers (US\$124 million) and to a lesser extent by new entrants (US\$15 million). During the same period, precursors sales went down by US\$72 million, mainly because of a volume decrease (US\$65 million) resulting from a rapid follow-on introduction of metoo competitors.

As can be seen in Figure 1, the timing of a product's entry on to the market clearly influences its sales performance. The later the entry on the market, the lower the product return on investment and product contribution. The notable exception, Rhône-Poulenc Rorer's low 1993 sales of Captolane (captopril), was a result of the company's strategic choice to disinvest its promotional resources and focus its efforts on one of its other products, Captea, which is a fixed captopril/ hydrochlorothiazide combination.

# Return on promotion

Between 1989 and 1993 the cost of gaining an additional 1% of market share, measured in promotional investment, doubled from US\$4 million to US\$8million. The market share gain seems to be proportional to the level of promotional investment, although there were some important variations in efficiency between precursors, followers and new entrants. Thus, despite similar cumulated promotional investment since the introduction of both products, the cumulated sales of the follower, Coversyl, represent only one third of those of the precursor, Renitec.

As can be seen from Figure 2, the cumulated contribution of the ACE-inhibitors shows that there is an exponential decrease of product contribution depending on the year they were introduced on the market.

The contribution of the best follower, Coversyl, is only a

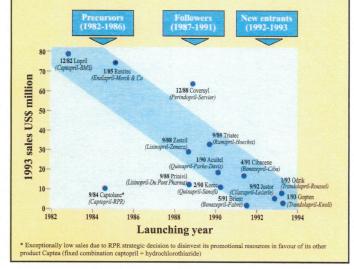


Figure 1: Segmentation of the ACE-inhibitor market. Source: IMS data and Bain analysis.

\*The study is based on data provided by the service companies IMS, GERS, CAM and Walsh International, and face to face interviews with 116 GPs, 19 cardiologists, and 15 marketing and sales executives from the 14 ACE-inhibitor companies.

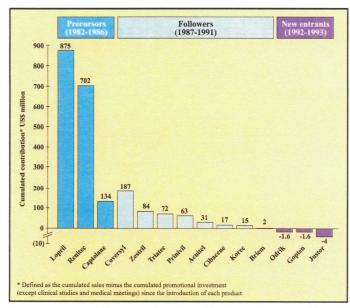


Figure 2: ACE-inhibitors' cumulated contribution. Source: IMS data and Bain analysis.

fifth of the best precursor, Lopril. The average annual contribution of the two precursors, Lopril and Renitec, is four times higher than that of the followers, while Coversyl generates an annual contribution three and a half times superior to the average of the other followers. Moreover, the return on investment of Lopril and Renitec is three times higher than that of the top followers, Coversyl, Zestril (lisinopril) and Prinivil (lisinopril).

#### Prescribing behaviour

The second area looked at by the study was prescribing behaviour. It found that doctors' prescribing decisions are mainly led by medico-scientific factors such as clinical acceptability, efficacy, dose regimen and the opinion of cardiologists. Perceived quality of medico-marketing factors, like contacts with medical representatives, medical information or company image was also valued, but to a lesser extent. Economic factors, such as daily treatment cost of the product, do not have a significant impact on prescribing behaviour, despite the difference of 46% between the most expensive brand, Prinivil, and the cheapest, Captolane.

Significant differences were noted between the prescribing decisions of general practitioners (GPs) and cardiologists. A gap analysis between the two groups shows that the former gives more importance to dose regimen when choosing an ACE-inhibitor. Cardiologists, on the other hand, are more influenced by the quality of both the medical information they receive and the medical meetings they attend (Figure 3).

It also seems that pharmaceutical executives have a tendency to overestimate the importance prescribers attach to the professionalism of medical representatives, to clinical studies and to service quality. On the other hand, they appear to underestimate the importance of product efficacy and acceptability, as well as the quality of medical information.

# Prescriber defection

The study also identified the major causes of reduced prescribing of a given ACE-inhibitor brand, and for switching to another drug.

Company image was found to elicit greater loyalty among cardiologists than among GPs. On the other hand, cardiologists are less likely to switch their prescription to newly introduced ACE-inhibitors.

Major discrepancies were also highlighted between the perceptions of pharmaceutical executives and doctors. Executives tend to underestimate the impact of referred cardiologists' opinions, of product features (acceptability, efficacy, dose regimen) and also the negative effect of excess medical calls on prescribers.

# Prescription switches

The ACE-inhibitor market provides little opportunity for doctors to switch to new treatments, however, because prescription switches and newly diagnosed patients are limited in number. Out of the 7.7 million prescriptions for ACE-inhibitors written in 1993, only 10% corresponded to the introduction of new treatments. The rest were prescription renewals.

A detailed analysis of 418 switches out of 5,048 prescriptions filled in 1993 shows a transfer of prescriptions from ACEinhibitors to calcium channel blockers, centrally acting hypotensives and fixed ACE-inhibitor/hydrochlorothiazide combinations. This trend is confirmed by ACE-inhibitor sales between 1989 and 1993 in the sole indication, 'hypertension' (CAGR:3%) which is lower than the calcium channel blockers (CAGR:11%), centrally acting hypotensives (CAGR:8%) and the fixed ACEinhibitor/hydrochlorothiazide (CAGR:15%) combinations.

Over the same period the precursors, Lopril and Renitec, have been the main losers, with a CAGR of -13% and -10% respectively in the indication 'hypertension'. Almost 40% of the prescriptions lost by Lopril were the result of transfers to other ACE-inhibitors, mainly to new entrants. For Renitec, transfers represented 22% of prescription losses, mainly to followers.

# Prescriber loyalty

The key to high sales levels appears to involve three crucial elements: company image, the quality of the company's ACEinhibitor, and the quality of service delivered. When doctors were asked to rank these three dimensions, known as the 'quality mix' (see September 1993, Scrip Magazine) there was a high correlation between a company's performance on the three dimensions of the 'quality mix' and its sales level. The top three companies in terms of 'quality mix' ranking - Bristol-Myers Squibb, Merck & Co and Servier - have the three top selling brands on the ACE-inhibitor market, ie Lopril, Renitec and Coversyl. As some of the key factors that determine cardiologists' and GPs' prescriptions or defections differ, it is therefore important for marketing executives to identify these differences and to adapt their marketing approach accordingly.

# Marketing efficiency

In the absence of significant pharmaco-clinical perceived differences between the 14 ACE-inhibitors on the market,

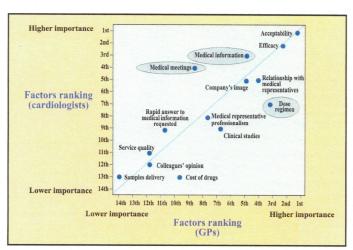


Figure 3: Factors influencing doctors' prescriptions of ACE-inhibitors (cardiologists/GP gap analysis).

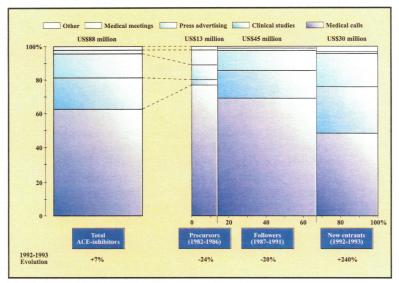


Figure 4: ACE-inhibitors' promotional mix (1993). Source: CAM.

product positioning is of strategic importance. Precursors are looking for additional prescriptions in new indications like post-infarction, diabetic hypertension (Lopril, Captolane, Prinivil) or left ventricular dysfunction (Renitec). The three followers, Triatec (ramipril), Acuitel (quinapril) and Cibacene (benazepril) highlight the potential target organ protection they provide. Justor (cilazapril), Zestril and Coversyl emphasise protection from the point of view of artery ageing. Briem (benazepril) and Korec (quinapril) stress convenience of use and patient benefit in terms of compliance, Odrik (trandolapril) promotes, with a certain success, its round the clock efficacy, and Gopten (trandolapril) its particular suitability for hypertensive obese patients.

It is interesting to note the case of the French pharmaceutical company, Servier, which leveraged successfully, at the time it launched its ACE-inhibitor, Coversyl, the national preference of certain doctors.

### Promotional mix

With the exception of the precursors, ACE-inhibitors represent a priority in terms of promotional investment for the companies which market them. In contrast with the precursors, and with the exception of

Prinivil, the followers increased sales in 1993 over the previous year. Among them, only Coversyl and Triatec have a market share superior to their promotional investment share.

Surprisingly, medical meetings account for only 2.5% of ACE-inhibitor marketing expenses, while they represent for the doctors the second most influential medium on prescription choice, just after medical calls.

Precursors and followers reduced their promotional investment by around 20% in 1993. Medical calls, including sales force expenses, represented 77% of the precursors' promotional expenditure, but less than 50% for the new entrants (Figure 4). In 1993, Renitec's promotional expenses were reduced by US\$3 million, a reduction of 38% over 1992. In contrast, the Lopril investment in press advertising continued. Among the followers, only the Zestril investment (+18%) increased over 1992. The amounts invested in press advertising for Coversyl were equal to the combined investments of the seven other followers. Clinical studies (Phase IV) and press advertising accounted for 47% of that invested in the new entrants. In 1993, Roussel invested two and a half times more in promoting Odrik than Knoll spent on co-marketing its counterpart, Gopten.

#### Sales force

The study also found important differences in the size of a company's sales force. The average number of medical representatives promoting ACEinhibitors in each company is 175, although numbers ranged from 325 in one company to 83 in another. Considering that medical representatives spend an average 10% of their time calling on doctors and the remaining 90% on activities that are not directly productive, such as transportation,

waiting time, administration, training and other meetings, there is scope for productivity improvements.

The use of Electronic Terri-Management Systems (ETMS) may help medical representatives to optimise their time spent on support activities, and thus increase the effective time spent with prescribers. At the moment, only two out of the 14 companies have equipped their sales force with portable computers, and six with videocapabilities (Minitel). Analysis of medical call efficacy shows important differences between companies. For

example, 50% of 'non-prescribing' GPs visited by Bristol-Myers Squibb medical representatives said they would switch to Lopril, compared with 33% for Merck & Co's Renitec.

In spite of entering the market later than the precursors, Lopril and Renitec, Coversyl has a similar prescriber base of almost 22,000 doctors, each of whom generates an average of US\$3,000 per annum. The customer base of the other followers is much smaller, with an average 10,000 prescribers and annual sales per capita which vary from US\$1,625 (Korec) to US\$2,879 (Triatec).

#### Prescriber base

In order to improve the efficiency of their promotional investment, most pharmaceutical companies have segmented their prescriber base. The two most common criteria selected are the doctor's general prescription level (TVF index) and more specifically, the doctor's prescription level of ACE-inhibitors (Icomed/Logimed surveys). Around 20% of French doctors visited by pharmaceutical companies are targetted, representing around 9,300 doctors.

Based on prescription information collected from questionnaires sent to 12,327 GPs in January 1994, the Bain & Co

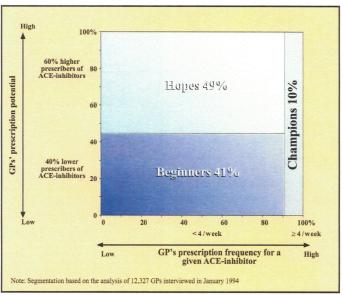


Figure 5: ACE-inhibitors' prescribers segmentation. Source: Logimed (Walsh) and Bain analysis.

# talking points

study categorised prescribers according to their prescription potential for ACE-inhibitors and the frequency with which they prescribe a given brand (Figure 5). Three segments were identified:

- •The Champions, who prescribe a given brand more than four times a week.
- •The Hopes, who represent the top 60% higher prescribers of ACE-inhibitors but prescribe a given brand less than four times a week.
- •The Beginners, who correspond to the 40% lower prescribers of ACE-inhibitors, and who also prescribe a particular brand less than four times a week.

The target prescribers on whom the pharmaceutical companies focus their promotional efforts are represented by the Champions, and to a lesser extent, the Hopes. Usually, in dealings with these Very Important Prescribers/Prospects (VIP), the companies increase the number of annual medical calls, invite them to dedicated meetings or provide specific services, such as books, special events, etc. Surprisingly, only 25% of the companies interviewed said they had designed calls specially for these VIPs.

Of the companies marketing ACE-inhibitors, 38% have developed direct-to-patient communication actions mainly through documents to be handed over by the doctors (eg information leaflets on hypertension, patient index cards with dietetic advice,

etc) or through sponsorship of patients associations. Only one company mentioned the use of general public media like magazines or television to inform patients on their pathology.

Pharmaceutical companies do not seem to have been able to create a sustainable competitive advantage through differentiated product positioning or a more efficient prescriber segmentation. The analysis of companies' promotional mix, sales force activity and structure shows important differences between

be envisaged, depending on the prescriber segment on which a company wishes to concentrate its promotional efforts:

- •A prescribers' retention strategy by which they will try to keep their Champions by offering differentiated services adapted to their expectations.
- •A prescribers' conquest strategy that will be more appropriate to gain new prescribers amongst the Hopes by highlighting the competitive advantages and benefits of the company's product.

•A niche strategy to attract

prescriptions from Beginners who are generally of less interest to the competitors. The strategy of each pharmaceutical company and its resource allocation will be a combination of these approaches and will depend on its resource availability and on its strengths

and weaknesses by prescriber segment.

So far most of the pharmaceutical companies competing within the ACE-inhibitor market in France have followed a market share conquest strategy whose success depends largely on the level of promotional investment. Thus the strategies implemented show little differentiation, if any, while resources invested are very high

With sales showing a strong correlation to the amounts spent, the search for an optimi-

sation of the promotional investment remains limited. In the current climate, an overall conquest strategy applied to all prescribers/prospects without careful targetting or choice could prove extremely expensive and give a low return. In contrast, a prescribers' retention strategy, based on the optimisation of companies' 'quality mix' represents an alternative that may protect or even improve their margins.

Retention strategies are particularly adapted to precursors like Lopril or Renitec and to the follower Coversyl, whose number of prescribers is important and for which the risk of switches to new entrants is high. The other followers with smaller prescriber bases face a choice between focusing on retention of their current prescribers or on conquering non-prescribers with a high potential.

The new entrants may choose between a market share conquest strategy applied on their entire target which could prove extremely expensive or alternatively, a niche strategy limited to Beginners, ie low prescribers of ACE-inhibitors, since this segment is less competitive and the entry cost lower.

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competitors in terms of strategic choices and levels of efficiency.

#### Future strategies

On the whole, pharmaceutical companies measure the overall impact of their promotional investment but rarely do they measure their specific efficiency. The likelihood of an imposed reduction in promotional expenses in future will make it necessary for these companies to look for highly efficient marketing strategies. Three different approaches can