VAPOCURE LIMITED

An Address by

Alan McInnes

Managing Director, Vapocure Limited to The Securities Institute of Australia, New South Wales Division, April 9, 1984.

THE VAPOCURE PROCESS

Let me outline the main details of the development of Vapocure Limited. In the beginning there was a germ of an idea. This idea had to do with the concept that it was not necessary to use enormous, high temperature, baking ovens to accelerate the chemical reactions needed to “dry” industrial paint finishes. This may not seem a great thing until you consider that virtually everything we need and use in this industrial society we live in has to be painted to be useful, protected and decorative.

With a high temperature profile not only were vast amounts of energy needed but great areas of heat sensitive materials were excluded. Every production line in the industrialised world ended up in a painting line where the speed of paint drying was the controlling factor in how fast goods could be produced and therefore how economically they could be produced for you and me to buy.

And talking of the economics of the industrial world’s production lines, it must be pointed out that because the high temperature profile of the paint baking oven excluded all heat-sensitive materials and components, the modern industrial article tends to be built back to front and inside out. For example, for an automobile or refrigerator, the metal shell is constructed, primed, painted and baked and only then can all the heat-sensitive materials and components be added.

In the case of an automobile, that newly painted and baked glistening body shell looks the most attractive it ever will in its lifetime. The reason is simply that, after painting, that shell is then worked on by a thousand hands installing interior trim, seats, dash, steering wheel, engine, tyres etc., etc., and naturally some damage must be expected no matter how much care is taken. With refrigerators in situ foamed insulation is applied and all fittings added to the painted shell to complete the final article.

Any damage means that the article is then subject to expensive rework which must be done of course off the production line and at either room temperature or a low bake condition. So, one can see that the accepted conventional wisdom of the high temperature baking process contains many hidden costs to the industrial society.

Vapocure replaced that conventional oven with a catalytic process whereby controlled parts per million of catalyst molecules are dissolved in air, and the air is recirculated. The painted object, with specially formulated paints, instead of passing into an oven, goes through an air curtain, is exposed and permeated by the catalyst molecules from the airstream and then reacts very rapidly to give curing at room temperature.

In direct contrast to the broad spectrum, sledge hammer approach of the thermal oven, Vapocure uses a catalyst to lower the energy threshold needed for particular precise reactions to take place. Catalysts are, of course by no means new and in fact all biological organisms use them continuously in the very delicate and highly sophisticated chemistry of the living organism. The trick with the use of catalyst is to have it at the reactive sites precisely when one wants it and not before. And that’s where we feel the essential novelty of the Vapocure Process is established.

So all of a sudden it is a whole new ballgame for the production engineer and for the efficiency of production of industrial manufacture. The production engineer now has a multitude of options open to him to increase his efficiency that did not exist prior to Vapocure. He can employ timber, plastics if he wishes in the same painting and curing cycle as metals — he can paint fully-assembled components, such as shock absorbers, gas hinges — if he wishes, and it is sensible to do so, he can paint the final, fully-assembled car, refrigerator, electronic equipment as the last step in his production process allowing a pristine article to be placed in the ultimate packaging.

In short, he can save his company a great deal of money. So perhaps one can understand that the process is causing some excitement in the industrialised world.
EXPLORATION OF THE PROCESS THROUGH TECHNOLOGY TRANSFER

Vapocure has chosen the route of technology transfer rather than the route of manufacturing a Vapocure product to sell against the rest of the world. We protected the process by patents and trademarks and signed Trade Secrets and Patent Agreements internationally. Where it was sensible to do so we signed Franchise Agreements with major companies in given territories which allowed the Franchisee to, in turn, sell sublicences non-exclusively throughout the area.

This technology transfer route is now proving to be successful and is building up a Vapocure community around the world which generates royalty flow back to Vapocure. The world’s industrial paint market is approximately half the total paint market and is currently estimated to be in the vicinity of ten billion US dollars annually. Simple mathematics throw up the stark facts that, if the Vapocure licensed community of paint manufacturers achieve a 5 per cent penetration of that market, then a 5 per cent royalty on that penetration could generate twenty five million dollars.

This throws up an interesting point in that such mathematics were too bullish to place into a Prospectus despite the fact that it is not our fault that the industrial paint market internationally is ten billion US dollars nor that our declared aims and thrust in Vapocure is to attack that market as effectively as we could. Such statistics surely are material information to any intending investor and to withhold that information seems strange logic.

If a manufacturer of footwear was preparing a Prospectus it surely would not be out of order for him to quote the value of the footwear market in Australia, for example. Perhaps it was just the size of the figures that seemed too bullish and yet, if Australians are to develop a market, then they must address themselves to the international market.

If one approaches an Australian manufacturer and asks him what the market for his product was, he very likely would consider the market in Sydney and Melbourne and then add a bit more for Brisbane and Perth. If one asked the same question of a Japanese executive he would immediately consider the total world market for his product.

PROBLEMS OF THE EARLY YEARS

In 1975 Vapocure International was formed and some early licences were sold to companies in the graphic arts. It was a continuing hand to mouth existence and, in 1979, with great progress having been made in the process application to industrial painting, it became apparent that a partner had to be found if the process was not to be dropped and possibly lost forever. A number of large public companies were approached with a view to some form of joint venture.

It is fascinating to recall that these companies were all extremely impressed with the basic concept and with the technology that we had built up to that stage. What they plainly could not believe was that it had been developed in this country. There were a number of phrases, Freudian slips, that kept recurring in these conversations. One was “I presume this process was developed in America”. Another which even today should bring tears to the reader’s eyes was “If this process is so good, why isn’t somebody else using it?” The implications of that question are positively breathtaking. And, additionally, it was often delivered as a trump card.

Typically, these discussions went on for extraordinary lengths of time. It was nothing to find that conversations with a potential backer lasted three months. In that time they took up a great deal of one’s energy and working time before finally, reluctantly, not proceeding. It became obvious even to the meanest intelligence, that these long conversations had to do with trying to find a reason why they should not proceed.

It may well be that the process could have found a backer in one of the larger paint companies but that is precisely the trap that new technology should avoid in that, once you have sold the technology to an established company, you have given that company the right either to have monopolistic control of the development of the process or to freeze it as a proven resource to be opened up at some later and more suitable date.

Banking institutions were approached and, although this was only four years ago — and I hope it has all changed now — they looked at me as though I was mad. The AIDC was also approached; albeit they had different people a few years ago. Essentially they, in those days, seemed more comfortable working with such giants as Sumitomo for instance, in joint ventures. It is more than ironical to think that Sumitomo is the one that took the Vapocure franchise from us recently, for Japan. It says something. I am not quite sure I can explain it . . . but there’s a story there somewhere.

It became increasingly apparent that there was not money available in that time in this country for new technology. It was not a case of the people being approached regarding the technology as being
harebrained or myself, as the chief executive, as being unbusinesslike, or incapable of producing projections. It was simply a case of corporate cowardice in a nation where the ambience of primary production has been allowed to run unchecked for too long.

Another gruesome effect of the Australian cowardice was that it was difficult when talking to overseas companies to enlist their support since they could, and did, say that if the process was as good as you say, why can't you get support in Australia? Strangely, it was the courage of a local bank manager who had been associated with myself over a number of years that in fact allowed us to keep running in those hard times.

Towards the end of 1979 an executive of an American company that had learned of the process through business acquaintances came to Australia to talk further about it. We were anxious to sell them a licence but, in the event, they were interested in acquiring a majority shareholding in the company. Although they were not in the paint business they could see great potential in the process and, as we had run completely out of options, they acquired 51 per cent of Vapocure International.

This American company then continued to fund the development of the process and it cannot be made too clear that, without their partnership, it is very doubtful whether Vapocure could have survived. They increased their shareholding in Vapocure to 74 per cent in 1981 and, although they themselves were not expert in the paint area and were not truly able to introduce the process efficiently to the vast American market, one Licensee was in fact signed in Detroit in 1982.

There was of course growing pressure from the American company to move the Vapocure operation to Connecticut since, in their view, that was where the world's greatest paint market was and considerations of Australian nationalism were not important to them. This of course would have meant that the royalty flow to Vapocure would have been diverted to the USA, and this country would not have benefited from that overseas income earning potential.

**VAPOCURE PUBLIC FLOAT**

As the process gained in reputation publicity was generated in various parts of the world and, in particular, a Press Release from the Australian Information Service was given quite broad coverage in Japan. In rather characteristic fashion the major Japanese trading houses were in touch with my company within days of that publicity appearing and Sumitomo was particularly quick off the mark to begin negotiations for the Vapocure Process.

As we are all aware, the Japanese industrial climate is virtually a direct opposite from Australia in that they have no raw material with which to work and must make their gross national product on the development of technologies. Precisely because they are extremely good at attention to detail they do not allow the fact that certain details must be filled in to cloud their appreciation of the broad canvas importance of a new idea and the resultant technology from it. Consequently, the Japanese moved very rapidly and the Vapocure Franchise for Japan was signed last year.

So it was the acceptance of the technology by other than Australian interests that has allowed the process to develop.

With the Japanese Franchise negotiations underway and a rapid increase in the acceptance of the Vapocure Process by Australian and overseas industry, it became apparent that, if ever a move was to be made to buy back the farm from the Americans, this was the time to do it. Accordingly, the idea of making the American company an offer for its shareholding was discussed and, as the American economy had suffered some decline at this time, it seemed most important that initial moves be made.

It seemed that the most appropriate way of raising the necessary funds was via a public float since it was considered right and proper that the Australian public at large should have access to the benefits of this hard-won technology. It also appeared to me that there was a deep well spring in the general Australian population of support for ventures of this kind that was at odds with the chieftains — at least the ones I had met.

Accordingly, a deal was struck with MacDermid for the repurchase of its shares, the price being set to the equivalent of approximately one million Australian dollars. Option structures were set up and the job began to prove to all regulatory bodies, but particularly to the Corporate Affairs Commission, that a company such as ours could take its place on the New South Wales public listings. It was also appreciated that the very trial by ordeal of preparing a Prospectus and meeting all the requirements of the regulatory bodies was in fact a necessary thing, if not an essential aspect. If Vapocure Limited, as a new kind of technology company, was to be “squeaky clean” to an investing public.

Several brokers were approached who thought the idea was marvellous but echoed of “If the idea is so good why isn't somebody else doing it?” and, here, let
me pay tribute to Hattersley & Maxwell as the brokers who took the steps to support, and finally, float Vapocure stock to the Australian public. In particular, Ted Codd and Reg Keene of that company were dedicated to the Vapocure concept and I am pleased to say that the Vapocure float, albeit for a small sum of money, was opened at 9 o’clock and closed at 10 o’clock.

The interest of the Vapocure shareholders has amply rewarded my conviction that there was this well spring of support for Australian creativity in this country. I would like to also acknowledge the tremendous help of my fellow directors, Mr. Bill Henty and Mr. Geoff Pickles. I am also pleased to say that it was the Thursday following the Rhode Island America’s Cup Tuesday that we paid the Americans their million dollars and restored this technology back to the Australian shareholders. So we were on a bit of a high for the rest of the week.

The decision for Vapocure Limited to go through the full Corporate Affairs mill rather than take a back door listing was quite deliberate and taken for what we thought to be the best of reasons. As the first, as we believed, technical transfer company to go public, it was extremely important that such a company should be squeaky clean.

All material information should be completely open and verified and the philosophies and aims of such a company should be clear and transparently honest. If we were to expect the support of the investing public in this new venture then we should not be seen to take the easier route of acquiring a public company shell. And let me say that, despite the rigours of the Corporate Affairs examinations, we have never for one moment regretted that decision.

A difficulty that was experienced was that of trying to fit the historical profile of a technology transfer company into the traditional format of a trading company image within the Corporate Affairs office. The difference between a long history of a successful trading company slowly building its sales, its profits and its net assets and a technology transfer company with very little sales building its intellectual property and proving the worth of its patents but having no comparable net assets could not be more stark. However, the technology company may be thought of as building its thrust towards levels of great acceleration and the possibility of exponential growth.

**INTELLECTUAL PROPERTY**

This brings us to considerations of a relatively new phenomenon which is having an ever increasing impact on the business world. I refer to the concept of intellectual property. Intellectual property cannot be adequately reflected on a company’s balance sheet and even its patents, although they may be increasing in value with every transaction and may in fact be an asset worth billions of dollars can only be on the balance sheet at their initial cost, depreciated annually over the life of the patent.

Likewise, the knowhow associated with the growing expertise of a process cannot be reflected in the company’s balance sheet in any satisfactory manner. And yet in what I believe to be the first major case, a major company in the electronics field was successfully sued by another for theft of information which constituted vital intellectual property and damages were awarded.

So obviously a challenge rests with the accounting and auditing areas to structure an adequate response to what is becoming an increasingly obvious anomaly.

**CHALLENGES TO THE BROKING COMMUNITY**

Vapocure Limited has often been described as speculative. I answer that charge with much respect by saying that the word “speculative” is often applied to businesses about which the broking community knows little. In fact technology companies are in the main very far from speculative. By the time a growing technology has achieved the stature that allows it to be noticed by the business community or by the public at large it is invariably 5 to 10 years old and has been pressed forward to various levels of success by a very committed team of people.

If that technology has enough success on the board to warrant its going to a public float, particularly through a front door listing, then it has proved its worth from a technical point of view and is able to stand technical inspection by any independent appraisal. From that point onwards their lifetime, with improvements and extensions to their patents, with new patent applications and with ever increasing knowhow and prestige, could be 40-50 years. And those years could show very acceptable profits.

Their denouement, when it comes, is likely to be gradual as they are overtaken by newer technologies but independent diversification could maintain their viability for much longer periods.

However, in contrast to today’s Australian market for example, speculative stocks could well be those concerned with real estate development or with
mining or primary produce whose markets could be turned off like a tap due to rapidly changing circumstances of world demand.

The assessment of technology companies should be done by people with some technical qualifications. Therefore I suggest that many broking houses should take heed of this rapidly growing technology scene and employ qualified specialists who are able to give an informed appraisal of the merits of a Prospectus. I can only see the demand for such expertise in the broking community ever increasing and I foresee the day when the thought of a broking office not having qualified technical people on its staff as being regarded as the Dark Ages.

If an Australian technology company has been developed to a satisfactory stage, say by help from the IR & D people, from help from an MIC, has talked to a broker and made a good impression, then I say let that company get out its Prospectus; get it through the Corporate Affairs filters and put it to the public for support. By that time it will be at least five years old and its bona fides proven.

A few will fail; some will struggle; many will succeed to make good dividends for their shareholders and a lot of money for this country. And their success will outweigh any failures and will encourage new growth and that will lead to an exciting new era for this country that will help balance out the ups and downs of primary production activity. I am not talking about some single tree for the financial editors to walk around and pick faults with single leaves or criticise the angle of some particular branch but I am talking about a forest of creative companies successfully exploiting their ideas and products.

And if those case-hardened financial editors — or anybody else for that matter — thinks I’m dreaming then let me refer them to the actual story of the Australian businessman who, having been approached on a technology deal, got into his electronically ignition controlled Mercedes, having pulled up his plastic zip-fly pants and taken his uric acid blood pressure control pills and brushed down his polyester wool, crease-resistant suit, got into his office and sat down on his brushed polyurethane chair, punched the buttons on his ABS plastic phone, upon which signals were coded and transmitted to a satellite in stationary orbit and transponded to a receiving station to put him in contact with his colleague in New York and said “What’s all this technology nonsense?”